EFFECTS OF LAND COMMERCIALIZATION ON AGRICULTURAL PRODUCTION IN SABON-GARI AND GIWA LOCAL GOVERNMENT AREAS OF KADUNA STATE

BY

EMMANUEL ADEBAYO KEHIiVajB^ ^

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DECLARATION

I hereby declare that this thesis has been written by me and that it is a record of my own research work. It has not been presented before in any previous application for a higher degree or reputable presentation elsewhere.

All borrowed ideas have been duly acknowledged by means of reference and quotation marks.

Kehinde 22nd Oct. '97

EMMANUEL ADEBAYO KEHINDE.

CERTIFICATION

This thesis entitled "Effects of Land Commercialization on Agricultural Production in Sabon-Gari and Giwa Local Government Areas Of Kaduna State" meets the regulation governing the award of the degree of Master of Science of Ahmadu Bello University, Zaria, and is approved for its contribution to scientific knowledge and literary presentation.

Date 22/10/97

Dr. S.A. OGUNWALE.
Chairman, Supervisory Committee

Date Oct 28, 1997

Prof. J.P. Voh.
Member, Supervisory Committee.

Date 28/10/97

Dr. D.O.A. PHILIP.
HEAD, Department of Agricultural Economics and Rural Sociology.

Date 13/3/98

Prof. J. U. Olayemi
Dean, Postgraduate School.

DEDICATION

This thesis is dedicated to God for guiding me through this period of my life. .And to my mother for her financial and moral support and understanding in getting me through this stage in my educational career and lastly but not least, to my entire family members for their concern, patience and love during this period.

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ABSTRACT

The general belief in Africa and indeed Nigeria, is that land ownership is a communai issue, whereby, individual members of a community hold land on the basis of the fact that he belongs to or shares affinity with members of the community.

While this in general is the law, the practice however, differs to the extent that we find it a common practice for individuals in the community to singularly transfer rights of ownership to non-members of the family through sale or other forms of commercial transactions or to even exercise individual proprietary rights on group land.

This study thus examined this phenomenon by looking at the commercial tenure types in the study areas and determining which was most found in the area, those involved in the transfers of land, ihe uses the land are being put to after being transacted, and how this affects the land use type in the area and agricultural production.

To obtain the above information, a sample size of 100 farmers was purposively selected. Care was also taken to ensure wide coverage and fairness. As such 20 fanners were selected from each of thc five villages representing the five districts in the studied areas (Havin-Ojo, Bassawa, Tsibiri, Gangara and Fatika.

The results of rhe study showed that the many *(60%)* of the farmers, who acquired their land through purchase, had unlimited access to the land and as such could use it as collateral for loans, make long term plans on the land such as planting tree crops on the land and even develop and transfer the land and finally, returns were higher on it.

While the 40% who acquired their land through rent, had limited access to the use of the land, could not use it as collateral for loans nor expand production, thus making it less profitable than the former.

The results further showed that rent, purchase, land labour and capital were statistically significant at 5% level of probability while family size was not significant..

TABLE OF CONTENTS

		PAGE
TITLE PAGE		i
DECLARATION		ii
CERTIFICATION		iii
DEDICATION		iv
ACKNOWLEDGEMENTS		v
ABSTRACT		vi
TABLE OF CONTENTS		vii
LIST OF TABLES		x
LIST OF FIGURES		xi
CHAPTER ONE		
INTRODUCTION		1
1.1	Changes from Customary Tenure to Private Forms of Tenureship.	1
1.2	Problem Statement.	4
1.3	Objectives of the Study	5
1.4	Hypotheses	5
1.5	Justification	6
CHAPTER TWO		
LITERATURE REVIEW		7
2.1	The Concept/Meaning of Land.	7
2.2	Importance of Land.	7
2.3	Availability of Land for Agriculture in Nigeria.	11

2.4	Constraints on Available Land.	11
2.5	Evolution and Meaning of Land Tenure.	13
2.6	Customary Tenure Principles and Patterns of Holder-ship.	15
2.7	Land Rights. Acquisition and Transfer.	16
2.8	Security of Tenure and Related Problems of Agricultural Development.	20
2.9	Major Issues Demanding Policy Attention.	23

CHAPTER THREE

METHODOLOGY 27

3.1	Study Area and Physical Environment.	27
3.2	Population and Population Characteristics.	29
3.2.1	Sampling and Data Collection Techniques.	34
3.3	Characteristics of the Respondents.	34
3.4	Religious. Economic and Socio-political Arrangements.	37
3.5	Farming Systems..	39
3.6	Variables.	41
3.6.1	Independent Variables.	41
3.6.2	Dependent Variables.	42
3.7	Analytical Tools.	42
3.7.1	Statistical Analysis.	43
3.8	Limitations of the Study.	44

CHAPTER FOUR.

DISCUSSIONS AND PRESENTATION OF RESULTS 45

4.1	Documenting Land Acquisition Methods. Land utilization. Agricultural Production and Security of Tenure.	45

4.2 The Effects of Land Commercialization on Agricultural Production and Land Use Type. 53

4.3.1 Discussion of Objective One and Its Implication. 54

4.3.2. Discussion of Objective Two and Its Implication. 56

4.3.3. Discussion of Objective Three and Its Implication. 58

4.3.4. Discussion of Objective Four and Its Implication. 59

CHAPTER FIVE.

SUMMARY, CONCLUSIONS AND SUGGESTION 61

5.1 Summary of Findings 61

5.2 Conclusions. 62

5.3. Suggestion for Future Research. 62

REFERENCES. 63

LIST OF TABLES

TABLE NO.		PAGE
3.1	Age Distribution of Respondents	35
3.2	Sex Distribution of Respondents.	36
3.3	Educational Qualification of Respondents.	37
4.1	Commercial Types of Acquisition by Respondents.	45
4.2	Duration of Commercial Land Acquisition Period by Respondents.	46
4.3	Categories of People Involved in Commercialization of Land.	46
4.4	Distribution of Respondents According to Commercial Tenure Type. Forms of Payment, Size of Hectare and Amount Paid on Land.	47
4.5	Distribution of Respondents According to Land Holding Type and Sizes of Holding.	47
4.6	Distribution of Respondents According to Technology Used.	48
4.7	Distribution of Respondents According to Inputs Used.	49
4.8	Distribution of Respondents According to Agricultural Profitability by Commercial Tenure Types.	50
4.9	Distribution of Respondents According to Most Secured Form of Commercial Tenure Type.	51
4.10	Distribution of Respondents According to Least Form of Commercial Tenure Security.	52
4.11	Distribution of Respondents According to Loss or Non-Loss of Right to Land.	53
4.12	Regression Co-efficient and Related Statistics Derived from Linear Function when Postulated Variables are Regressed Against Output (Y):	54

LIST OF FIGURES

Figure		Page
1.	Map of Sabon-Gari Local Government Area	32
2.	Map of Giwa Local Government Area	33

CHAPTER ONE

INTRODUCTION

1.1 Changes from Customary Tenure to Private Forms of Holdership:

In Nigeria, land is held collectively in family, kinship, clan or tribal units and allocated without right of disposition to households. Local customs generally recognize the right of village or community to control the use of land resources within its boundary and to provide for the right of the individual to a portion of the village land for family or personal use. (Ega, 1980) These customary tenure practices are seen as setting limits on strategies that could be used to promote agricultural production or as warping the effect of various strategies in use. Ega (1980), further stated that some scholars claim that the customary principle inhibit access to land, credit and capital and does not provide adequate incentives to farmers to produce, invest and adopt new technologies.

This position centres on the fact that land right lies with the community. It is therefore assumed that farmers are insecure and incapable of adopting new or improved practices or to improve their farmlands. The reasoning here is that most farmers are unlikely to develop assets they do not own, and most lenders on their own are unwilling to provide or extend credits for production to individuals who cannot back their borrowing with land as collateral.

Indeed, Famoriyo (1990), holds the notion that customary tenure blocks the flexibility in land use that is necessary for a modern and meaningful agriculture, and is a limitation to

prospective entrepreneurs, innovators and investors in land. It is contended here that, the appearance of innovators and progressive rural entrepreneurs who can make use of land as a commodity are being blocked by land's non-marketability and accessability. Also, is the fact that migrants from land pressure areas also are being impeded from moving into land surplus areas to obtain land. Finally, it is postulated that customary tenure encourages land holding fragmentation and land immobility which prevents progressive farmers from consolidating fragmented parcels or expanding their holdings.

However, some scholars are of the view that African land tenure has the potentials to bring about agricultural development. For instance, Barrows, in Ega (1980), believes that land reform is not needed and that customary tenure will change, when new market or investment opportunities arises. A complementary view is that customary tenure is too flexible and thus requires a strong land policy to safeguard the subsistence opportunities of the rural poor.

While the first school of thought emphasizes the need to modify the customary tenure into an individualized type which is considered to be more conducive to economic growth, another drawsattention to the fact that uncontrolled change in the direction of private tenure can result in insecurity for the majority of the farmers.

Indeed, customary tenure overtime has been changing to other forms of transaction, namely: Freehold, Tenancy and Pledge. Of concern however, is the transaction from customary to individualized form of tenure. Christodoulou (1990), arguing for the transition to privately owned tenure, said that private tenure emerged from the decay and debris of the other tenure types before

it. He explained that as population increases in comparison to the amount of arable land available, and that is needed to meet people's need, people sought other means of fulfilling their land's need. He further said that the private form of tenure is an offspring of both disintegration and a new thrust. He cited the U.S.A., as a classical example, and said that the pilgrim Father's escaped from the vestiges of feudalism, from primogeniture that it entailed in England to an apparent or new form of land ownership. According to him their concern was to own their own land, to be their own man and to ensure that their descendants could continue to be so. Thus setting the beginning of private ownership of land.

Further to this, Feeny (1982), in Gershon (1990), said that the case of changing tenure is the same for the whole of the world as indeed Africa. According to him, in the early and midnineteenth century Thailand was a land abundant, labour scarce economy, in theory all land belong to the king, in practice, there was a system of private transferable usufruct right. People were allowed to use the land for cultivation, sell it and pass it onto their heirs as long as they paid taxes on the land and did not leave it to fallow for longer than three consecutive years. Land was not in general used as collateral, instead there was a well developed system of property right in human(slavery), that served as collateral.

Gershon (1990), also stipulated that in the second half of the nineteenth century, the opening of Thailand to international trade and the increased commercialization of rice production spurred the evolution of a more vigorously defined private ownership rights in land.

Famoriyo (1974), further stated that over the years, and with changes in the socio-economic conditions of the people, land also had become a commodity in exchange in the forms of: pledging, short-term borrowing or leasing and outright sale.

Ega (1979), similarly, argued that in his study, although the more traditional methods of acquiring and transferring land are inheritance, allocation, gift, and loan, there is a significant prevalence of commercial transactions in land and considerable mobility of land. There seem to be a gradualorientation towards alienation and farmers behaved as if they have discretionary power of disposal over their holdings. they transferred their holding at will and more or less exercised individual ownership right over them. this was in spite of the fact that the law prohibited this practice. Indeed, the incidence of transaction such as: purchase, pledge and rent, suggests that the law was vigorously violated and implies a lag between the law and the tenure system being practiced.

1.2 Problem Statement.

With the growth in population and increased commercializa-tion, customary tenure practices are being fastly replaced by individual ownership of land. Thus land may now be said to be a commodity in exchange in form of rent, pledge and purchase. This study, thus, would be aimed at providing information on this specific questions;

i. What is the magnitude of commercial transactions in land?

ii. What categories of people or segment of the society are involved in the commoditization of land?

iii. What use is being made of the land acquired through commercial transactions? and,

iv. Do the condition of the transaction/acquisition affect land use type and agricultural production?

1.3 Objectives of the Study.

The objectives of the study includes the following;

i To document land acquired through commercial transactions.

ii To identify the categories of people or segments of the society involved in the commoditization of land, and the uses they make of the land so acquired.

iii To determine the extent to which the condition of the transaction/acquisition affect land use type and agricultural production.

iv To make policy recommendations on land transactions and tenure practices in the area.

1.4 Hypotheses.

1. The higher the level of rented lands, the higher will be the level of agricultural production.
2. The higher the level of purchased lands, the higher will be the level of agricultural production.

1.5 Justification for the Study.

There is a paucity of information on the changing trend from customary to private property rights in land. This study will be filling the existing gap in knowledge on commercial tenure type and would throw light on the predominant commercial tenure type in the area. It is expected that by so doing, this study would provide information that could form the basis for constructive and effective land tenure policies for the country.

Also the study would after identifying the commercial tenure types in the area, provide information particularly lacking on the use to which the land acquired under the various commercial tenure types are put, stating their implications for production and security of tenure which would be of use to Planners and Agriculturists.

CHAPTER TWO

LITERATURE REVIEW

2.1 The Concept/Meaning of Land:

"Land in its broadest sense embraces all the solid parts of the earth's crust, or that part not covered by oceans and seas..." (Encyclopedia Americana, 1979).

Shedding further light on the concept of land, Norman (1961) states thus " Land means many things to many people - To the farmer, it is the basis of livelihood. To the city dweller, it may be a space or place to build a house, or a recreation ground. To all of us, it is that soil beneath our feet, which contributes in more than one way towards the satisfaction of human needs". He thus advised for the conservation of land to meet the human needs of tomorrow.

2.2 Importance of Land:

The above definition of land apart from outlining the physical properties of land, also indicates the importance of land to life. To the extent that it highlights issues of territory, food and survival. And according to Abdullahi and Ega (1983), among all the factors in production, land is the most central of all resources on the basis of which people derive self sustenance. It is always a fixed resource confined within politically defined territorial unit containing people whose number are always on the increase.

Brown (1963), further states thus, certain facts associated with land deserve to be recognised, first, it is the source of man's food supply, secondly, land is limited in supply.

According to him man has always been dependent upon land for food even during the pre-historic hunting and gathering stage. As man learned to plant seeds and till the ground, the capacity of the land to sustain human life was increased.

Many times over with the application of modern science to agriculture, the population sustaining capacity of the earth was still further enhanced. "...Inspite of the vast scientific store of knowledge, no practical substitute for land in food producing process is known, nor does it seem likely there will be any in the foreseeable future. He believes that conventional agriculture will continue to supply a share of man's food supply in the future not too different from the past". He finally asserted that most of man's successful efforts in expanding food output have been in the area of improving existing lands.

Concerning the importance of land, Gordon et. al. (1970), argued that, "Among all the factors involved in rural development, none evokes such a range of emotion, none is so politically delicate as the land. Its ownership, the right of men to use it, the duties that go with that use, the incentives that come with ownership, are all of paramount significance to mankind in the fight to grow enough food. Some anthropologist now claimthat 'territory' is the most powerful urge in nature for birds, animals and man - more powerful than sex, than domination. The basic urge is to have and hold land".

Land in rural societies is a key factor of production, it is a kind of bank, a form of insurance, a hedge against inflation, a protection in old age, a foundation of rural life itself. Its value in the rural societies must not be underestimated and cannot be measured in entirely

economic terms, for not only does it accord security of living, but for many it has a mystical significance of bringing power and prestige to its owner. Inevitably, therefore, the land and its use are major issues in agricultural development. (See Gordon et. al. 1970).

Barlowe (1978), talking about land's importance to humanity, said that," it provides people with living spaces, with the raw materials necessary for filling material needs, and with opportunities for satisfaction dear to the heart of man". Man over the years have lived in association with the soil, fields, forests and fishing grounds to ensure sustenance. Rights in land were often the key factors that determined an individuals economic, social and political status.

Hunger for land and for land ownership, according to him, has been responsible for bringing thousands of immigrants to America and indeed many parts of the world and this still affectsthe thinking of people in many places.

Mohiuddin et. al. (1991) asserted land's importance for food production and as access to other resources thus, "entitlement to food can come about in two ways; through land (self-sufficient production) or through income (purchasing power). The main problem with the first is that those who have land do not have enough of it, and those who are landless are also jobless". They further argued that, "access to land is important both for food security and for access to other resources and to social and political power".

They decried the smallness in holdings in Africa and Asia where one-half of small holders have to subsist on very small holdings of below one hectare. According to them most of these holdings are in marginal areas where population to land ratio is so high, they said that this situation

accounts for hunger and starvation in the areas, this case according to them is more so where access to irrigation water, inputs and proximity to market are even more difficult.

According to Gerhald (1991), land in one way or another is the basic source of most material wealth, it is of crucial importance and require an effective management system. While, Christodoulou (1990), said land accords the holder some form of identity and belonging, land is the locus of group and evennational identity. A tribe or nation even an extended family has ensured its identity as well as security by defence of its territory and even linked its group continuity with ancestral burial grounds whose inviolability was held sacrosanct. Some thinkers according to him ascribe to man an instinct of territory.

Denman, in Famoriyo (1981), argued thus, "At no time previously has there been activity in land affairs greater than there is now - Nation after Nation, the industrially developed and the nation whose development has kept closer to custom and tradition are caught up in urbanisation, rural development programmes, land nationalisation, land reform and taxation and taxation of land wealth".

2.3 Availability of Land for Agriculture in Nigeria:

Availability of land implies the amount of land physically available for use. The Nigerian territory spans a total of 92 million hectares or 92,000 square kilometres stretching from the Atlantic Coast to the fringes of the Sahara desert. Of this about 46 million hectares (50%), is uncultivated bush, from which comes the bulk of grazing land. Farmland constitutes about 32 million hectares, while the agricultural population is about 55 million.

The population density or man to land ratio from this data shows an average of 0.58 hectares per person. It is obvious fromthis statistics that there exist so much fragmentation of holding in the country which would not allow for meaningful and large scale agricultural production. Also consequential is the fact that over 50% of the land that should have been available for agriculture is still uncultivated and uncleared also have negative consequence for production. (See Ega 1980).

2.4 Constraints on Available Land:

Famoriyo (1981), talking about constraints on available land, declared that there are two types of constraint facing available land, namely; physical and socio-economic constraints:

1. Physical Constraints;

i) Uneven distribution of rainfall and variation in wet and dry season which result in insufficient distribution of moisture.

ii) High evaporation rate especially in the Northern states, this increases water deficit which is aggravated by drought. Afforestation as well as irrigation has been tried to stop this effect.

iii) In areas prone to flooding, resources are made available to construct drainage and clear thick forest to make more land available. For example, the Niger Delta development board in River state.

iv) Rugged terrain, where this exist in Nigeria, there is usually a limit to the use of mechanical equipment in agriculture. Gulley erosion which is man made constitutes one of the factors limiting land supplies in the East.

v) The inherent infertility of most Nigeria's soil worsened by over-cultivation.

2. ***Socio-economic Constraints;***

i) Increased population pressure on land.

ii) Need for farmers to increase their areas of cultivation at every planting season. This need is necessitated by the requirement for more food, the need for extensive cultivation in view of stagnant or declining marginal productivity of land, and lastly the orientation of agriculture towards the market.

iii) Increasing demand of rural dwellers for consumer goods as they become more and more aware of the fruits yielded by a growing economy.

2.5 Evolution and Meaning of Land Tenure:

According to Ega (1980), land tenure function, basically is to provide opportunity to earn income in agriculture and to ensure security. Dorner, in Ega (1980), states that, "land tenure institution comprise the legal and contractual or customary arrangements, whereby people in farming gain productive opportunities on the land. These tenure arrangements determine the ability of individuals to gain access to these opportunities and define in part the nature and dimensions of, as well as, the future security of such opportunities". In short, land tenureinstitution determines the pattern of income distribution in the farm sector.

Land tenure can thus be said to be the legal principle, whether customary or modern guiding individual's access and right to farm opportunities available in any given area. This is however structured following the development strategy being practised in the area.

However, there are basically two strategies namely; Capitalist and Socialist. Under the capitalist system which similarly is referred to as freehold tenure, it is assumed that here uncertainties are removed as well as lack of incentives and resource deficiencies. Here the farmer is presumed to be able to use his land as collateral for loan and to provide both access and 'security of tenure', farmers are again regarded as having equal access to information concerning alternatives available to them and to compete under more or less equal conditions for inputs and markets.

While state owned or collective based land tenure is associated with the socialist strategy of rural development. It is said to provide equal opportunity to the rural dwellers to develop their full

human potential and consider security of tenure a major element in that population's well-being, elimination of poverty and building of a harmonious social andeconomic system. It emphasises poverty minimization as opposed to output maximization, but it treats productivity and welfare as independent (Ega, 1980).

Land tenure principles thus emerge as a guide towards correcting the ills that arise from land holdership and to provide and ensure security for land holders. However, a review of history and observation of present conditions indicate roughly three distinctive stages according to Ega (1980), corresponding to specific societal types or modes of production: the communal, tribute paying and incipient capitalist mode.

The communal mode of production is distinguished by a lack of proletarianization or a separation of the producer from the means of production. The peasant enjoyed access to land by virtue of his membership in the community. Anybody who wanted land simply cultivated an unused portion. All members of the community had equal claims to land. The right of use was acquired by individuals, who operated on a collective or extended family basis.

The production unit was basically the same as the consumption unit, and there was only limited exchange of agricultural commodities. Even though, land was inheritable by primogeniture, it was not sellable. There was even little occasion for lending land as it was available in abundance.Generally, the level of development of the production forces did not warrant the accumulation of landed property.

The tribute paying mode of production was marked by the separation of the society into two main classes: the peasantry and the ruling class, which extracted tribute from the rural communities. This started from the formation of Zaria and reached its advanced stage during the Fulani rule. The Fulani rulers, for instance, vested the ultimate land rights in themselves, conferred land as fief on the ruling class, and operated on a semi feudal system. This distorted customary land tenure practice and increased the individualization of land rights.

The stage of incipient capitalism is used to refer to the present transitory stage, which is marked by a confusion of new practices and old customs with increasing decay or breakdown of the latter. The local communities have been integrated into the capitalist economic system and have become partly subsistence and partly commercial producers. But they are essentially small holders still limited by natural conditions and lack of development of the productive forces.

Non alienation of land is giving way to a free land market. There is no glaring inequality in the rural sector, but the land holding pattern and property ownership cannot be said to be equal.

2.6 Customary Tenure Principles and Patterns of Holdership:

In the customary tenure arrangements, in Nigeria, the individual farmer as a member of the family unit has by right a stake in the family land, as land is believed to belong to past, present and future generations (Famoriyo, 1975).

According to Ega (1980), land held under customary or traditional forms of tenure are most rampant. In his study of four Zaria villages, he found that those who held land under the

system account for about 70% of both the total number of fields and hectare held by the farmers. While gift which still is another form of traditional land holding method constitute about 42% of both the number of fields and hectares held by the farmers.

2.7 Land Rights, Acquisition and Transfer:

According to Famoriyo (1975), individuals are said to own or hold rights in land, the rights are held only in relation to people. According to Lioyd in Famoriyo (1975), "a right is not held in land but against another person, thus one holds a number of rights against various people in respect of a plot of land". This notion of land rights is related to that of property right. According to Commons (1934) in Famoriyo (1975), the term property cannot be defined except by defining all the activities which individuals and the community are at liberty to do or not to do with reference to the object claimed as property.

Furthermore, property is an object held for the owner's exclusive use, sale or disposal. But property rights are the social relations which the state vests in the owner of property. These rights are created only by the imposition of duties upon other persons, thus property rights are literally social relationships stabilized according to law.

Ega (1986), states that even though Nigerian, and indeed African land tenure system has been classified as being based on collective ownership, egalitarian access to land and inalienability of land, this is in ideal sense, what usually obtains is a dual system with complex interaction between communal rights and individual rights. The community (village or clan), he asserted treats

the land it occupies or its entire territory as belonging to all its members and the head of the community act as the trustee or custodian of the land.

However, the individual member of the community has the right to select (on a first come first served basis), and cultivate a portion of land for family or personal use. Indeed, one can rightly suggest that the community title might have evolved from the individual appropriation of land to themselves.

Ega (1986), further asserted that it is clear that the community has a right of one sort and the individual has his own right on a different level. For example, while the allocation of un-allocated land resides with the community as a whole under the trusteeship of the village head, the individual has virtually complete control over un-allocated land, grazing lands, uncultivated lands and access to water.

Customary land tenure practices, namely: inheritance, allocation, gift, and loan have been changing over time in response to socio-economic changes in society, (Ega, 1984). This in turn has led to the institution of public land policies and successive amendments of such policies.

According to Ega (1979), attempt to regulate the land tenure system culminated in the statute, the land law of 1962 and its amendment in 1963. This law does not differ from the colonial laws it replaced. It is in fact a validation of the colonial laws by local or regional laws. It enjoins that all laws in Northern Nigeria, belong to the indigenous people of the region and it vested ultimate control and disposition in the ministry charged with responsibility for land matters

(ministry of land and survey). The Minister holds and administers land for the use and common benefit of all the people.

Two forms of right or interest are recognised by the ordinance, a statutory right of occupancy, which could be granted to indigens or non-indigens and a customary right of occupancy which is the title of a local community or indigenous member of acommunity occupying land according to local law and customs.

The law categorically prohibited occupants under statutory right from transferring land by sale, assignment or mortgage without the consent of the Minister. Similarly, the holder under customary tenure was prohibited from transfer of land by sale, mortgage or assignment to non-indigens of Northern Nigeria without the ministers approval.

Generally, under customary tenure, such transfer without the permission of the village head were not considered as legitimate. (Meek, in Ega 1979). According to Migot (1990), in Anlongo, Ghana, there was almost no permanent transfer of land outside the inheritance system. Although, high number of rentals and pledges are encountered here, they are anomalous to actual development of land markets in these areas. Since transactions were undertaken during a period of serious economic depression, furthermore, higher proportion of the rentals (80%), and pledges (50%), occurred among relatives.

Kisamba-Mugerwa (1990), stated that in Uganda, by the Busuulu and Envujo law (1927), the peasant tenants could not be forced off their holdings without a court hearing. Their tenancy

could be passed on to the next generation, although it could not be divided among several heirs and could not be sold.

According to Benoit (1990), the tenure system in Rwanda, was collective based. The land domain was the property of the lineage or clans whose members are related by birth or allegiance to a common ancestor. Ideally, the first occupant of the land under the Ubukonde system, which represented an arrangement for the utilization of tribute labour in clearing and establishing farms in forest lands. The ownership of land was vested in the community (lineage or clans) instead of trustees.

Land, however, remain inalienable. The clan or lineage leaders allocated land to the members of the community, on which individual households were restricted to long term usufruct rights transmissible only through inheritance to male children. Use and alienation rights were distinguished under the Ubukonde system. When land was abandoned or unused it reverted back to community control and could be allocated to a different individual household.

According to Famoriyo (1986), in order to curb the effect of state intervention in land matters, that resulted in a situation of uncontrolled and unplanned use of land, the Federal government established a land use panel in 1977. And this brought about the promulgation of the land use Act (1978). The Act has the following primary objectives:

1. To promote rapid socio-economic transformation of the country through rational land use.
2. To ensure that state governments administer land for the benefit of the people.

3. To bring an end to artificially high land prices as a result of the activities of speculators, particularly in urban areas.

4. To eliminate a main cause of socio-economic inequality.

5. To accelerate economic development by making it easier for state governments and their people to gain access to land.

Famoriyo (1986), further asserted that the position of the Act on revocation and compensation, suggests that the land use Act, is at best only vaguely perceived in the rural areas of Nigeria. for example, in a study he conducted in Kano state in 1981, over 90% of the land allocated were made to public servants and private businessmen, and only 18% to the agricultural sector.

In any event the law and customary principles do not depict what is happening at the farmers level. The laws are not enforced and the land tenure has been changing following natural evolution. (Ega, 1974).

2.8 Security of Tenure and Related Problem of Agricultural Development:

According to Migot et. al. (1990), security of tenure is the ability to continuously cultivate a piece of land without any loss of right.

Ega (1979), states that when land is acquired under the more traditional forms of tenure; allocation, gift, loan or inheritance, there seem to be no question about the farmers security.

Indeed, for land acquired through allocation, gift loan or inheritance in the villages covered by his study. Farmers believe that there is no restriction to their use of land. They see their title as virtually permanent and their children and descendants hold an ascertainable inheritance rights of indefinite duration over the land.

He similarly said that, with land acquired through the other tenure methods, there are some problem of tenure security for instance, when land is held under pledge, rental arrangements, or sale, the farmers control is limited and usually includes the right to make physical use of the land, the right to income from it, and power of management as defined in the terms of the transaction or by socially recognised procedures.

For Benoit (1990), Incidence of disputes in Rwanda is low with only 3.8 % of all operated blocks ever being involved in land disputes. In-addition, most of the land appear to be confined to specific household groups, namely; those headed by separated and single women. Both the transformation of right towards individualisation and the low incidence of land disputes strongly suggests that land tenure security is fairly high in Rwanda, despite the absence of comprehensive governmentintervention in rural land tenure.

Contrary to the above, Michael et. al. (1990), accounting for tenure security in Somalia, argued that it was so rampant that direct questions concerning tenure security were made prohibitively difficult, because of the extreme sensitivity of the population towards certain land disputes. Grabbing land through the registration process was strongly asserted by many small

farmers. Several instances of well connected individuals attempting to claim land with certificate issued by government, resulted in small farmers taking cases to court.

Proffering solution to the problem of tenure security, Nee-Ashie et. al. (1990), asserted that title registration if properly administered would deal with some of the problems relating to uncertainty and insecurity in land titles and transactions. Registration may confer greater security and certainty, reduce land disputes and litigation and make dealings in land easier, cheaper and safer. But the achievement of these objectives would depend on the efficient and effective management of the scheme.

Concerning the issue of tenure security and related problem of agricultural development, Ega (1986), in his study of Zaria, stated that land tenure is just a part of the multifarious constraints on agriculture and rural development. Naturalconditions in particular the soils and amount and distribution of rainfall, remain severe limiting factors on agriculture. The use of high yielding inputs such as fertilizer, improved seed varieties and irrigation facilities is minimal.

Generally, the majority of small holder farmers are caught in a cycle of poverty induced largely by technical deficiencies and lack of access to improved techniques that could make farming profitable. In effect agriculture is not only characterised by smallness of holding but also by low productivity and low income.

The implication of the above for security can be viewed from four perspectives; firstly, the area of food security which is an aspect of security is threatened, because the land is no longer

available for continuous use due to its impoverishment caused by continuous and excessive use of some plot of land, thus making survival much more difficult.

Secondly, the implication on tenure security is also hampered. this follows the premise that agriculture especially by small holders is highly unprofitable, the tendency thus is for them either to switch production and then move to other trade activities with the land or sell the land to people with much more capital and thus use the money to invest in other businesses. Whatever may be the case, the fact is that securityof tenure is threatened due to the fact that the land either way is no longer available for agricultural use, thus limiting the holders right to it.

Added to the above, is the fact that the holder of the land cannot forever continue to use the land as it has to undergo a period of fallow aimed at improving the land, this also may limit the right of the holder to such land and thus threaten his security.

Finally, there is a greater implication arising from the customary tenure practices based on inheritance, this encourages fragmentation of land that is held, following the death of the holder. The land is further re-distributed or sub-divided and usually the sizes of land made to the new holders, may not be adequate for tenure security and may thus find its way into being sold out or transacted to ensure other forms of security outside agriculture.

2.9 Major Issues Demanding Policy Attention:

Since Nigeria, got her political independence, the main attempt to regulate land tenure and ensure agricultural development in the country had been through the use of the land law of 1962

and the land use Act(1978). These laws are similar in principle and one can even simply say that the Act is a mere adoption of the 1962 law for the whole of the country (Ega, 1986).

Ega (1986), further asserted that, in essence the laws re-defined the right and obligations of the government and those of the cultivators and others with interest in land, and attempts to control land transaction such as sale of land and vested ownership of the land in the government. Individuals were allowed only right of occupancy or use under two forms of title; a statutory right which is granted by the government and a customary right which is the title of the member of a community as guided by local law and custom.

In principle these laws transferred ownership of the land or proprietary title over the land from the individuals and communities to the government. By so doing, it was hoped that the control of the use of vital resources would pass to the government for the benefit of all.

By validating customary tenure, it was expected that the rural people would be offered protection against official administrative requirements or arbitrariness that might preclude them from gaining access to statutory rights of occupancy.

Still, Ega (1980), is of the view that, these expectations are more of principles than is the practice. According to him, there is rather a considerable difference between land tenure practices and what are commonly regarded as the norms. Specifically, it is apparent that customary tenure is not anantonym of individual ownership as is commonly thought. It involves a complex interaction between individual and communal rights, with elements of individualism being always strong. In

the real sense communal ownership applies only to land on which no claims have yet been made or laid.

Local custom relating to land, according to him, have undergone significant changes in response to social and economic pressures. Indeed the problem with the customary tenure seem to lie in a lack of stability and not a lack of flexibility as commonly thought. As the spirit of communal ownership inherent in the tenure system fades in response to changes in the mode of production, individualization and unregulated transfer of land result, and adversely affecting social relationship as well as economic opportunities and security of the farmer. This is amply demonstrated by litigations on land among farmers.

He further enthused that inheritance custom also result in fragmentation and constantly diminishing in the sizes of holdings and thus creates unfavourable conditions for agricultural development. Furthermore, even though the land distribution is relatively equal there is evidence of socio-economic inequality and a likelihood of land speculation, land grabbing and land concentration.

On the whole, the security of the farmer appears threatened by the prevailing land tenure practices and land holding patterns, and there exist conditions for the formation of a class society in which a large section of the community may be excluded from access to land. In the final analysis, there is a need for a land tenure policy, that takes into cognizance the facts that the land tenure system is in a transitory stage between communal rights and exclusive individual land ownership.

And that the introduction of capital and technology could lead to a dis-integration of the land tenure system and alter the existing balance between the land tenure and social and economic security. (Ega. 1980).

CHAPTER THREE

METHODOLOGY

3.1 Study Area and Physical Environment:

This study was conducted in Sabon-Gari and Giwa local government areas of Kaduna State. The state is located between latitudes 9° N and 12° N and longitudes 6° E and 9° E of the prime meridian. It has an area of about 40,000 sq.km (Iloeje, in Ajibaiye, 1992). The main ethnic groups include: the Fulani, Hausa, Gbagyi, Bajju, Kataf, Kagoro, Kadara, and Jaba. (Nigeria year book, 1989).

Sabon-Gari and Giwa local government areas traditionally fall under the Zaria emirate, the emirate is in the central portion of Kaduna state and is part of the high plains of Hausaland. The most conspicuous relief features are the Inselberg which rise at their highest elevation to about 800m above sea level. The mean temperature ranges from 50° F to 90° F. The mean minimum temperature is lowest between November and February.

The climate is tropical continental, it is sub-humid in nature and is affected by two principal wind current, a North Easterly dry wind regarded as harmattan, (locally), and the other a moist South West wind that brings rain. There is an annual rainfall of between four to five months a year, that is from May to September, and a dry season which lasts from October to April. The mean annual rainfall amounts to about 1,100mm.

The soils are of two types; the upland soil (Gonar Daji). which are sandy loamy in texture, they are predominantly strongly weathered, mainly poor in nutrients and have a thin organic surface horizon that is easily eroded. Surface capping or crusting in silty or fine sandy top soil is widespread, with the exception of this phenomenon and from the point of view of cropping, therefore, they are physically adequate but chemically or nutritionally only poor to moderate.

The lowland soils, called (Fadama), occur either in areas of low depression with fairly high water table or along the banks of rivers, streams and lakes. The soils are blackish in nature and highly fertile. Unlike the upland soil, the lowland soil can retain enough moisture for both dry and wet season cropping. This however, are limited in quantity.

The climate and soil types in these areas pose a lot of limitation on agriculture and land use in several ways:

1. It limits the amount of arable land that can be put into productive use for agriculture and thereby, reduces the amount of agricultural output realisable.
2. It increases dependency and money spent to secure chemicals and inputs such as fertilizer for soil improvement.
3. Excessive irrigation requirements is needed to ensure year round production of crops.
4. Short rainy season implies a limitation on the type of crops that can be grown, for example cotton which is a long season crop suffers from inadequate water supply at the end of the growing period, also long rainy season may be a problem for short season crops like cowpea, the rain may cause saturation or water-logging which may hamper the

crop, also it may pose problem for harvesting of short season crops. Also in exposed and hilly areas erosion can be a problem during this period of intense rainfall.

5. The temperature, together with the sparse vegetation and a system of low relative humidity in the dry season, result in rapid loss of moisture and drastically affect the stability of the water table.

6. Finally, it is evident that natural conditions, in particular the soils and climate limits the options available to the farmer. The amount of good quality land is limited, and the soils are generally of low water retention capability and susceptible to erosion. Added to these are the seasonality and fluctuations of rainfall with concomitant effects on labor distribution and crops. In all they cause farmers severe risks and uncertainty and impose intractable barriers on farmers ability to earn income (Ega, 1980).

3.2 Population and Population Characteristics:

The State has a total of 3,969,252 people. The two local government areas under study also have a total population of447,253 thousand people, of this about 50.1% are male while 49.9% are female. (Nigeria's census figure 1991, cited in African Concord, 1992).

The population under study consists of the indigenes, namely; Fulani, Hausa and Maguzawas and non indigenes who mainly migrated to the areas, namely; Yoruba, Igbo, Southern Kaduna people, Idoma etc..The indigenes of the area are mainly Moslems with the exception of the Maguzawa who are in modern times referred to as Hausa - Christians because of their

conversion to Christianity and the outsiders or non - indigenes whom largely too are Christians. The bulk of them however live in the urban areas and only have farms in the villages.

Most of the rural people live in big agricultural settlements or villages of various sizes called Kauye in Hausa or smaller units of settlements called Angwa. The big villages serve as centres of distribution for agricultural inputs and services when available.

There exist rural urban migration, that is from the rural areas to urban centres like Giwa, Shika, Samaru, Sabon-Gari and others. The movement basically involves rural younger age groups with more formal education and others not convenient with the rural setting in search of better job opportunities in life. This movement however, is not significant enough to upset the pressureon available land in relation to need.

The study area covers five districts, namely; Sabon-Gari. Bassawa, Shika, Giwa, and Patika. For the purpose of gathering data for this study a sample size of 100 respondents was drawn. The purposive random sampling method was used to reach only the class of subjects affected by this study, namely; those who acquired their land through commercial transaction alone. The same method was also used to select 20 farmers from each of the districts to have fair representation. Similarly 5 villages were chosen with one from every district and 20 farmers from each of the villages. The following villages were however, randomly chosen; Hayin-Ojo, Bassawa, Tsibiri, Gangara, and Patika.

The selection of these villages is based on their accessability, as such there is nothing particularly special about them when compared with the other villages. Differences will be observed in tenure practices and in other aspects of rural life in the villages perhaps to differences in location and size but this will be more in terms of variation in degree and not in substance.

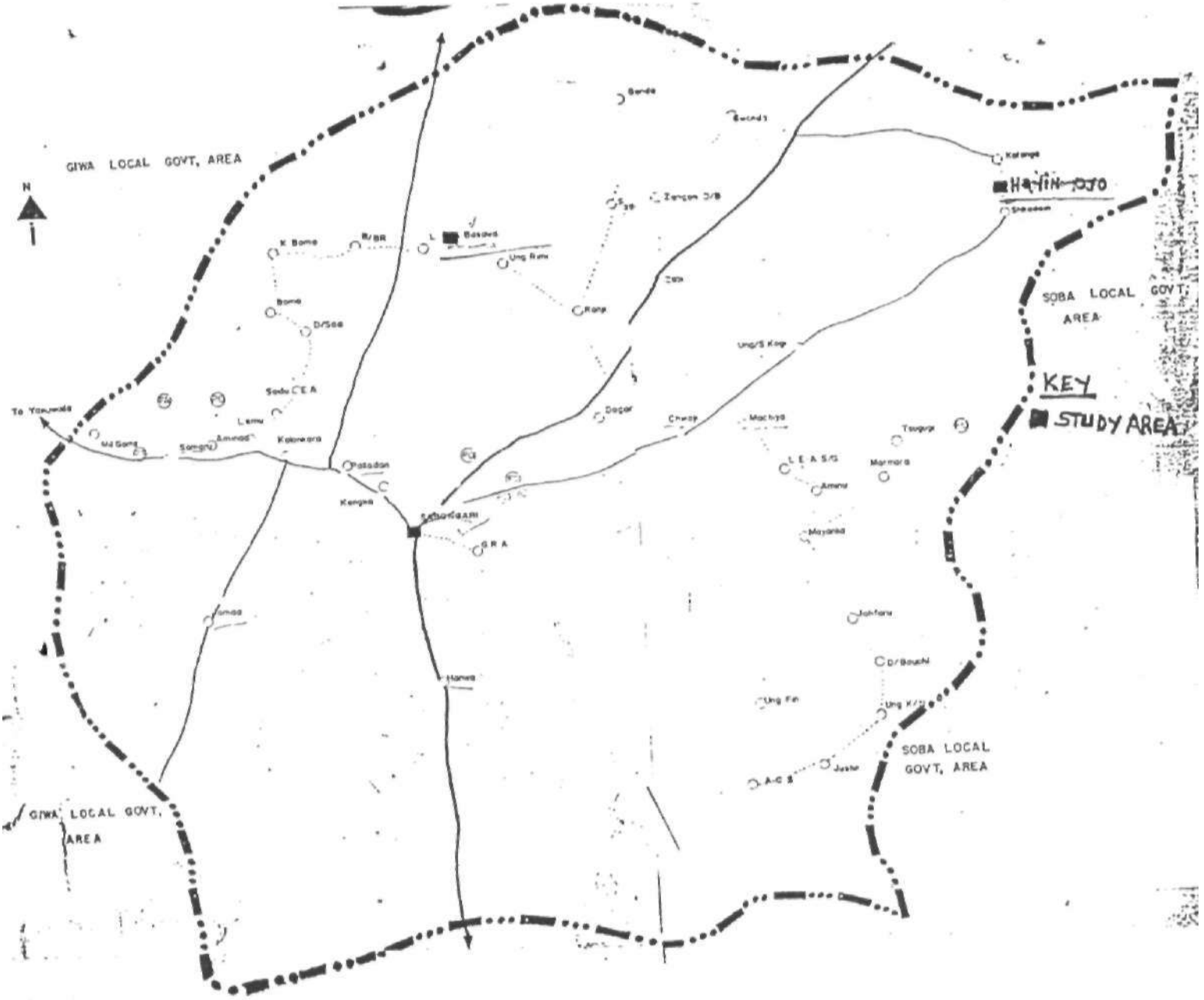
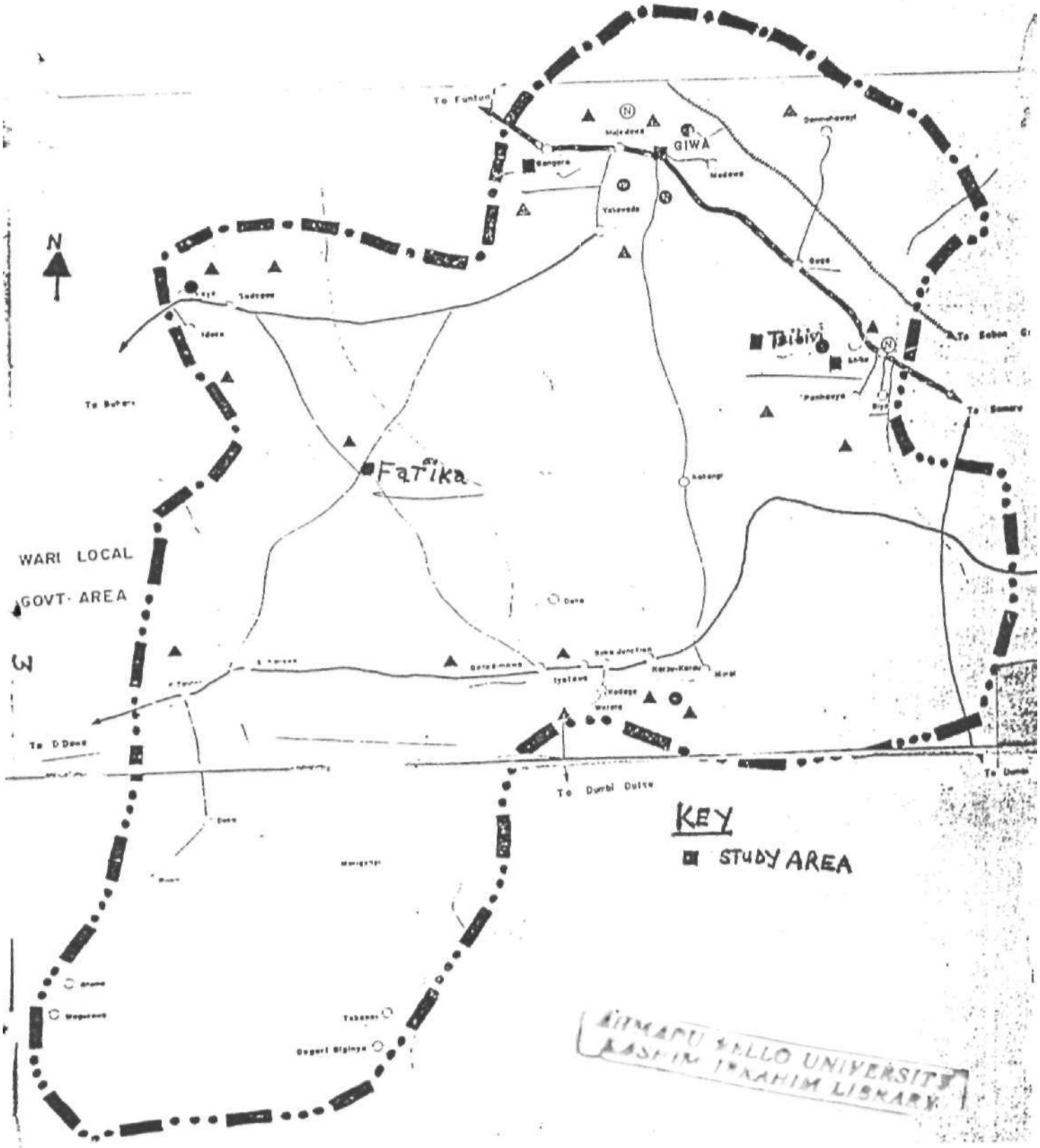


Fig 3.1 Map of Sabon-Gari local Government Area



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3.2.1. Sampling and Data Collection Techniques:

To obtain data from a sample of farmers, a total of 100 farmers were purposively but randomly selected from fertilizer lists and interviewed. Data was obtained through the use of standard questionnaire and interview schedule. Sets of questionnaire were administered, with one directly soliciting for information concerning the effect of land commercialization on agricultural production.

These included questions on the farmers characteristics such as: age, level of education, family sizes, etc., land acquisition methods and use, forms of payment involved and security of tenure. This was administered only to farmers who acquired land under commercial transactions.

The second set of questionnaire involved general issues concerning land tenure practices, namely; land holding, acquisition and transfer rights, general agricultural practises in the area, and this was directed at district heads and village heads in the area of study who also oversee the administration of land.

3.3 Characteristics of the Respondents:

3.3.1 Age.

The data on age distribution of respondents in the study area indicates that, the larger number of the farmers(42%), were between 40 and 49 years while the lower percent(12%), were between 60 years and above (see Table 3.1).

The higher proportion of the farmers are in the younger age group, this reflects a high fertility ratio and consequently implies a growth rate in the rural labor force. The lower percentage which conversely are those in the higher age group who represent only about 12% of the total population indicates a low level of life expectancy in the area due mainly to poor health services and the difficulties posed by poor rural life.

The implication of the younger age group being the largest implies that there is a greater demand for land, and this raises the level of commercialization, because so many people who are able now demand land as the ones gotten through inheritance are subjected to fragmentation or sub-division and as such are not enough for the teeming young population. Thus people now revert to other means of fulfilling their land needs.

Table 3.1. Age Distribution of Respondents:

Age	No.of Respondents	% of Respondents	% Cumulative
30 - 39	24	24	24
40 - 49	42	42	66
50 - 59	22	22	88
60 - above	12	12	100
Total	100	100	100

Source: Field survey, 1996.

3.3.2 Sex.

The data on sex distribution of respondents as shown in (Table 3.2) of the study area, indicates that, the larger number of the respondents (96%), were male, while only 4% of them

were female. This wide variation, even though is not so much the case that the area actually has so few cases of women respondents, is largely due to the sampling technique used in choosing out or selecting the respondents from the total number of respondents in the study area.

Even though the law in principle prohibit women from owning land in the study area, this is more of an ideal situation rather than the practice. The case is that most women through the process of land commercialization own land and some even traditionally own land through gift and loan from relatives and friends but this last case is negligible.

Table 3.2 Sex Distribution of Respondents:

Sex	No. of Respondents	% of Respondents	% Cumulative
Male	96	96	96
Female	4	4	100
Total	100	100	100

Source: Field survey, 1996.

3.3.3 Education.

The data on educational qualification of respondents in the study area, indicates that, the larger number of the respondents(54%), have no basic formal education, while only (46%), of them had formal education (Table 3.3). The fact that the larger number of the respondents have little or no education shows why farming in the area constitutes one of the main traditional form of education before the coming of western education and even now.

Similarly, responsible for the high rate of education in the area, is the fact that most of the cities and villages are centres of learning with a high cluster of higher institutions and university. These centres are also responsible for the high level of land commercialization in the area, because it has brought remarkedly a high population pressure on the land thus encouraging commercial transactions through higher demands for land caused by population pressure.

Table 3.3 Educational Qualification of Respondents:

Educational Qualification	No. of Respondents	% of Respondents	% Cumulative
Koranic education	28	28	28
Illiterates	26	26	54
Primary school	24	24	78
Sec/Tech. school	18	18	96
Dipl./University	04	04	100
Total	100	100	100

Source: Field survey; 1996.

3.4 Religious, Economic and Socio-Political Arrangements:

The larger number of the respondents (native and non-indigenes), belong to the Islamic religion, Christianity is the second main religion in the area, while, finally, a few practice neither religion. Religious clashes between Moslems and Christians, have always been the bane of mistrust and non co-operation among the people in the area which have left negative consequences on stability and peace which has also affected agricultural development in the area.

Due to this constant fracas and instability in the areas, most non-indigenes do not want to engage in long term developments among which is (agriculture), for fear of chaos and having to

abandon property to secure life. This thus has implication for agricultural production and land improvement.

Economically, agriculture in the area, offers employment to the larger number of the people and is mainly on subsistence basis. This however in the study area is being carried out along with other activities such as craft and trade. The larger number of those interviewed make use of tractors and animal traction in production and subsist on land between 1.3 to 1.8 hectares per respondent.

Socially, the people are arranged along communal and family lines, inheritance or property acquisition is based on patrilineal descent, that is through the male offspring. Marriages in the area are mainly along tribal and religious linesbut there are cases of defection. The social relationship in the area also affects the agricultural practices, as families organize themselves into (Gandu) or family work team to assist one another in farming, especially, where a member is short of labor.

Politically, the area is under the authority of local government authority which is the third tier of government referred to often as the "grassroot government". The executive arm is headed by the chairman or as the case may be. This is further controlled by the ministry of local government situated in Kaduna the state capital.

The local authority presides over a wide range of activities, namely; provision of public services, (health, justice, education, etc). The village head serve as link between the authorities and the rural people by ensuring smooth passage of information. A number of specialised agencies

operate at the district level, these includes; agriculture, veterinary services, forestry, health, public work, education, co-operatives, etc. Agricultural services and supplies are made available and distributed from the local government areas to the villages.

However, farmers in the area are generally facing lack of and inadequate supplies of these essential services and inputs such as; agricultural credit, inputs and extension servicesneeded to improve agriculture. These difficulties to a large extent inform and influence farmers decision to grow crops or expand.

3.5 Farming Systems:

Most of the farmers in the study area specialize on farming, trade and crafts, and with wage labor, permanent or casual as a sub-category. The rural population are originally agriculturist and over 70% of the active population still practice and are dependent on agriculture for livelihood. The underlying assumption makes land a socio-economic variable of great importance.

Inspite of the substantial amount of labor force engaged in agriculture in the area of study, the goals and potentials of agricultural development are yet far from being fully realised. For example, Ega (1978), is of the view that in 1957 to 1958, only a total of 850,000 acres, (340,000 hectares) were under farming. This according to him represent only 7% of the total land area or about 13% of potentially useful arable land. The average holding per farmer he asserted was 4.5 acres (1.8 hec). Although estimates of unused arable land suggests great potentialities and opportunities for farmers to expand, at present technical deficiencies make this difficult.

To farmers suitable agricultural land is that which can beprofitably cultivated with minimal investment in outside labor. This is understandable in view of their limited investment ability. Yet it is again doubtful if the unused arable land can be cultivated without irrigation and intensive use of agricultural inputs. In addition, since not all farmers employ the service of tractors needed to clear "virgin land", the task is herculean.

Also the use of yield increasing inputs such as fertilizer and improved seed varieties is limited because of problems of scarcity and distribution and financial inability of most farmers to secure them. This situation limits further expansion of hecterage and output. and if effort is not made to overcome these constraints, the needed expansion will not be possible. As will be seen later on increasing pressure on "desirable" arable land has led to alteration in tenure principles and holdings.

Most of the labor input in the area is provided by the farmer and his dependants or relatives. However, those who have more land than they and their families could cultivate do meet their labor needs with hired labor. This is provided by men who are either landless or occupy only tiny holdings that cannot keep them sufficiently occupied. Due to the nature of rainy season in the area, the demand for labor tend to reach its peak in the months of June/July, even though labor requirement is high, the nature of rain makes full-time farming difficult for most people.

Agricultural production in the area is geared towards subsistence needs, with only marginal emphasis on production for exchange. Agricultural activities in the areas are centred around the

cultivation of crops and livestock, namely; maize, sorghum, cowpea, groundnut, yams, vegetable, pepper, onion, etc., and cattles, goats, pigs sheep, donkeys and poultry.

Finally, most of the farmers in the study area, practice only rainy season cropping while, only a few practice dry season cropping using irrigation facilities and on fadama land.

3.6 Variables.

3.6.1. Independent Variables:

The independent variable of this study is land commercialization. Commercialization refers to the exchange between men of the product of nature and art. It involves the buying and selling or commoditization of land by individuals or groups. The following transactions were considered as commercialization;

1. Rent; It is the return or payment made (in money or kind), by a tenant to the landlord or landowner at a certain specified time for the use of land. This was measured by the amount (₦) paid as rent to cover the period of lease per hectare of land.
2. Purchase; It is the acquisition by payment of money or its equivalent, to acquire property. It involves the outright transfer of land ownership from an individual or group toanother, through the payment of money or its equivalent. This was measured by the amount (₦) paid per hectare of land.
3. Land; It refers to the physical land available to the farmer for cultivation during the study period. It was measured in hectares (ha).

4. Labor; It refers to the total amount of hired labor the farmer was able to use for his farm during the study period. It is measured by amount paid in (₦).

5. Capital or income; It refers to the amount of money (₦) invested in farming by the farmer minus the amount realised from the field.

6. Family size; This refers to the total number of the people in the household, namely, wives, children, and dependants the farmer has.

3.6.2 Dependent Variables:

The dependent variable of this study is agricultural production. This was measured by total output produced of crops by a farmer per hectare in a given agricultural season and is measured in price (₦) per bag.

3.7 Analytical Tools:

The data for this study were subjected to analysis using a set of statistical tools comprising simple descriptive statistics and multiple regression models.

The descriptive statistics comprised measures of central tendencies and dispersion such as, mean, median, mode, and use of tables, while the multiple regression model was used to determine the relationship between the independent variables namely; rent, purchase, land, labor, capital, and family size against the dependent variable namely; total output.

3.7.1 Statistical Analysis:

To determine the broad objective of this study, that is the effect of land commercialization on agricultural production, a multiple regression model was used:

Multiple regression arises when we include more than one independent variable in trying to predict or explain variation in a dependent variable, secondly, it allows us use many independent variables to predict the value of a dependent variable, thirdly, it allows us to determine which independent variable has the greatest impact on a dependent variable (e.g. which factor is most important in determining agricultural production - rent, purchase, land, labor, capital and family size).

Fourthly, it allows us to specify the relationship among the independent variables in order to discover the mechanism by which they relate casually to the dependent variable.

The general formula for a multiple regression is;

$Y = a + b1X1 + b2X2 + b3X3 + b4X4 + b5X5 + b6X6 + \ldots e$

where each (X), represent an independent variable,

Y = total output,

b1 - b6 = regression co-efficient,

where X1 = rent (₦)d,

X2 = purchase (₦),

X3 = land (ha),

X4 = labor (₦),

X5 = capital/income (₦),

X6 = family size (nos).

3.8 Limitations of the Study:

The main limitation of this study is that, the study only took into cognizance one aspect of commercialization which is the sale and rentage of land leaving out many other aspects of commercializations like; the profitability and market oriented nature of commercialization.

Also another limitation of the study is that record keeping among the respondents is generally rudimentary, most of the information provided was based on memory recall, which is often quite defective in character.

CHAPTER FOUR

PRESENTATION OF RESULTS AND DISCUSSIONS

4.1 Documenting Land Acquisition Methods, Land Utilization, Agricultural Production, and Security of Tenure:

The data on distribution of respondents according to commercial tenure types in the study areas, below indicates two types of commercial tenure types that are dominant in the area namely; purchase (60%) and rent. (40%), while others like pledge which also is a commercial tenure type was completely absent in the response received from the respondents. The reason why the larger number of the respondents acquired land through purchase in the area is due to the advantages it wields over land acquired under rental arrangements, namely; that purchase land offers higher security of tenure (94%) as compared with rent that has only (6%), as found in (Table 4.9) of the study.

Table 4.1 Commercial Types of Acquisition by Respondents:

Commercial land acquisition type	No. of respondents	% of respondents
Purchase	60	60
Rent	40	40
Total	100	100

Source: Field survey, 1996.

Table 4.2 below, shows the durational period of acquisition of land under both purchase and rented lands. The calculated average number of years of holdership under purchase (3yrs.), appears higher than that of rent whose average is 2years. Thereason for the high average period of holding of purchase land is accounted for by the security of its tenure.

Table 4.2 Duration of Commercial Land Acquisition Period by Respondents:

Land acquisition type.	Av period of acquisition	No. of respondents	% of respondents
Purchase	3	60	60
Rent	2	40	40
Total		100	100

Source: Field survey, 1996.

Table 4.3 below, shows the categories of people involved in the commoditization of land. The table shows that the highest percentage of the land sold were bought from the farmers (68%), while, also the remaining 32% of the land sold was made by village heads.

Table 4.3 Categories of People Involved in Commercialization of Land:

Categories of people involved in commercialization of land	No. of respondents	% of respondents
Farmers	68	68
Village head	32	32
Total	100	100

Source: Field survey, 1996.

Table 4.4 below, shows the form of payment and amount paid per hectare for land acquired under the below mentionedcommercial acquisition types. The table shows that an hectare of land at an average (₦923.33K), under purchase cost more than similar hectare of land at average price (₦572.50K), under rent. The reason for the disparity in prices is due to the fact that rented land is durational in nature and as such attracts lesser value, while purchase land has a permanent character and as such the buyer pays higher prices because the land remains his own after the contract for sale has been made and thus the selling owner also made as much money as the benefit the land offered him.

Table 4.4 **Distribution of Respondents According to Commercial Tenure Type, Forms of Payment, Size of Hectare and Amount Paid on Land:**

Acquisition type	Average size of holdings (ha)	Form of payment	Av amount of money paid per hectare (₦)
Purchase	1	cash	₦923.33 K.
Rent	1	cash	₦572.50 K.

Source: Field survey, 1996.

Table 4.5 shows the distribution of respondents according to land holding type and size of holdings. The average calculated size of holding for respondents under purchase (1.8 ha), is higher than for respondents under rental which is (1.3 ha.). The reason for the disparity in holdership at an average is due mainly to the fact that most people who hold land under purchase are those who have major interest in farming and as such require larger hecterage, while those who hold land under rentals onlyparticipate in farming so as to subsidize their income and so do not require very large land sizes as they are not able to cope with the huge labor demand and management needs of the farm.

Table 4.5 **Distribution of Respondents According to Land Holding Type and Size of Holding:**

Commercial tenure types	Average size of holding (ha)	No of respondents	% of respondents
Purchase	1.8	60	60
Rent	1.3	40	40
Total		100	100

Source: Field survey, 1996.

Table 4.6 below, shows the distribution of respondents according to technology used. The table indicates that a higher number (62%), of respondents operated the mechanised system of agriculture, while only 38% of the respondents operated labor intensive system of agriculture. The

case for the higher number of the respondents using mechanised system of agriculture which is not traditional to the area of study, is due to the fact that the questionnaire used in gathering this information accounted for the use of animal traction as mechanisation.

Also responsible for this is the fact that the study purposely used sample based on commercialization, and thus the high rate of samples using mechanised forms of agricultural technology that ensured greater profitability and higher output.

Table 4.6 Distribution of Respondents According to Technology Used:

Technology used	No. of respondents	% of respondents
Mechanised	62	62
Manual labor	38	38
Total	100	100

Source: Field survey, 1996.

Table 4.7 below, shows the distribution of respondents according to inputs used. The table shows that all of the respondents (100%), make use of fertilizer, this high fertilizer usage is due to the soil type in the area and also the crop types planted there. The table also reveals a similar high rate (100%), in the use of seeds, the reason behind this need not be explained too far, as seedling is primary to agriculture, for without seeds there cannot be germination of needed crops.

Furthermore, the table indicates that 62% of the respondents make use of machine, even though this is not common generally in rural areas, this situation as revealed by the table is due to

the merging of animal traction with tractor as earlier explained in (Table 4.6). This however did not imply that all the processes in agriculture in the area are mechanised.

Finally, the table records a low input use of chemicals (36%). this is due to the fact that cowpea is not a common foodtype in the area, and since it is about the only crop that necessarily require the use of chemical to prevent the incidence of pest and diseases and also storage which requires the use of chemicals to protect crops, is often out of the case as most respondents in the study area hardly store their crops for so long and where they do, often use the more traditional methods of storage.

Also virtually all the respondents asked on whether the use of inputs have led to increase in production and profitability answered in the affirmative. This is explained by the high number of people who engage in agricultural production processes in the area both as full time farmers or as a form of subsidizing other employment incomes that they engage in.

Table 4.7 **Distribution of Respondents According to Inputs Used:**

Use of inputs	No. of respondents	% of respondents
Fertilizer	100	100
Seeds	100	100
Machine	62	62
Chemicals	36	36

Source: Field survey, 1996.

Table 4.8 below, shows the distribution of respondents according to profit made from commercial tenure types. The table shows that respondents who operate under purchase system of

commercial tenure have a higher average profit (₦25,012.33K), than respondents under rental whose average stood at ₦18,138.75K. From the table, it is evident that respondents who operate under purchase have a higher percentage of average profit than those who operate under rentals.

This is true to type based on the fact that respondents under purchase generally, do cultivate crops other than food crops on their land and this in turn generates more profit as they are economic crops and attract more money than respondents under rental who because of time span under which they can cultivate are forced to produce only food crops which are consumed immediately due to their perishing nature and thus do not make the desired gains on them.

Table 4.8 Distribution of Respondents According to Agricultural Profitability by Commercial Tenure Types:

Tenure types	No. of respondents	Total amount earned (₦)	Total amount spent (₦)	Av.profit earned (₦) per farmer
Purchase	60	1,069,230	318,860.00	25,012.33
Rent	40	507,875	145,100.00	18,138.75
Total	100	1,557,105	463,960.00	43,151.08

Source: Field survey, 1996.

Table 4.9 shows the tenure type with the most secured form of tenureship. The table indicates that the respondents who had land under purchase are the most secured (94%), while those with land under rentals came next with only 6% of the total respondents.

The case for purchase having the highest level of security of tenure is practical and clear. Purchase tenure is in most cases bounded by legality. There is usually a certificate of occupancy granted to the owner, and court records to substantiate claims in case of conflict. This thus makes its holdership more or less permanent and uneasily irrevocable.

Whereas with rented land, the owner can reclaim land back from the holder with or without any substantive reason, and as such its said to have no time span, to be highly unstable and insecure. Also rented land are only covered by witnesses and receipts of payment with duration attached to them.

Purchase as a form of tenure has gained ground over time, not only for the fact that it provides its owners with security, but also that it allows the owner the right to own land as a property, a form of collateral for loan and finally, boost his ego or generate in him pride of ownership.

Table 4.9 Distribution of Respondents According to Most Secured Form of Commercial Tenure:

Best security of tenure	No. of respondents	% of respondents
Purchase	94	94
Rent	06	06
Total	100	100

Source: Field survey, 1996.

Table 4.10 below, shows that rent (90%), is the highest least form of tenure security, while purchase (10%) is the second least form of tenure security. The reason for the high rate of in

security on rented land is related to that of (Table 4.9) explained above. Tenure security is least in rental due to the fact that it is time bounded and as such the holder looses right to such land the moment the time agreed upon elapses.

The low level of respondents (40%, see Table 4.1), who have land under rental arrangements, explains its low level of insecurity, this as earlier explained is due to multiplicity of factors, namely; respondents who cultivate rented lands cannot make long term plans or development on such, nor use it as collateral for loans needed to stimulate expansion and thus their rating of rented land is low and security of tenure involves all this factors.

Table 4.10 Distribution of Respondents According to Least Form of Commercial Tenure Security:

Least secured tenure	No. of respondents	% of respondents
Rent	90	90
Purchase	10	10
Total	100	100

Source: Field survey, 1996.

Table 4.11 below, indicates the respondents distribution based on non-loss or loss of right to land. The table reveals that a greater percentage of the respondents (72%), have never lost any right to land in the study area, while only 28% of the respondents have been said to have lost any right to land.

The implication here is that, there is a high rate of tenure security in the areas and this is due to the fact that the data collected were mainly those of commercial transactions in land as

such, purchase which was the highest in the study area (60%), posits a very high rate of tenure security and stability. Also is the fact that man to land ratio in the area (1.8 ha for purchase and 1.3 ha for rent), is high, is also contributory to the reduction of conflict and loss to land right in the area.

Finally, there is the fact that not all the respondents known to have lost right to land are still in the area and even those that are, have not been interviewed as this is not thefocus of the study.

Table 4.11 Distribution of Respondents According to Loss or Non-Loss of Right to Land:

Loss non-loss of right to land	No. of respondents	% of respondents
Non-loss of right to land	72	72
Loss of right to land	28	28
Total	100	100

Source: Field survey, 1996.

4.2. The Effect of Land Commercialization on Agricultural Production and Land Use Type:

The linear regression function was used to determine the influence of the explanatory variables, namely; rent (X1), purchase (X2), land (X3), labor (X4), capital (X5) and family size (X6), through the t-value of the regression co-efficient on

the independent variable, output (y).

Table 4.12 Regression Co-efficient and Related Statistics Derived from Linear Function When Postulated Variables are Regressed Against Output (y):

Variables		Regression co-efficient	t-values
Constant term	(Xo)	-238923	(-2.818) *
Rent	(X1)	204.739517	(2.262) *
Purchase	(X2)	197.038965	(2.166) *
Land	(X3)	75.994806	(2.712) *
Labor	(X4)	198.127048	(2.185) *
Capital	(X5)	197.909271	(2.174) *
Family Size	(X6)	1309.690287	(1.865)n.s

R^2 = 56.7%

R^2 = 52% (adjusted)

Figures in parenthesis are t-values of the regression co-efficients.

N.S = not significant.

* = significant at 5% level of probability.

Source: Field survey. 1996.

From the critical t-values of the regression co-efficient, rent (X1), purchase (X2), land (X3), labor (X4), and capital (X5) are statistically significant at 5% level of probability, while only family size (X6), was not significant.

The R^2 value (adjusted) which stood at 52%, shows that the dependent variables namely, rent, purchase, land, labor, capital and family size sufficiently explains the variation in the independent variable (Y), that is agricultural output.

4.3.1 Discussion of Objective One and its implication:

In discussing objective one of the study, simple statisticsinvolving percentages was adopted. It was shown from the data collected (Table 4.1) that the greater number (60%), of the

respondents acquired land through purchase, while only (40%) acquired their land through rent. The fact that the greater number of the respondents sampled got their land through purchase has positive implication for the research, because it confirms the fact that commercial forms of transaction are becoming prevalent, and that the traditional concept of land being acquired only through inheritance is more of a rule than is the reality.

Also the fact that land has now become an object of monetarisation rather than for food production and for survival has implication for future generations as individuals who have huge capital base now capitalise on the commoditization of land to acquire it for purposes other than for food production. This trend has however, not fully been documented in this research due to the fact that all the respondents interviewed claim they use the land acquired by them for agriculture but this would change with time following the economic situation.

Land commercialization even though it encourages large scale agricultural production, stability of tenure and serving as collateral for loans, if not checked by government or its agencies, would lead to the alienation from the land of individuals devoted to the land and would generate a situation ofagricultural land scarcity. Government should ensure that lands transacted remain used for agricultural food production.

Rent which is the second form of commercial acquisition of land identified in the study area should be encouraged. This is due to the fact that it ensures that land owners still maintain their land in accordance with the traditional nature of land acquisition. It also enables individuals with surplus land to rent out some portion of it to individuals who do not have or have enough.

Thirdly, the money collected in form of rent can also be used by the rental family either to improve their own farmlands or for other family uses. fourthly, land under rent are usually too short to allow for long term crops.

But however, rented lands are often over used without being developed by the users. This is due to the fact that the period of rent is usually too short and as such do not provide the user with security of tenure, nor can it be used by him as collateral for loans for expansion. Government should therefore fix a minimum period of time within which users can keep rented land that would allow them to meaningfully operate, develop and enhance their production as the resultant effect of this is often smaller yields in rented parcels as compared to purchase parcels of land. also government should fix a uniform amount of money as rent per hectare for dry and irrigation land.

4.3.2 Discussion of Objective Two and its Implication:

In discussing objective two of the study, simple statistics involving the use of percentages was adopted. The study revealed that the greater number of the respondents (68%), involved in the sale of lands were the farmers themselves, while only 32% of the land transacted for commercial purposes were by the village head (Table 4.3 above). The implication here is that, the traditional concept of land belonging to past, present and future generation of a family or community are being eroded by individual family members now taking upon themselves communal or family rights and disposing land without taking other family members into consideration.

Also the study indicated that all the lands being transacted (100%). are still being ploughed back into agricultural uses. In other to ensure and maintain the continuity of this process of using agricultural land for agricultural production. government should encourage the people by making agricultural production attractive and profitable through the provision and subsidizing of agricultural inputs and implements, provision of rural road networks. storage facilities. marketing chains. soft loans. reduce taxation and better and adequate control of pricing. and finally. guaranteed security of tenure.

These measures would to a large extent encourage the people by raising their capital base and making agriculture profitable.The implication here is that. there would be a recorded boost in agricultural food production. and this would even encourage urban drifters to come back to the land and would to a large extent. help turn the economy around. making agriculture once again an enviable sector of the economy.

This situation. must however. be monitored so that. greedy individuals may not turn this good government gesture to their own advantage by buying all of these subsidized goods from government and export them to neighbouring countries for their own selfish gains.

The reason why all the commercially acquired land in the area are being put back to commercial agriculture in the area is due to the fact that agriculture as rated in the area is profitable. also responsible is the agrarian nature of the area especially its labor force. and the fact that other business opportunities in the area are faced by the inadequate and lack of basic facilities that would be required to enable them operate their businesses.

4.3.3 Discussion of Objective Three and its Implication:

The third objective aims at determining whether or not there are significant association or relationship between the conditions of the transactions acquisition and land use type and agricultural production in the study. In other to achieve thisobjective hypothesis were stated and tested, also variables such as; rent (X1), purchase (X2), land (X3), labor (X4), capital (X5) and family size (X6) were tested subject to their being significant at 5% level of probability.

Empirical hypothesis one;

The higher the level of rented land, the higher will be the level of agricultural production.

Evidences from the data collected shown in Table 4.12 above, indicated that rent (X1), has a statistical significant influence at 5% level of probability on the dependent variable, (output (y)). Thus confirming the stated hypothesis.

Empirical hypothesis two;

The higher the level of purchased land, the higher will be the level of agricultural production.

Evidences from the data collected shown in table 4.12 above, indicates that purchase (X2), has a statistical significant influence at 5% level of probability on the dependent variable (output (y)). Thus accepting the stated hypothesis.

4.3.4 Discussion of Objective Four and its Implication:

In analyzing objective four of the study, it was discovered that, commercial forms of tenure in the area were mainly purchase(60%), and rent (40%). Purchase based on statistics from the data collected in the area is the dominant commercial form of tenure practice in the area (see Table 4.1).

Based on the above data collected, it was evident that the area is witnessing a massive change from the traditional forms of tenure to privately owned tenure system. Thus there is a need for the government to balance this movement of power from customary to privately owned tenure. This is necessary so that there may not be mass alienation of people from the land they own through unchecked and free private enterprising in land, and also so that mediocres in land may not continue to hold land through traditional tenureship rights and stiffen enterprising people's interest in land.

This trend can be checked by government enacting laws and edicts that would guarantee that no single individual sells or transfer land rights to another individual or group without government or its departments notification, or by checking size of land held by an individual or group.

Also land should be made more lucrative through the provision of inputs for cultivation and production so that land owners have higher and continual value for their land than the immediate gratification enjoyed from sale of land.

Land prices should also be pegged high and stable too, to discourage buyers and speculators. finally, land should be accorded the status of serving as collateral for loans by providing the owners with certificate of occupancy and registration. this would reduce the level of land sale as most owners would enjoy having land as an instrument of security.

To also make more land available to individuals with interest in land for agricultural food production, government should check the percentage of un-utilised land in people's hands held through the customary tenure principles as ownership of such land tend to in most cases fall in the hands of family members who either have no value for land or whose available manpower cannot manage the land inherited by them.

And since the tenure system do not allow them to transfer the ownership right to non-members of the family, the tendency is for the bulk of the available land to remain immobile, under developed and unproductive. To stall this movement, there is the need for government to change the laws and move towards the direction of freehold tenure which encourages development and maximization of available resources.

Finally, the study revealed that the bulk of the commercially acquired land was from the farmers (68%) and village heads (32%) as shown in Table 4.3 above. Thus there is a need tocheck the amount and control of land by this group of people to ensure that they do not abuse its ownership and use by creating a situation of mass alienation and under utilization.

CHAPTER FIVE.

SUMMARY, CONCLUSIONS AND SUGGESSIONS

The focus of this chapter is on the discussion of findings in chapter four and conclusions derived from the findings in the previous chapters, recommendations and suggestions for future research on the subject matter.

5.1 Summary of Findings:

The study was based on primary data collected from the study area, during the 1996 cropping season. The purposive sampling method was used to select the 100 respondents that were interviewed during the study. Simple descriptive statistics including the use of tables and percentages were used to determine the position or rank of a variable over another, while linear regression function was used to explain the association between the dependent and independent variables of the study.

The results from the linear regression function indicated that the explanatory variables; rent (X1), purchase (X2), land (X3), labor (X4), and capital (X5) were statistically significant at 5% level of probability in explaining the variation in output (y), while family size (X6) was not significant.

Also, the R^2 value for output (y), stood at 56%, this indicated that the explanatory variables, namely; rent (X1), purchase (X2), land (X3), labor (X4) and capital (X5) did explain the variation in the independent variable.

5.2 Conclusions:

This study was designed to determine the effect of land commercialization on agricultural production in Sabon-gari and Giwa local government areas of Kaduna state. Interviews were conducted on how the respondents acquired their lands, uses being made of such land, how the condition of the transaction' acquisition affects their use of the land, and to what extent this affects agricultural production. The results of these are discussed in chapters four and five. From these results the following underlying conclusions are drawn:

a) That 60% of the respondents acquire their land through purchase.

b) That 100% of the land acquired was used for agriculture.

c) That agriculture based on the data collected is profitable.

d) That rent (X1) purchase (X2), land (X3), labor (X4) and capital (X5) were statistically significant at 5% level of probability while family size (X6) was not, and finally,

e) That the hypothesis stated were accepted.

5.3 Suggestion for Future Research:

Future research should bring to limelight the changing trend from traditional tenureship to private or individualised tenure system, looking at the catalysts and consequence overall.

Also, for the purpose of comparison, similar studies should be conducted in other parts of Nigeria where this trend also exist.

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