# The Concept of Residential Area Planning in Kanuri Traditional Settlement: A Case Study of Maiduguri Urban Traditional Area

**M. Sc. (U.R.P) Thesis**

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CERTIFICATE

This is to certify that this thesis has been submitted as a partial fulfilment of the requirements for the award of Degree of Masters of Science, Urban and Regional Planning.

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## DEDICATION

This work was completed by the Grace of God in Heaven. I therefore dedicate this work to my parents, my brother Danlami and my sisters Martha,Sarah, Deborah and Fibi for their Concern for me during my studies. May God bless them.

ACKNOWLEDGEMENT

The author wishes to express his profound gratitude to all the members of academic staff and colleagues of the Department of Urban and Regional Planning who have in one way or the other rendered help in the process of this great task.

I hereby express my sincere gratitude to my supervisor Mr. J.O. Popoola for his unsurpassed patience in guiding me through out the project.

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Ayuba Itahari Lawan.

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## A B S T R A C T

Maiduguri is an old settlement situated on the fertile siol of the west bank of Mega-Chad the ancient more extensive version of the present Lake Chad, With the doming of the British at the turn of the century the old established market town was selected by them as the administrative capital of the provice of Borno on the ancient Kanuri empire spreading around the Lake and for over two hundred miles to the west. In 1907 the Shehu who is both a political and a religious leader of the empire came to Maiduguri (now Maiduguri Village) remains a small town on the northeastern outskirts of the capital city. Prior to the coming of the British, the only outside influence on this large empire had come across the Sahara by camel-borne trade and Koranic scholars. Konuri society has a strong hier-archical nature of long tradition from the Shehu to the headof household. They have adapted themselves to the harsh extreme of climate in an isolated environment.

Maiduguri has long been influenced since the British system introduced indirect rule the traditional area, remain wholely traditional and grew slowly along with the rapid growing modern sector of the town. With the creation of States in 19&7 North Eastern State was curved out and in 1976 Borno State was curved out of the former N. E. State. Since then Maiduguri has continued as the State capital and the town is growing rapidly.

Maiduguri traditional area is fast growing in ruins, many of the building are dilapidated while others are gradually deteriorating. Secondly, there is an increasing tendency of popu-lation movement from the city's tradition sections into the newly developing residential quaters especially among the younger litterate generetions. Thirdly,_ changes in technology has influenced the life-style and inturn the preferences of existing infra-structure in the older sections of the town where facilities and amenities are inadequate.

It is therefore necessary to study the Kanuri Traditional residential areas with a view of studing the forces which have influenced the evolution of settlement and resulting from the settlement patterns.

Aim. The aim of the thesis therefore is to identify the elements in the Traditional areas with a view to evolving a concept new Residential area planning. The thesis is divided into four parts as seen in the diagram below.

The objectives of the thesis are:-

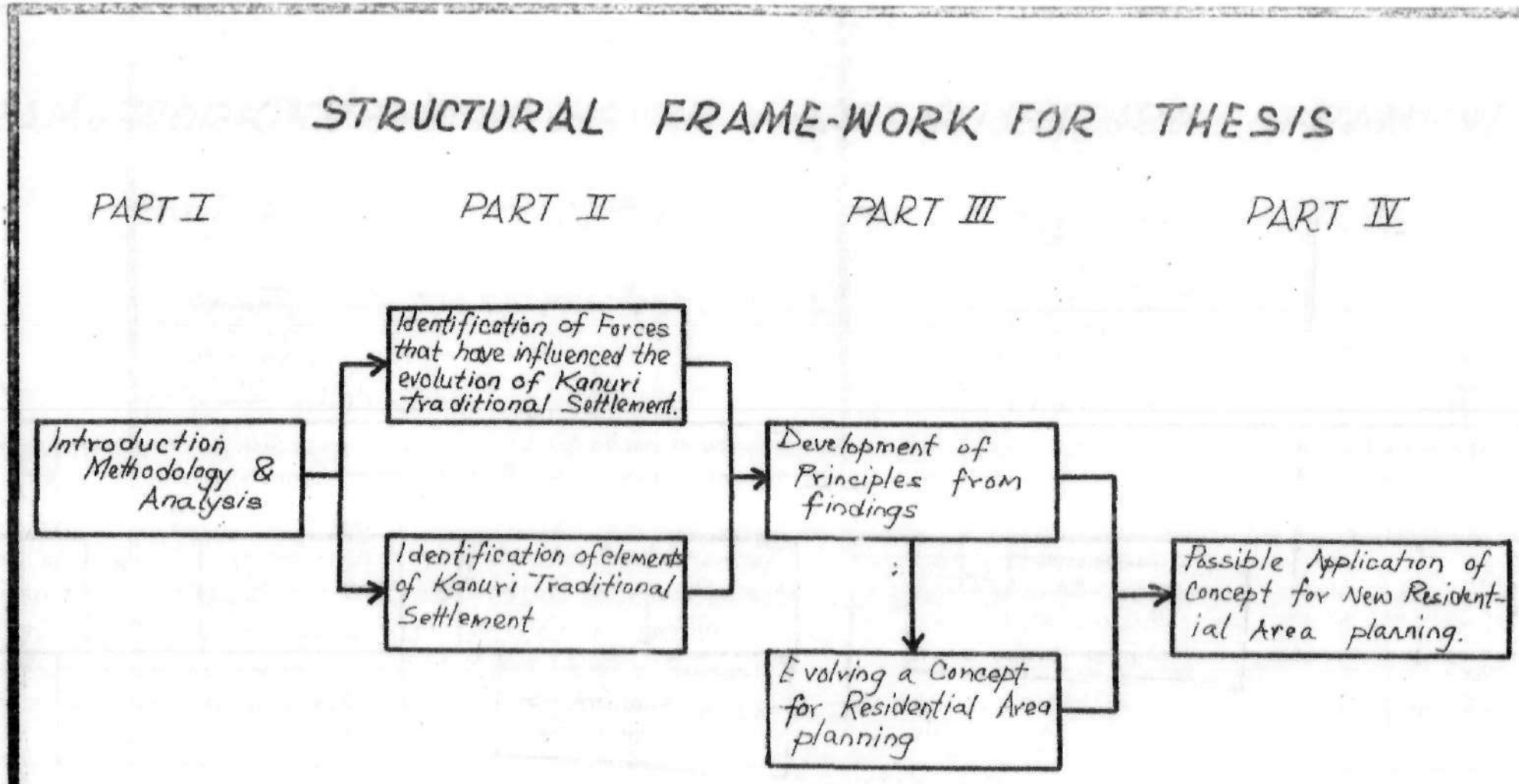
a. To identify the forces which have influenced the evolution of Kanuri Traditional Settlement patterns.
b. To identify the elements in the Traditional Kanuri Settlements
c. To evolve a planning concept for a new Residential area based on the above findings.
d. Possible application of the concept for new Residential area planning.

Methodology.

The methodlogy of the research is both exploratory and descriptive. It is an exploratory studing in the sense that they are those studies in which the nature of the phenomenon is questioned. The primary source of the data was the. sample survey which was conducted in 1980 based on 5% sample survey. The Kanuri Traditional Residential area ward boundaries were used for the study namely Mafoni, Hausari, Limanti, North Shehuri and South Shehuri others include Lamisula, Bula Bulin, Gamburu, Fezzan and Zango.

The household forms the basic unit of the survey. The sample survey covered one out of 10 compounds. All together

# STRUCTURAL FRAME-WORK FOR THESIS



a total of 300 houshold were interwiewed. This represend 5% of the total number of compownd in the traditional area . The study was designed to cover the physical aspect of building condition, socio-economic characteristics and housing preferences of the household. On the physical aspect or condition of the buildings information was required on the building materials, type of house availability of facilities , utilities and services within the wards. While on the socio- economic aspect information collected were based on size and composition of population. On the issue of housing preference information was collected on type of loacality dwelling preferred and the general satisfaction with the locality.

Information collected were analysed and correlated between variables identified and applied in evolving a concept f r Residential area planning. To supplement information from the primary source, secondary sources such as journals, periodicals and textbooks were consulted. Other information not collected through sample surveys and from secondary sources were obtained through informal interview and personal observation and the Master Plan.

Findings.

The study revealed that the main reason of location is ethnic affiliation and religious grouping. About 68% of the respondents knew somebody in the locality before they moved into the various locality.

Considering the length of stay in the locality over 75% of the respondents either stayed all their life time or have been there for over 11 years. It was also discovered that household prefered the courtyard compound type. About 41% would want toremain in the traditional compound type while 34% of them prefered the low cost

type. The general housing condition is very poor and temporary material such as 'zana' amenities such as latrine, bath kitchen etc are all not adequate and even where available they are poorly served.

The forces which have influenced the evolution of settlement pattern include the mechanism from the need for human contacts, Ethnic and Religious affiliation Social profile and the need for privacy based on the aspiration of the people. The elment of Traditional settlements identify include the circulation pattern , socialization points, specialised activity areas , religious focal points, open spaces, residential units etc. The religious background has influened the whole settlement pattern and the hierarchical structure of the elements.

The concept for Residential area planning for Kanuri traditional area will be based on the ' Lawan Concept of Residential Unit 'as a physical planning unit. The concept have been evolved based on the findings of the study and the following are the underlying principles:

a. Residential unit.

b. Circulation pattern.

c. Socialisation points.

d. Activity area.

e. Religious focal points.

f. Open spaces.

These principles are elements of the concept which have been grouped together to give rise to the concept of residential area planning.

It is proposed that there is the need for Redevelopment of the existing Traditional area which has been identified from the study, but it out of the scope of this thesis.

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# chapter 1

# CHAPTER I

## 1.0 INTRODUCTION

### 1.1 Theoretical Background.

Residential area has long been an importnat sector in any settlement. In one form or another the residential areas therefore form the total city set-up and in most cases especially in the traditional settlement they are purely residential with few commercial activities here and there. The mixed-land uses in the traditional settlement plays a vital function in the provision of day to day needs of the people. Religion forms a dominant role in the lives of the society therefore one identifies religious activity areas. In Islamic area therefore, the mosque and other praying ground are scattered all over the residential areas. Few offices and other public institutions may be seen at close proximity to the palace to serve administrative functions. Residential areas are therefore recognised as the basis for a healthy, socio-cultural and physical development of the settlment.

Before the city came into existence, the villages had brough forth the idea of compound and

complex compounds which form the ward system. Those who live within a calling distance of each other share their lives problems together, rejoicing at marriage feast or child birth and engage in other community activities. This order and stability experienced in the village was carried along with its material enclosure and intimacy into the city. Even though some of these die away in the city due to over expansion, it nevertheless remains in smaller units at ward level as characterised in the Geminschaft concept of Urban Social life.[1].

Social interaction has been an important consideration in planning for the society, therefore this has been emphasized along with the neighbourhood idea and the involvements of the residences one with another.

Many writers especially physical planners and geographers saw the residential planning unit (neighbourhood) - ward as physical entity.

Gallion and Eisners[2] categorically stated that

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1. Lewis Munford: The City in History, Penguim Books.

2. A.B. Gallion and S. Eisner: The Urban Patterns, Second Edition, 1963, Van Mostrand Reinhold Company.

"the neighbourhood unit is not some sociological phenomenon, it embraces no particular theories of social science. It is simply a physical environment in which a mother knows her child will have no traffic streets to cross on his way to school, a school which is within an easy walking distance from home. It is an environment in which the housewife may obtain her daily household goods, and the man may find convenient transportation to and from work. It is an environment in which a well equiped play ground is located near the home where the children may play in safety with their friends, the parents may not maintain intimate friendship with their neighbours but children are so inclined and they need the facilities of recreation for the healthy development of their minds and spirits".[3]

Those ideas are seen in the traditional ward level which is both a physical entity and could be used as the basic planning unit at residential area planning especially in Nigeria where smaller planning units could tend to cator for individual needs and aspiration of the people through common use of facilities,amenites and services to be provided at ward level. The concept of the ward as

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3. Mackenzie Patterns of Urban Life, Longman 1968.

a physical entity could still be the mental picture discussed by Pahl in which he quotes Mackenzie as saying that "it is clear to me, that the conception which the average city dweller holds in his own neighbourhood is that of a very small area within the immediate vicinity of his home, the limits of which seem to be determined by the extent of his personal observations and daily contacts"[4].

Religion is a significant aspect of people's lives especially in ancient and traditional settlements, so places of worship (temples, mosques, and shrines) form focal points in the residential areas. For instance Mumford[5] in describing the ancient Mesopotamian cities wrote" beyond the walled but spacious temples precinct, spread a series of more or less coherent neighbourhood in which smaller shrines and temples serve for the householder. Every citizen in ancient Mesopotamia, it would seem, belonged to a particular temple and its good and did work for him the basic of 'citizenship' was in this particular religious affiliation.

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4. Mackenie: Patterns of Urban Life, Longman 1968.

5. Mumford.

The temple was then seen as a focal point within the neighbourhood. He also points out that there is ample evidence to show that the temple formed a nucleus around which residences grew. In some Yoruba towns in Nigeria, shrine located either in the market place or in the Oba's Palace serve as the focal point of the residential area. In Kanuri town including Maiduguri, and most Hausa-Fulani settlements the mosques to which a Konaic Schoo is usually attached, forms the neighbourhood focal point.

It is generally agreed among the planners that the neighbourhood is convenient unit for the supply of services and facilties of a lower order to its inhabitants. The concept varies widely but the essential characteristics remain consistent.

Little emphasis have been placed on the concept for residential area planning in Nigeria. Nevertheless a few people from various disciplcs have touched on the topic of residential areas.

Professor Vagale[6] remarked in his paper that the idea of organized communities for living is not new in Africa, at least not in Nigeria. He listed a

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6. L.R. Vagale: Neighbourhood Planning. Critical Appraisal and Applicability in the Nigeiran Context. Course paer 2. Technical College Ibadan, Department of Town Planning, February 1969.

few historic towns like Ibadan, Kano, Oyo, and Ife which grew 'organically' over a period of centuries and revealed a hiearchical system of residential units, of which the compound is the nucleated element and the residential district the largest unit. It has not determined which to be the basic planning unit. But he said that although these communities may not have been designed after the neighbourhood principle, they certainly reveal that they had certain unitary characteristics through common use of community facilities. He however, asserted that the cantonments, reservation and extension of native cities in Nigeria were not based on neigbourhood idea. Neither are the various estates and residential layouts. He would, however, like that further systematic studies be carried out in the existing community organization to throw light on facors which govern community organizatien and which are conducive to building itegrated, balanced and cohesive communities.

In his work Askari[7] viewed the neighourhood idea in its use as an administrative tool in the traditional society. He said, one has the impression that the traditional 'adulgbe' quarter, considered as a territory, was a somewhat as an administrative unit, less important in the value and attachments of its

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7. Eva Krapf-Askari: Yoruba Towns and Cities, pp.79-81, Claredon Press Oxford 1969.

inhabitants than descent groups, compound, association or 'ilu' town. He emphasized the territorial importance of the different hiearchies of residential units in the town and its rulers at each level.

Mabogunje[8] referred to the idea of neighbourhood in its economic function. He defined "the neigbourhood business streets which form the real centres of neighbourhood economic life throughout the city with grocerries, meat, fruit, and vegetables, drug and other convenience goods predominanting". This show that the neighbourhood business streets are to provide the lowest order retail goods such as those mentioned above. They usually complementary adjuncts to local markets, he concluded.

Ndiomu[9] in his thesis examined the potential for neighbourhood concept exists in Nigerian cities as examplified by the institution of wards in Zaria. That traditional towns in Nigeria are well structured and organised communities having definite hierarchies

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8. A.L. Mabogunje Urbanization in Nigeira, pp. 181, 285-286. Africans Publishing Corporation, New York, 1971.

9. Ndioum, B.B.A.: An Analysis of the Hierarchy of Residential Areas in Birnin Zaria and the Potential for Neighbourhood Planning in Urban Zaria, 1976, M.Sc. Thesis.

of residential units. That they are both physical and social units and also they accord political importance. Each unit is webbed with the other with a network of relationships ranging from kinship, through political to common use of facilities. He also found that the people identified themselves with the problems of their own areas of the town.

In all we find that the emphasis has been on the cultural and communal life of the people. Neighbourhood characteristics is found more in the traditional African scene. It is just being applied in the new areas and as Vagale and Mabogunje rightly pointed out in their works, the validity of the concept in these places is still subject to test.

## 1.2 Literature Review:

Housing is one of the three basic needs of mankind and it is the most important for the physical survival of man after the provision of food. The magnitude of the housing problems varies from country to country and from city to city. The problem of housing provision is becoming the issue of concern by Governments. The housing preferences have to be determined to know exactly the type of housing to be provided.

Not much have been done in determining the housing preferences especially among the residents of the traditional settlements in Nigeria. These

problems generally could be traced right from the colonial periods when there is a fast changing technology and housing preferences competeting along with traditional set-up. This competition with traditional structure makes it difficult to cope with the nature of changes in technolgoy and in turn generating concern for people and governments. There is the general tendency to see that the housing structure in the traditional area are dilapidating and deteriorating because little or no attention is given toward renewal.

Few studies have been done on housing markets in cities in Nigeria and the urban structure of towns. Others have concentrated on Residential redevelopment of traditional areas but little or non is done on drawing a concept from the existing traditional areas which is the main emphasis here.

Something needs to be done about the traditional area that are fast growing into ruins where buildings are dilapidating, others gradually deteriorating. This is out of the scope of this thesis, it suggest a redevelopment programme.

The thesis is therefore places emphasis on the study of Kanuri Traditional Residential areas, the forces which might have influenced the evolution of the settlement and the elements resulting from the

settlement. To evolve therefore a residential planning concept which would preserve those historical elements considered important and modify others to cope with the increasing changes in modern day technological progress. In other words it places emphasis on user satisfaction of the new residential area concept evolved to cater for the socio-cultural way of life.

1.3 Aim and Objective:

The aim of this thesis therefore is:- To identify the elements in the traditional Kanuri Urban Residential area planning with a view to evolving a concept for a new Residential Areas.

The following objectives are set out to achieve this aim:

1. To identify the forces which have influenced the evolution of Kanuri Traditional Settlement patterns.
2. To identify the elements in Kanuri Traditional Settlements.
3. To evolve a concept for new Residential Area Planning based on the above findings.

1.4 Scope and Limitation:

The scope of this thesis is limited to the traditiona areas of Maiduguri. The traditional core

which covers 5 out of the 7 wards are studied using 5% sample size.

The study is aimed at identifying the forces that have influenced the evolution of Kanuri Traditional Settlements and to establish how these have given rise to the characteristic elements of the tradtional settlements. The elements so identified will be used as a basis for evolving a concept for Residential Area Planning.

The major limitation of the study like that of many studies of this nature in the developing countries is dearth of data. Data on housing conditions and socio-economic characteristics of population are not available therefore information used for this study had to be obtained from sample surveys.

The second shortcoming is that of limited manpower with the required skill in conducting the type of surveys. This problem is further compounded by the time limitations which did not permit a thorough training of the few staff secured.

1.5 Definition of terms:-

The study of Residential Area Planning involves the use of various terms, the meanings of which varies depending on the context. In this study, the

following terms are used as defined below:-

Households:- A household is a group of persons or a single individual who makes arrangements for providing themselves or himself with food or other essentials for living, and in so doing share the housekeeping expenses. There are many categories of household.

(a) One person household: This is a person who makes provision for his own food or other essential for living without joining with others.

(b) Multi-person household: This is a concept of two or more persons who make common provisions for food and other essentials for living. They may be related or unrelated persons. Multi-person households can be further categorized into the following.

(i) Family household: This is a simple household which comprises the husband, wife or wives and children who occupy a simple compound or house.

(ii) Mixed household: This comprises besides the husband, wife or wives and children other close relatives of the husband or the wife.

(iii) Extended family household: This comprises beside husband, wife or wives and children,

other sub-families of married sons and daughter or other close relations contributing in money or kind to the house keeping and acknowledging the authority of their senior members. They occupy the complex compound and the head of the household is refered to as the complex household head. The household head is therefore that person in the household who is acknowledged as such by the other members of the household.

Housing Units: A housing unit is a house, an apartment or other group of rooms or a single room occupied or intended for occupancy as a seperate living quarter for one household with seperate or shared utilities and facilities.

1.6 Methodology:

Much of the study was designed to obtain descriptive information about indicators for successfulresidential area planning in Maiduguri. The study is also exploratory since it is intended to be a search for the potentials for residential area planning concept in Nigeria.

In order to identify both the forces and the elements which might have influenced the evolution

of Kanuri Traditional Settlement pattern, the questionnarie was prepared to find out:

1. The user satisfaction
2. Residential mobility
3. Residential preferences
4. Resiential neighbourhood/ward preferences

The questionnaire employed can be referred to in the appendix I. The data collected apart from the use of the questionnarie was a vist to all the locality to observe directly which involved and informal recording of the life in the localities. Relevant documents were also contacted one of such is the Maiduguri Master Plan prepared by the Max Lock Group Nigeria.

Selected persons in the locality deemed knowledgeable about the facts pertaining to the locality were interviewed in a less formal situation by the interviewers. This category of informants included the 'Ajia' (District Head) the 'Lawan' (Ward Head) and the 'Bullama' the sub-ward heads.

A total of 300 households were interviewed. This is 5% of the total population of the traditional area.

The household were sampled by picking every 10th compound in the locality and on the whole

between 50-65 households were interviewed in the five wards selected as a sample size for the whole area. Fig. 2 shows the sample areas.

The criteria used for selecting the five sample area in the traditional area was based on proximity to the Shehu's Palace so all the wards nearest the palace were selected this is because of they form the first set of dwelling to the Shehus. Secondly this is because they play an important role in the whole traditional set-up right from the religious, socio-political and cultural function is performing. It is noted that as one moves physically away from the palace the religious, political and social interrelationship with the Shehu diminishes. Fig. 3 shows the position of the wards, the centrality of the Shehu's Palace and the orderliness in term of grid-iron pattern of layout due to influence of later linear planning as opposed to the organic development of pattern in the central area of the settlement.

# MAIDUGURI SHOWING EXISTING SITUATION.

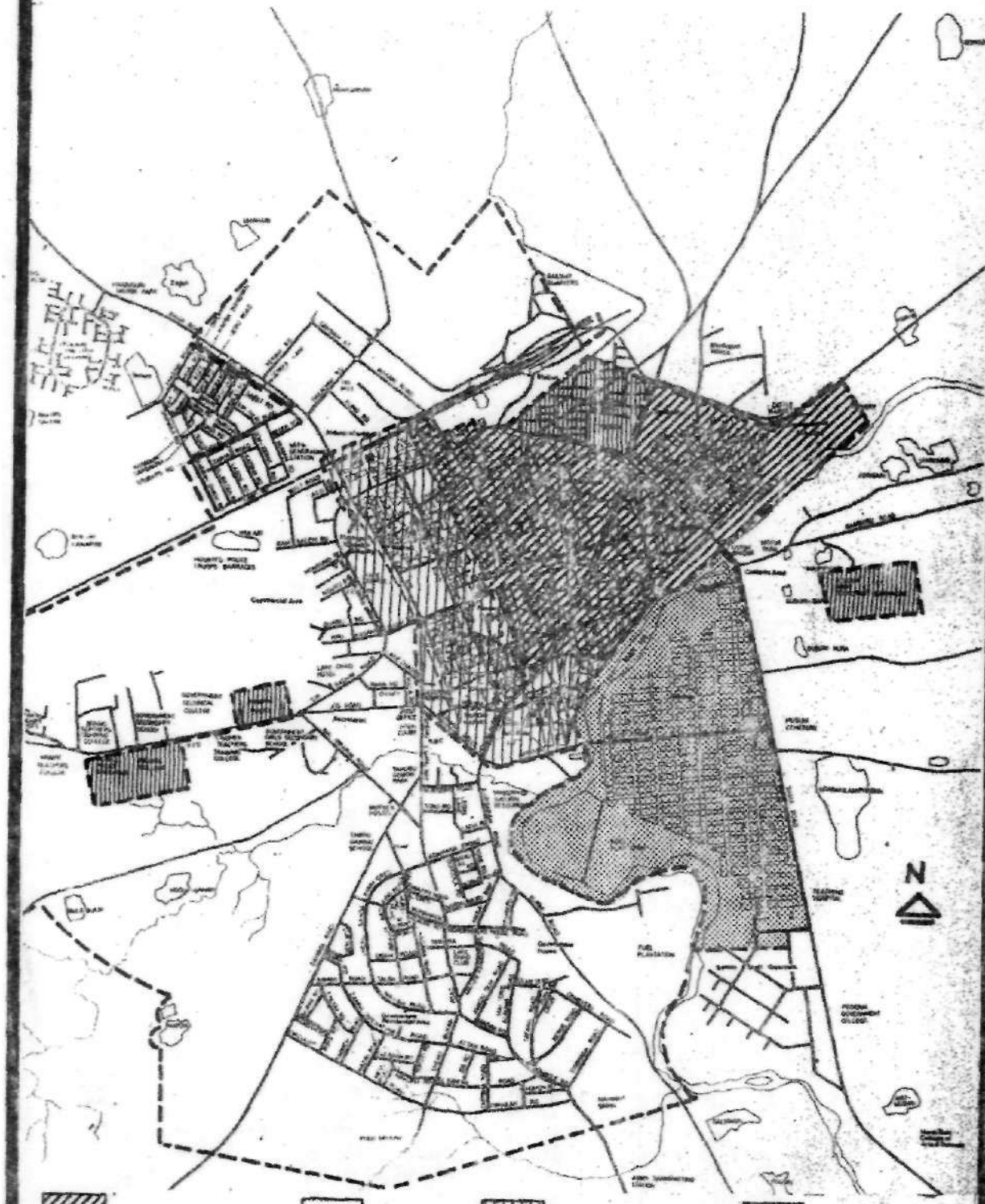
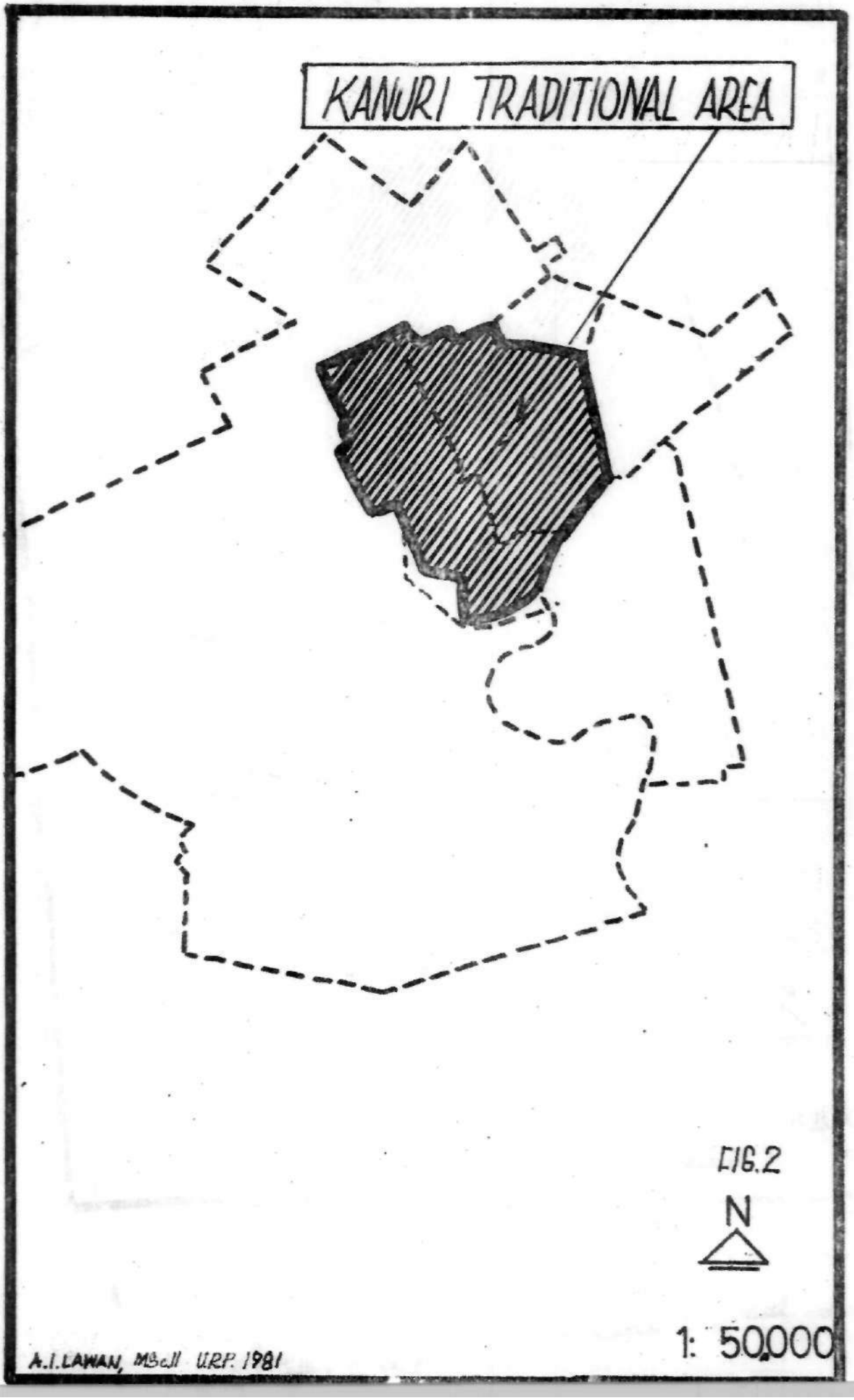
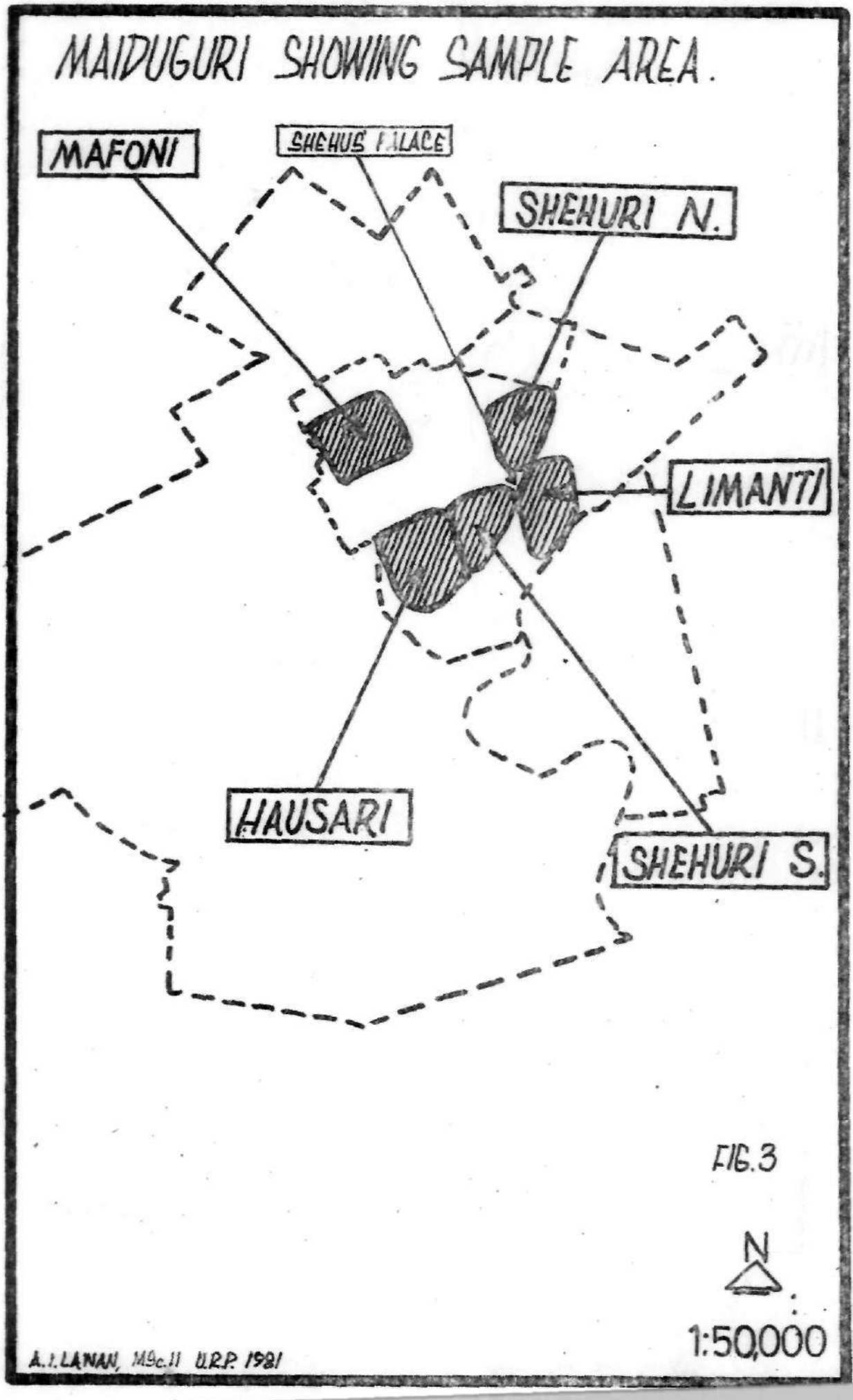



FIG. 4b

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A. I. LAWAN, MSc.II URP. 1981


KANURI TRADITIONAL AREA
FIG.2
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A.I.LAWAN, McGill U.R.P. 1981


MAIDUGURI SHOWING SAMPLE AREA.
MAFONI
SHEHUS PALACE
SHEHURI N.
LIMANTI
HAUSARI
SHEHURI S.
FIG.3
N
1:50,000
A.I.LAWAN, MSc.II U.R.P. 1981

# KANURI TRADITIONAL AREAS.

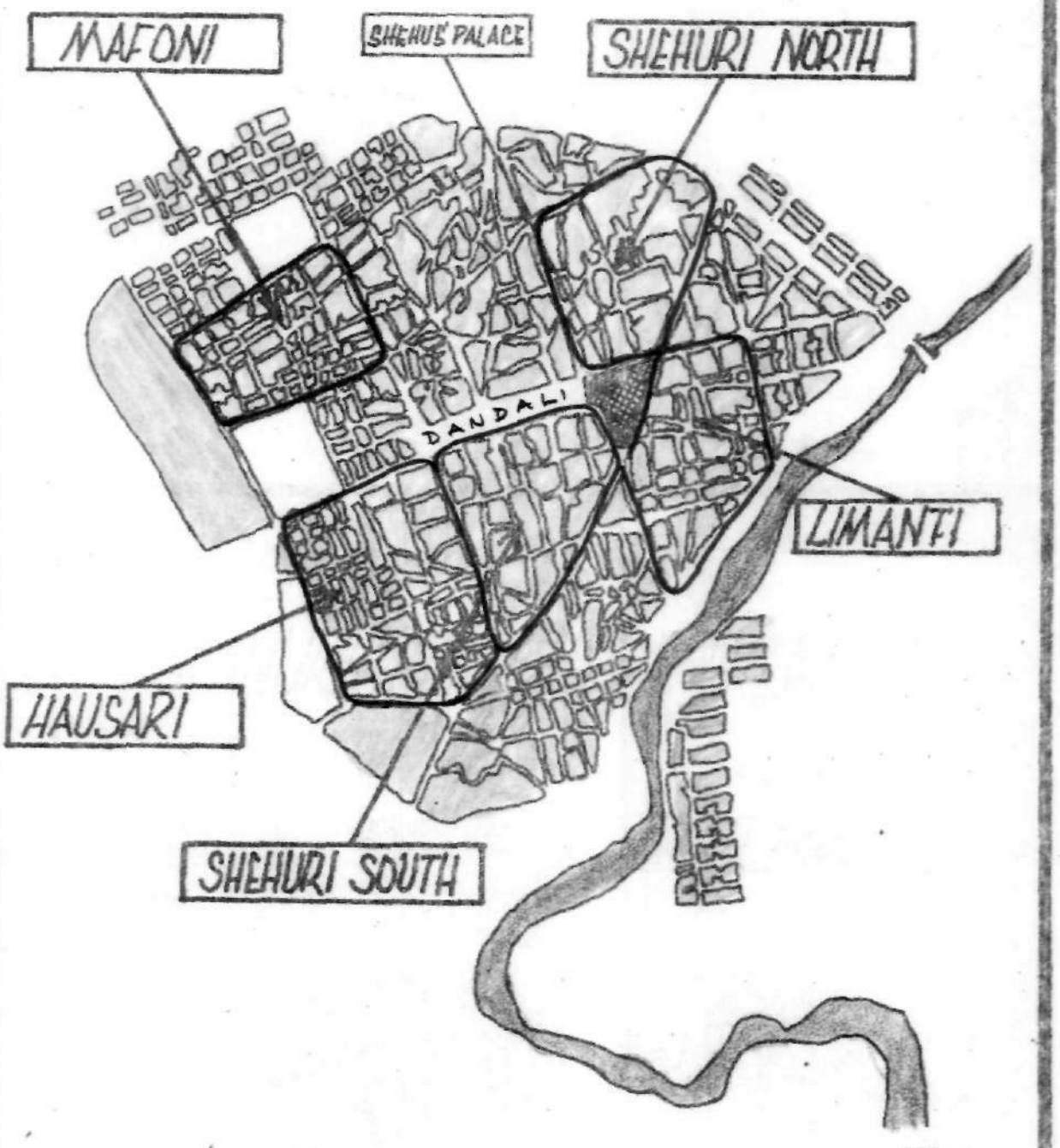



FIG. 1a

N

1:25,000

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# chapter 2

## CHAPTER II

### 2.0 ANALYSIS OF DATA.

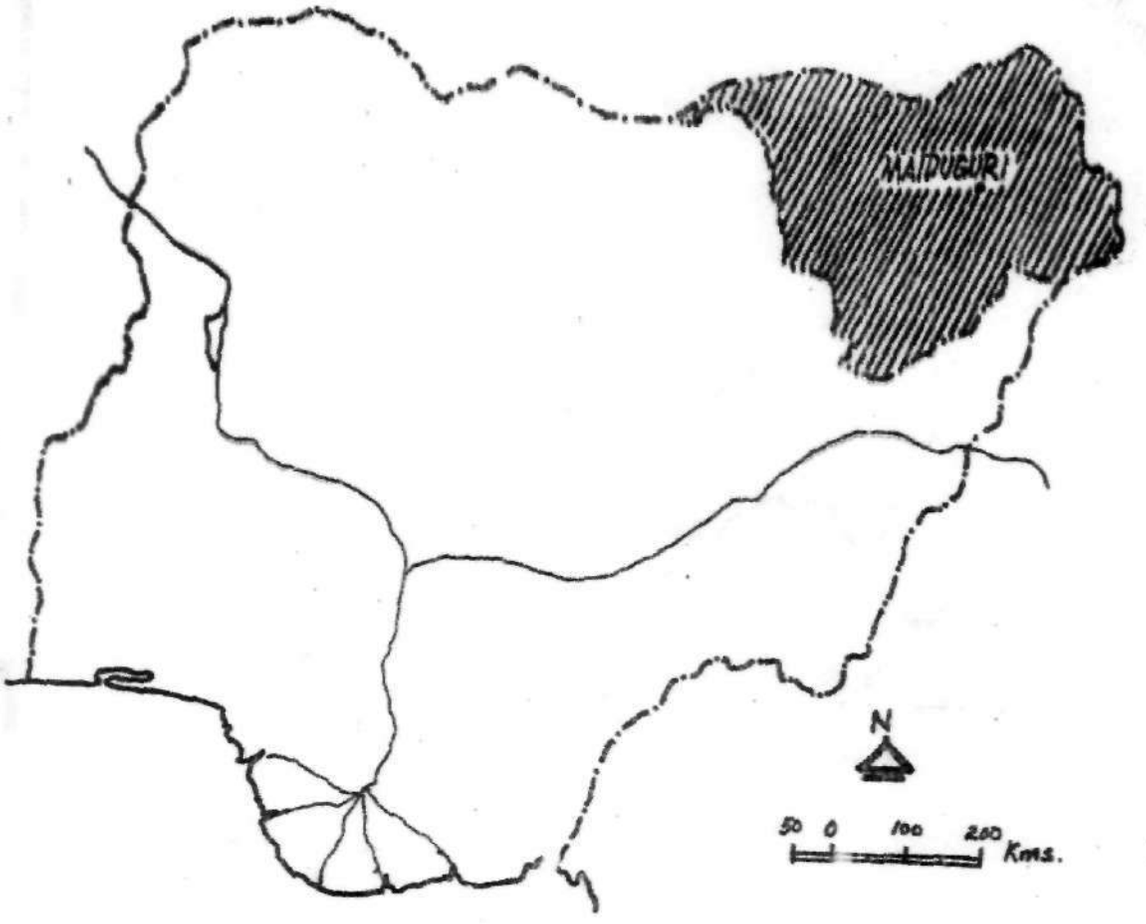
### 2.1 Area of Study:

The Kanuri society form the major ethnic group found in the present Borno State of Nigeria. The Kanuri peoples have a strong cultural binding force which has been influenced from the religious background of the people. The Islamic, religious and legal life of the people has been strongly influenced by the specialized religious practioners who were steeped in the Koran and Islamic jursiprudence. The chief judge and the religious leader of the Kanuri society was given the title of 'Talba' and is referred to in tradition as second to the King or Shehu.

In order words the Kanuri people have strong socio-cultural and religious binding force which have influenced the whole set-up of the residential area planning which have emerged organically over centuries.

The city is therefore located at latitude $11^{\circ}15'N$ and longitude $13^{\circ}05'E$ and stands at some 1160' above sea level. Maiduguri has therefore been a dominant to Kanuri settlement in the North East of the presently Borno State of Nigeria see Fig 1 and its location closed to the Republic of Chad, Niger and Cameroon

# MAP OF NIGERIA SHOWING BORNO STATE.



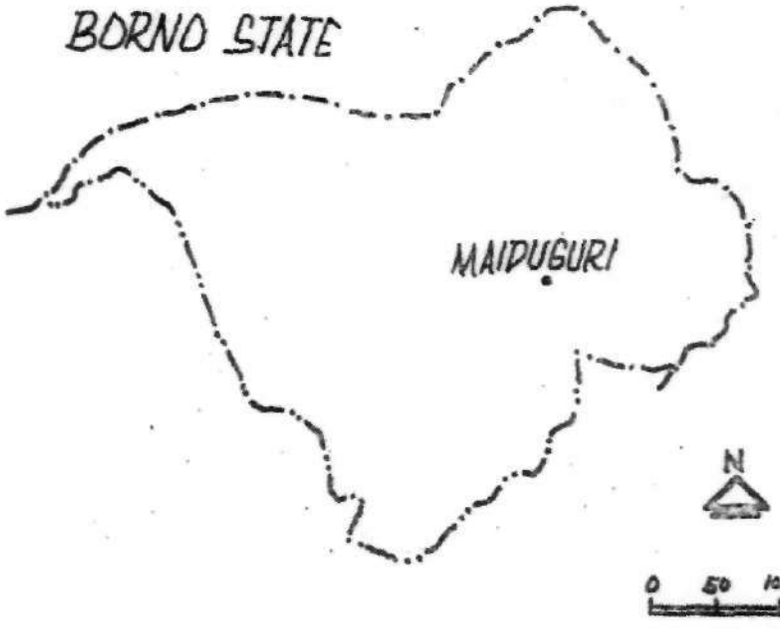




FIG. 1

A.I. LAWAN, M.Sc. II URP. 1981

Borno State is in the extreme north east of Nigeria and boards the Nigeri Republic and Cameroons. It is the largest geographical state in the federation having an area about 117,000 square kilometres representing almost 13% of the land area of Nigeria. It has an estimated population of 4.5 million (1977) which represent less than 5% of the Nation's population. Maiduguri had since the colonial days been the capital of Borno Emirate, North Eastern State in 1968 and Borno State in 1976. Fig. 4 shows Kanuri Traditional area in relation to the whole town.

2.2 Analysis of Existing Situations form Field Survey.

The sample distribution of respondents by age in the sample area of study are shown in Table 1.

Table 1: Age Group by Ward.

| Age Group | Mafoni | Limanti | Hansari | Shehuri North | Shehuri S |
|---|---|---|---|---|---|
| 0-15 | 3.6 | 15.4 | 23.1 | 18.5 | 10.0 |
| 16-25 | 31.0 | 44.6 | 30.7 | 49.2 | 40.0 |
| 26.55 | 52.7 | 32.3 | 38.5 | 27.7 | 30.0 |
| 56+ | 12.7 | 7.7 | 7.7 | 4.6 | 20.0 |
| Total | 100 | 100 | 100 | 100 | 100 |

Source: My field survey 1980.

# KANURI TRADITIONAL AREA SHOWING SAMPLE AREA.

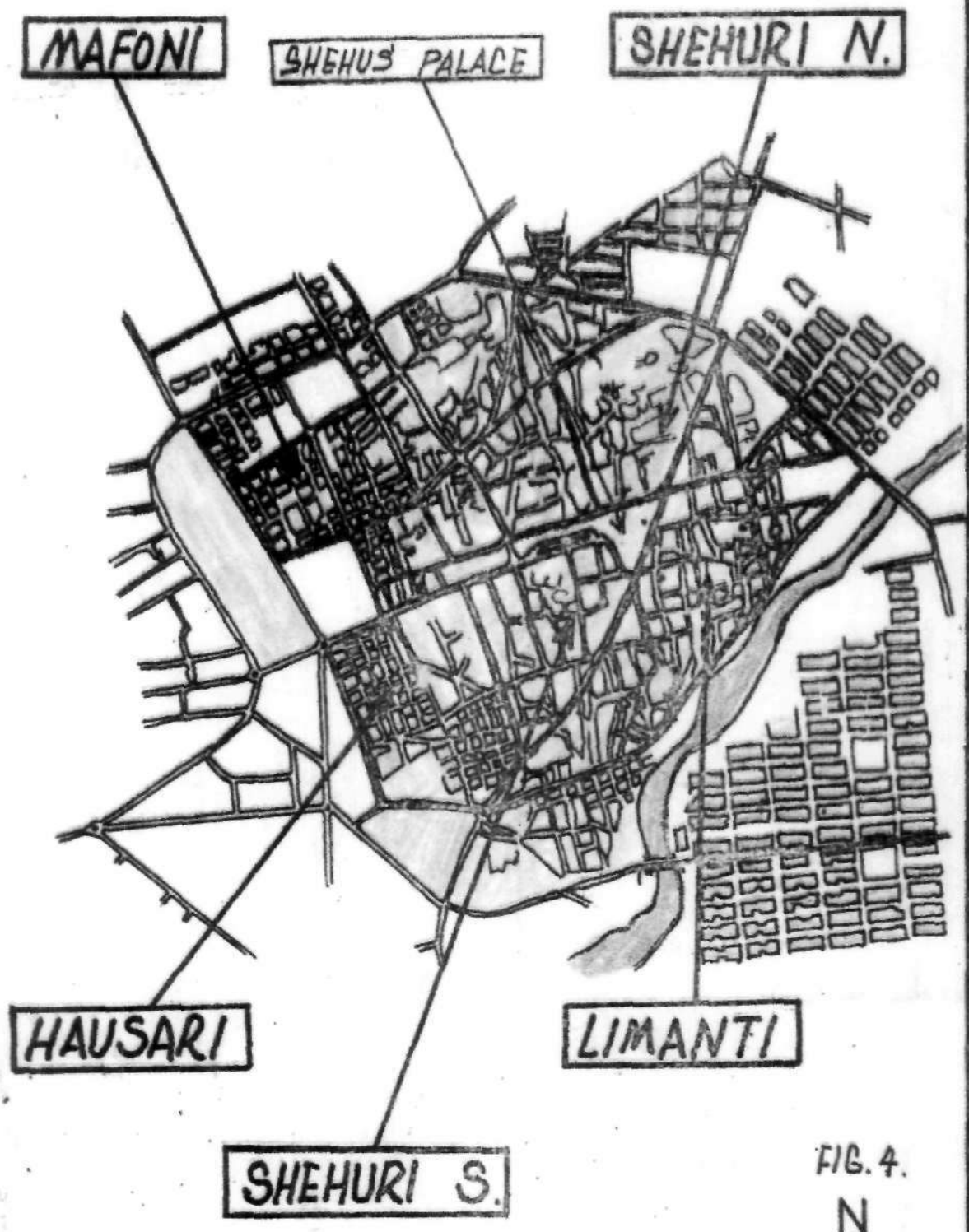



FIG. 4.

N

1:25,000

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The distribution of sex by ward can also be seen in the table 2 below.

Table: Sex ratio.

| Sex | Mafoni | Limanti | Hausani | Shehuri North | Shehuri South |
|---|---|---|---|---|---|
| Male | 32.7 | 35.4 | 27.7 | 73.8 | 60.0 |
| Female | 67.3 | 64.6 | 72.3 | 26.2 | 40.0 |
| | 100 | 100 | 100 | 100 | 100 |

Source: My Field Survey 1980.

On the whole the sex ratio for the whole area is 46.0% male and 54% female. The distribution level of education, on the whole about 43% of the respondents were illiterate while those with formal education including Koranic education amounted to 49%, and only 9% of the sample had post primary education from Secondary School, Teachers' Colleges and Technical Institutions. The main reason for such a low percentage may be attributed to the out-movement of the younger illiterate population into the more modern residential areas namely the GRAs and the low Cost Estates. None of the respondents had a university education. Understandably, such individuals would have got their permanent residence in the modern residential areas i.e G.R.As or other low density residential quarters.

By virtue of their education al achievement it has influenced their housing preference. Therefore they would prefer to move out to the low density residential areas where all supporting facilities are made available.

Fig. 5 shows the distribution of educational level by wards in the sample area.

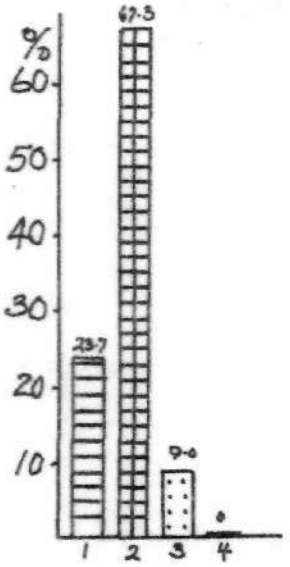
Ethnic affiliation was identified as the strongest binding force to the locations. About 45% of the households interviewed were Kanuri while Shuwa and Fulani constituted 19% and 16% respectively and the remaining 4% were constituted of Bura, Marghi Chibok, etc.

It was revealed that two strong forces have influenced the people to locate in their present locality apart from the fact that they knew somebody before moving in. These factors include proximity to relative and ethnic groups and secondly close to religious groups. Fig 6 shows the reason that attracted respondents to the locality by wards.

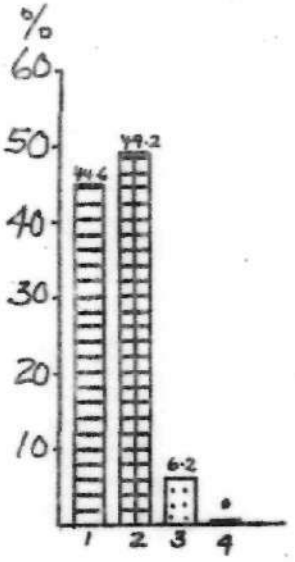
Other reasons which might have influenced migrants especially is the market prospect and proximity to traditional crafts such as dying, weaving and curving. This means that about 80% have made the locality in which they reside as a permanent

# EDUCATIONAL LEVEL BY WARDS

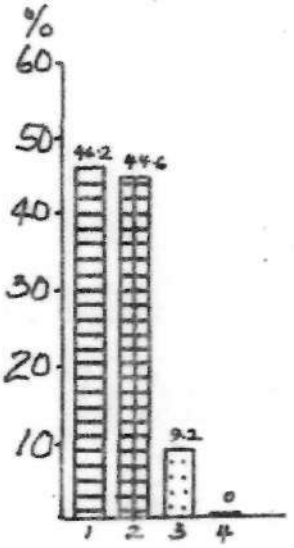
## MAFONI



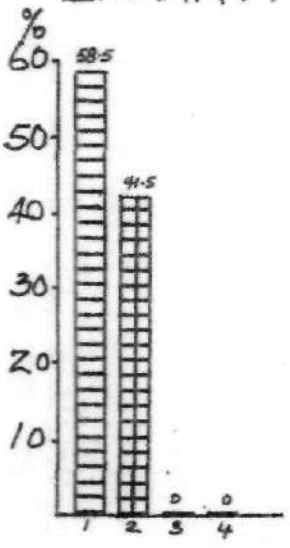

## SHEHURI N.



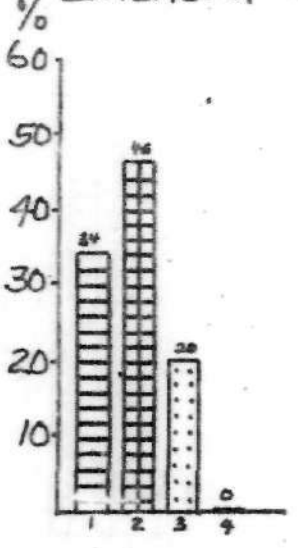

## HAUSARI




## LIMANTI




## SHEHURI S.




1 illetrate
2 Primary Education
3 Post-primary Education.
4 Post- Secondary.

FIG.5

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# REASONS THAT ATTRACTED REPONDENTS TO THE LOCALITY BY WARDS.

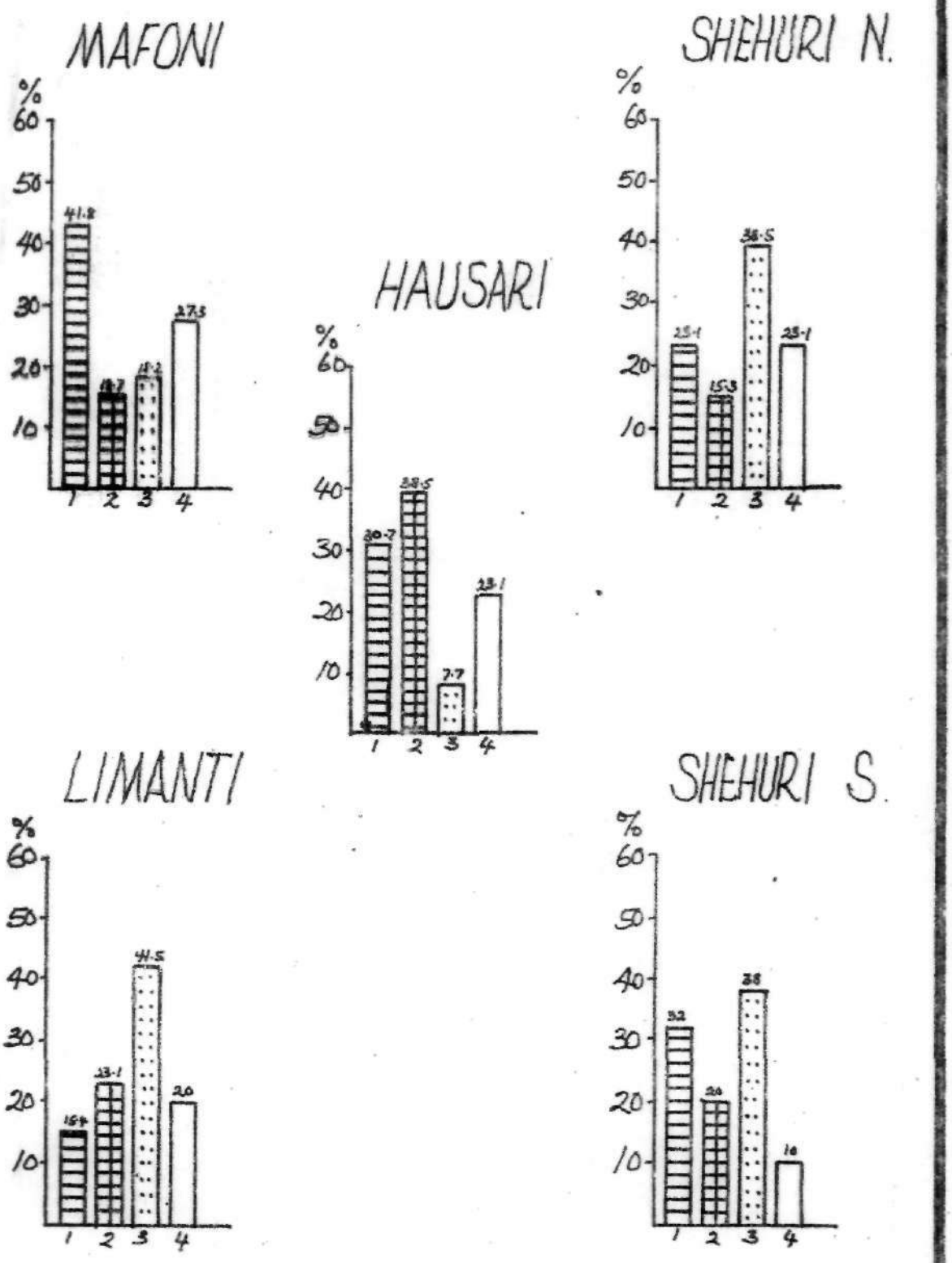



FIG.6

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dwelling place. On the other hand only 16% of the respondents have just moved into the area and have stayed there for not more than 3 years, while only 4% of them have stayed there between 4-7 years. Table 3 shows the duration of residence by locality.

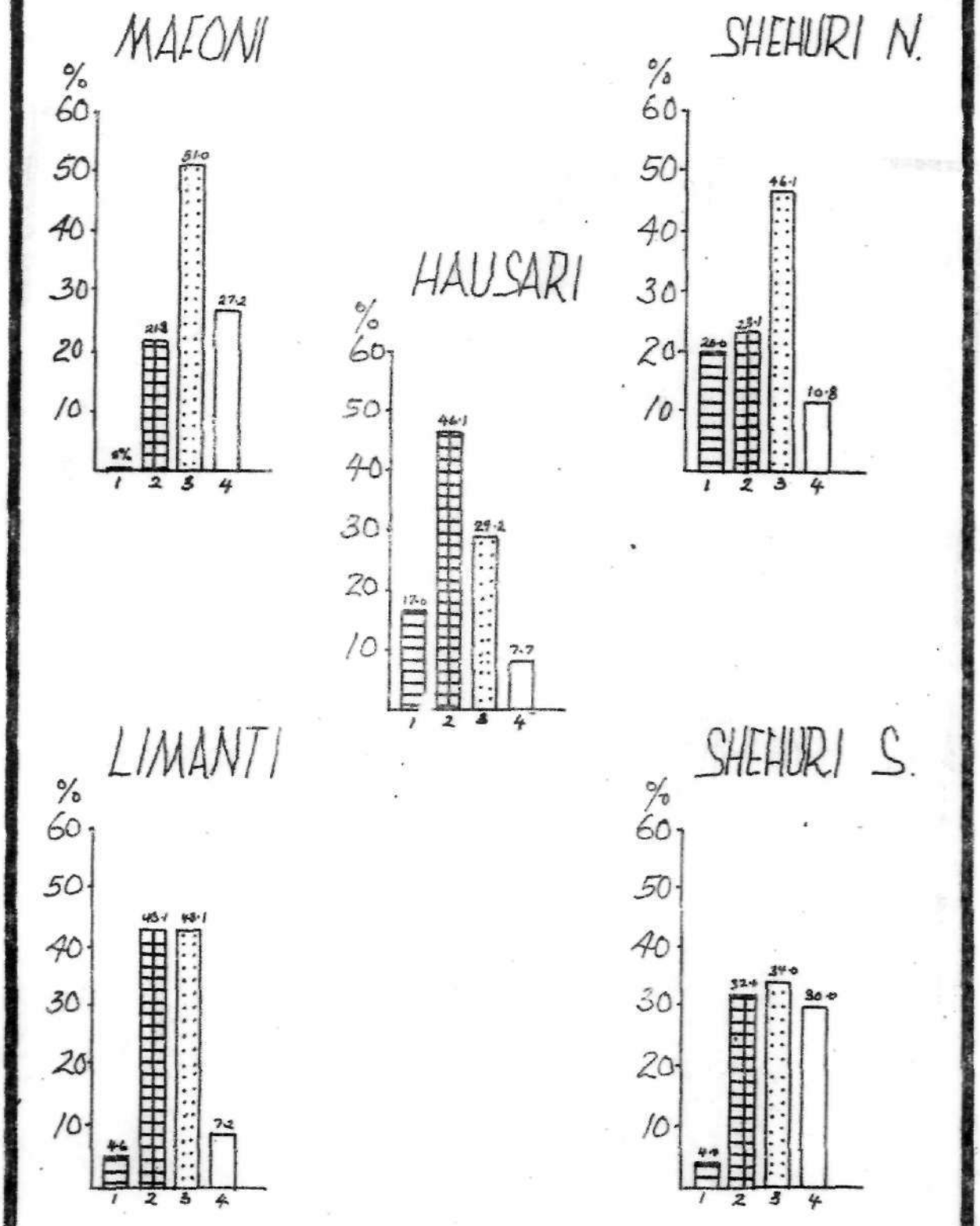
Table 3: Length of Stay of Residence By Wards

| Length of Stay | Mafoni | Limanti | Hausani | Shehuri North | Shehuri South |
|---|---|---|---|---|---|
| 3years | 29.0 | 0.0 | 16.9 | 16.9 | 16.0 |
| 4-7 yrs | 0.0 | 0.0 | 7.7 | 7.7 | 6.0 |
| 8-11 yrs | 21.8 | 40.0 | 29.2 | 29.2 | 28.0 |
| All my life | 47.2 | 60.0 | 46.2 | 46.2 | 50.0 |
| Total | 100 | 100 | 100 | 100 | 100 |

Source: My Field Survey. 1980

On the issue of housing preference seen from the user satisfication. The result reveals that over 50% of the whole respondents prefered the traditional compound dwelling type followed by the low cost estate types. Fig. 7 shows the level of housing preference by ward. The analysis also reveals that 47% of the respondents prefer to move out because of the inadequacies of facilities, services and infrastructure while 32% would prefer to remain.

# RESIDENTIAL LOCALITY PREFERED BY WARDS.




1 G.R.A. Type. 3 Traditional Compound Type.
2 Low Cost Estate Type. 4 Don't know.

FIG.7

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Fig. 8 shows the type of dwelling prefered by ward and on the whole over 41% would prefer the traditional courtyard compounds coupled with improved facilities, utilities and services. The study also reveals that about 35% of the respondents would also want the low cost estate dwelling type this is because it is not far from the traditional type but the density is low and desgined on the improvement of the traditional compound type.

The traditional courtyard compound type is preferred because of the role it plays in the cultural satisfaction of the people since it serves the needs of the extended family system. Secondly, it provides for the privacy required especially among the moslems whose wives are largely in purdah.

The most predominant feature of the indigenous Kanuri Settlement is the courtyard house form. This forms the largest proportion of the traditional units found in the traditional areas. This pattern of clustered inward looking units reflects not only the family's requirements for privacy, but also the settlement's response to the frequency harsh climatic environment characterized by extremes of heat and cold. The courtyard house forms turns its back on the extreme climate and focuses upon a peaceful

# TYPE OF DWELLING BY WARDS

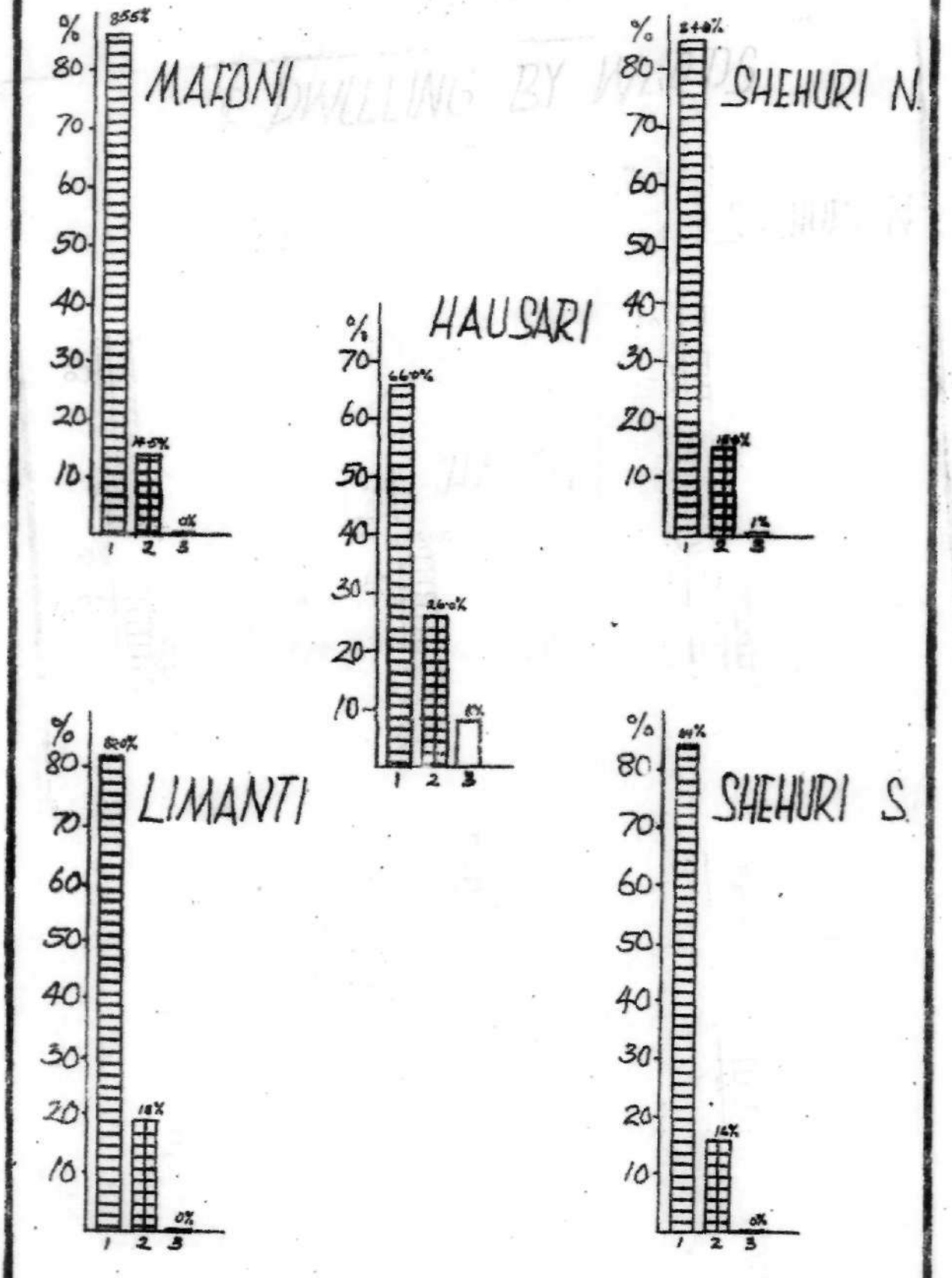



FIG.8

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private courtyard with its naturally moderate micro-climate. Below is a sample layout of the traditional courtyard hose form which caters for both simple family and extended family system (Fig. 9 and 10 respectively).

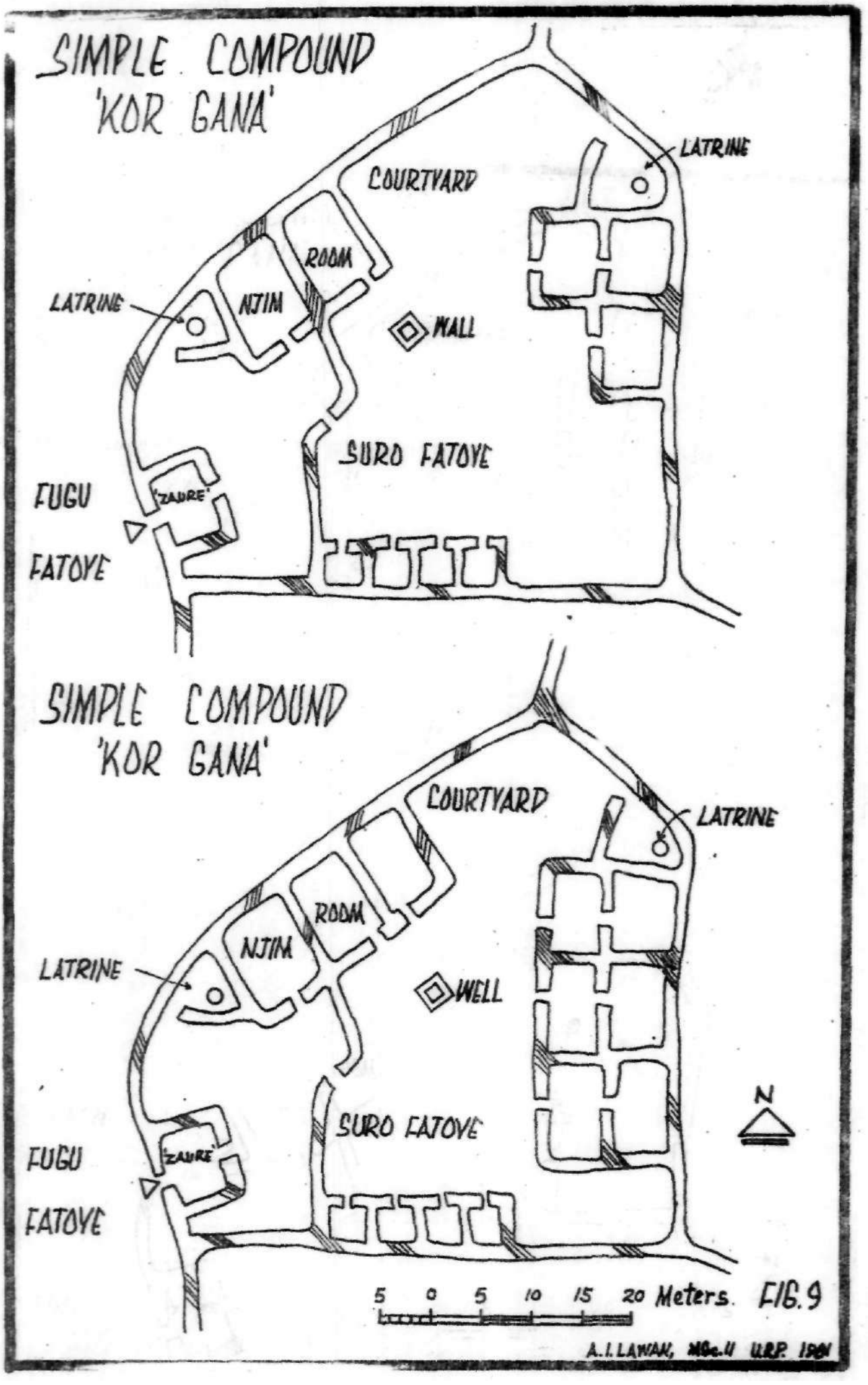
The study reveals that about 80% of the dwelling type found in the traditional area is the courtyard compound type. Table 5 shows the type of dwelling for the whole sample area while Fig. 6 is showing the response by wards for the sample area.

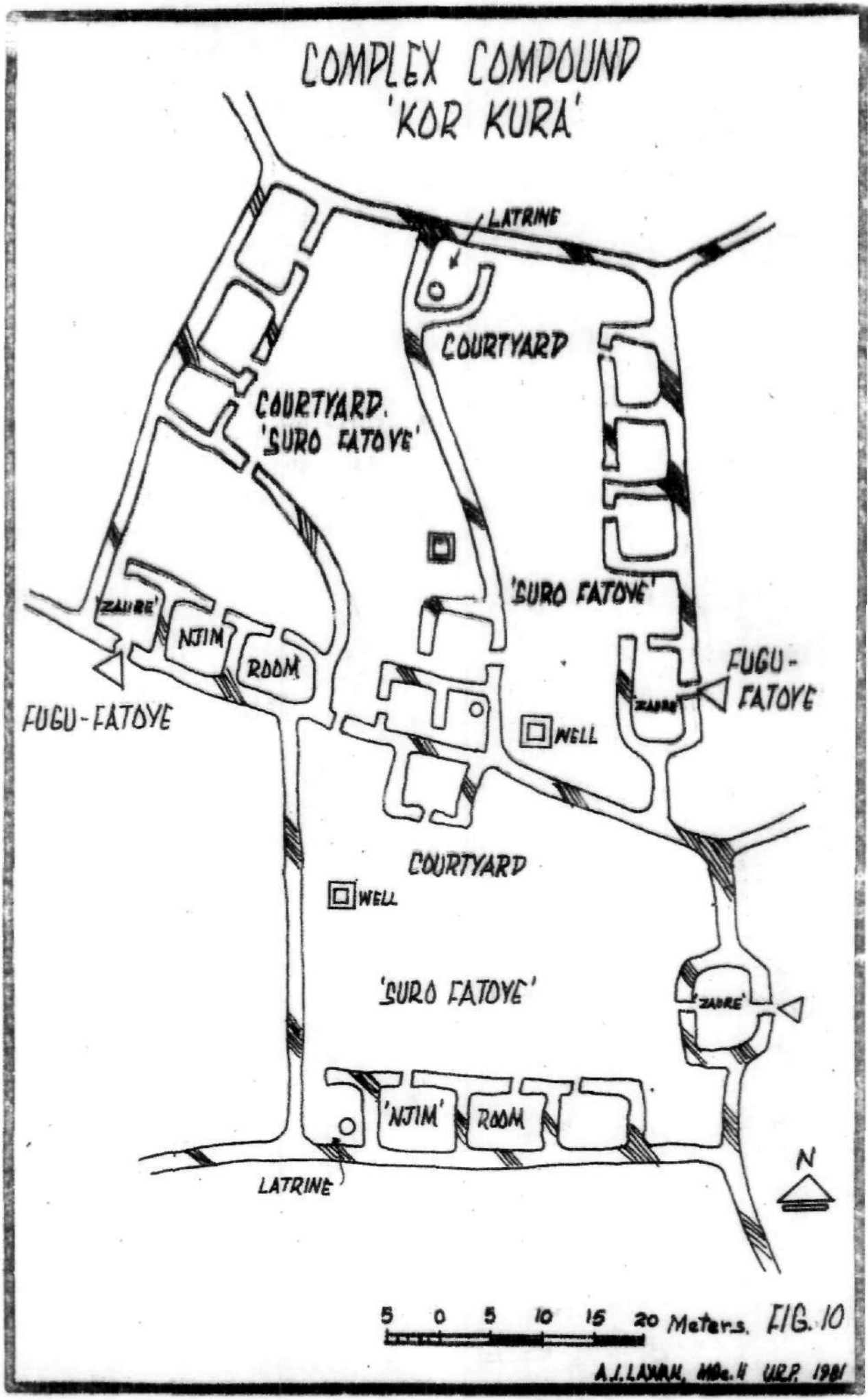
Table 5: Type of Dwelling.

| | Type of Dwelling | Total | % |
|---|---|---|---|
| 1. | Courtyard compound type | 200 | 80.0 |
| 2. | Detached single flat type | 55 | 18.4 |
| 3. | Others | 5 | 1.6 |

Source: My Field Survey, 1980.

Generally there is little residential mobility within the wards, the only movement is only among the few younger literate generation from the traditional areas into the modern dwelling types in the new residential areas. The level of residential satisfication Fig. 11 reveals that on the whole respondents were very satisfied because it means the cultural and religious functions. But on the


SIMPLE COMPOUND
'KOR GANA'
LATRINE
COURTYARD
ROOM
NJIM
LATRINE
WALL
SURO FATOYE
FUGU
FATOYE
'ZAURE'
SIMPLE COMPOUND
'KOR GANA'
COURTYARD
LATRINE
ROOM
NJIM
LATRINE
WELL
SURO FATOYE
FUGU
FATOYE
'ZAURE'
N
5 0 5 10 15 20 Meters.
FIG. 9
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COMPLEX COMPOUND
'KOR KURA'
LATRINE
COURTYARD
COURTYARD.
'SURO FATOYE'
'SURO FATOYE'
ZAIRE
NJIM
ROOM
FUGU-FATOYE
WELL
FUGU-FATOYE
ZAIRE
COURTYARD
WELL
'SURO FATOYE'
ZAIRE
'NJIM'
ROOM
LATRINE
N
5 0 5 10 15 20 Meters.
FIG. 10
A.I.LAWAN, MSc. U.R.P. 1981

# LEVEL OF SATISFACTION BY WARDS

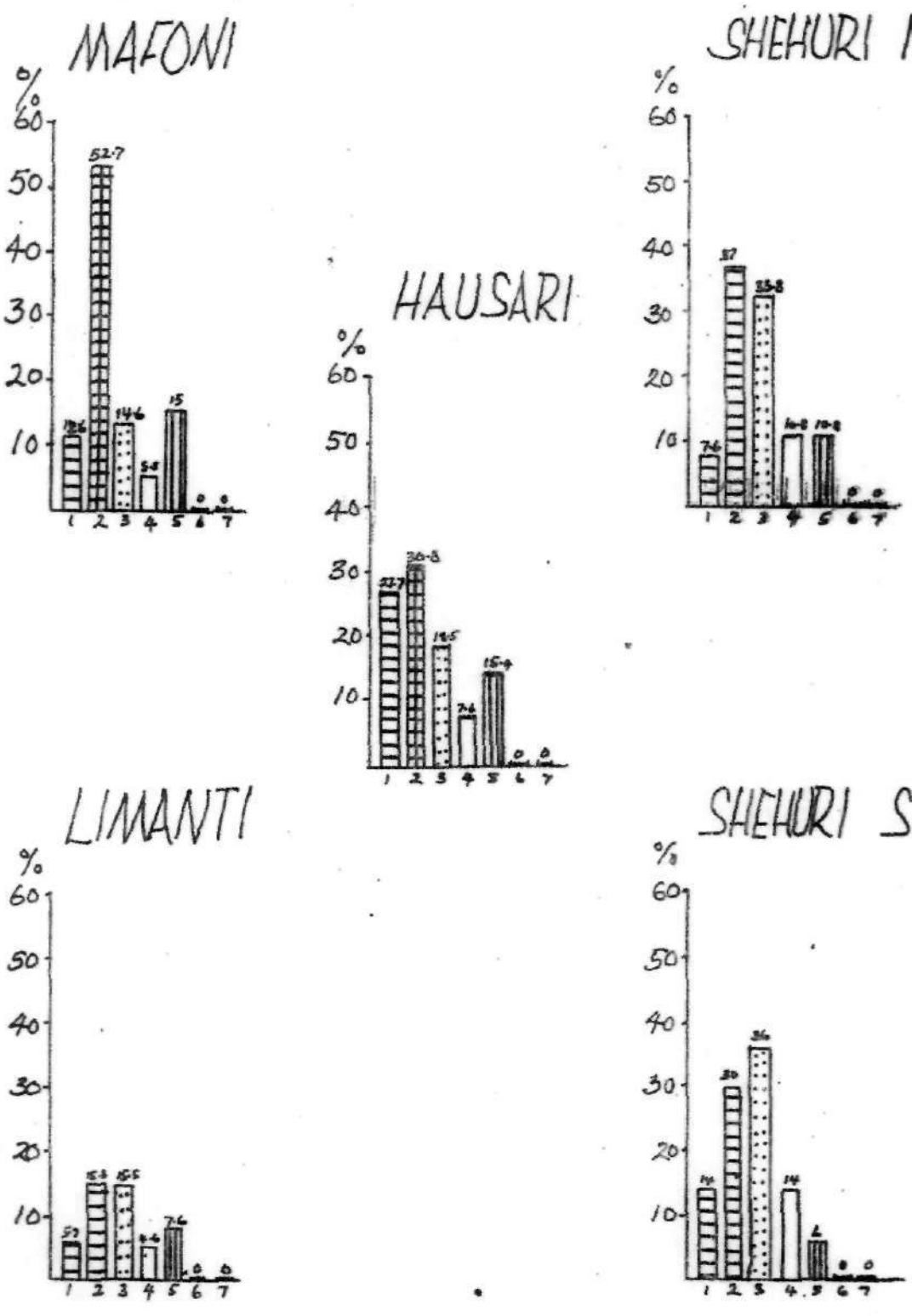



FIG. II

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basis of amenities, facilities and services, the respondents are yet to be satisfied. It therefore measures the respondents level of satisfaction with their locality because of their strong adherence to their ethnic, religions groups which has long been a strong binding force of the residents.

From the physical observation it was established that the general housing quality of this area has wide spread problems. Apart from the fact that many compounds are subject to flooding during rainy seasons, several of the compounds were at a considerably lower level than the adjacent street level so that waste water could not flow to the open drains outside. The open drains themselves were often unable to drain due to bad levelling and frequent blockages. Heaps of decaying rubbish along open sewers produce repulsive smalls, and constitutes health hazards for the areas studied.

The survey of the quality of structures reveals that some significant proportion of the dwelling units are built of mud (64%) about 25% were classified as physically poor condition. A quarter (24%) were of brick, the majority 63%) were medium or of moderate condition with the remainder divided roughly between good and poor respectively.

In all 59% of the dwelling were classified for their type of construction, 28% as medium while 11% as good and the rest as temporary strctures. All except few flat and single story building structures are of modern standard. Table 6 reveals the building condition and building materials of the sample area.

Table 6: Building Condition and Building Materials

| Type of Materials | | Condition | | |
|---|---|---|---|---|
| | | Good | Medium | Poor |
| 1. | Concrete block | - | 2.1 | - |
| 2. | Brick | - | 12.6 | 9.5 |
| 3. | Mud | - | 29.5 | 39.0 |
| 4. | No response | - | - | 7.4 |

Source: My Field Survey, 1980.

Table 7: House Roofing Materials

| Type | % |
|---|---|
| Corrugated sheet | 80.0 |
| Mud | 12.6 |
| No response | 7.4 |

Sourse: My Field Survey 1980.

Table 8: Household Amenities

| Facilities | Yes/% | No/% | % of No. response |
|---|---|---|---|
| Latrine | 92.6 | - | 7.7 |
| Tap | 5.3 | 87.4 | 7.4 |
| Bath | 1.1 | 91.5 | 7.4 |
| Shower | 92.6 | - | 7.4 |
| Electricity | 4.2 | 88.4 | 7.4 |

Source: My Field Survey 1980.

The dwellings in the traditional residential area are poorly served with amenities, both in absolute terms and by comparison with other parts of Maiduguri. Over 85% of the households had no access to adequate tap water within their compounds, the provision of baths, shower is relatively low except of course for the new concrete houses which are being within the traditional areas. Kitchen facilities is also poor most of the time cooking is done in open air within the courtyard. The provision of electricity is very infrequent over 70% in the traditional area had non except for massive improvement which include the provision of facilities, amenities and services through urban

renewal and redevelopment scheme. This is not in the scope of this thesis. The traditional areas has the highest proportion of households lacking any latrine facility, they have the highest proportion of sharing utilities and facilities in the compounds. The pit type and the bucket type of latrine facility is gradually fading out quickly because of the hazards to the community health.

# chapter 3

# CHAPTER III

## 3.0 IDENTIFICATION OF ELEMENTS OF KANURI TRADITIONAL SETTLMENT.

### 3.1 The Identification of Forces:

The study of any human society reveals that there are some basic social, cultural, religious and political forces, etc, and it is the machanisms of these forces that has resulted to the physical elements which are identifiable in any settlement.

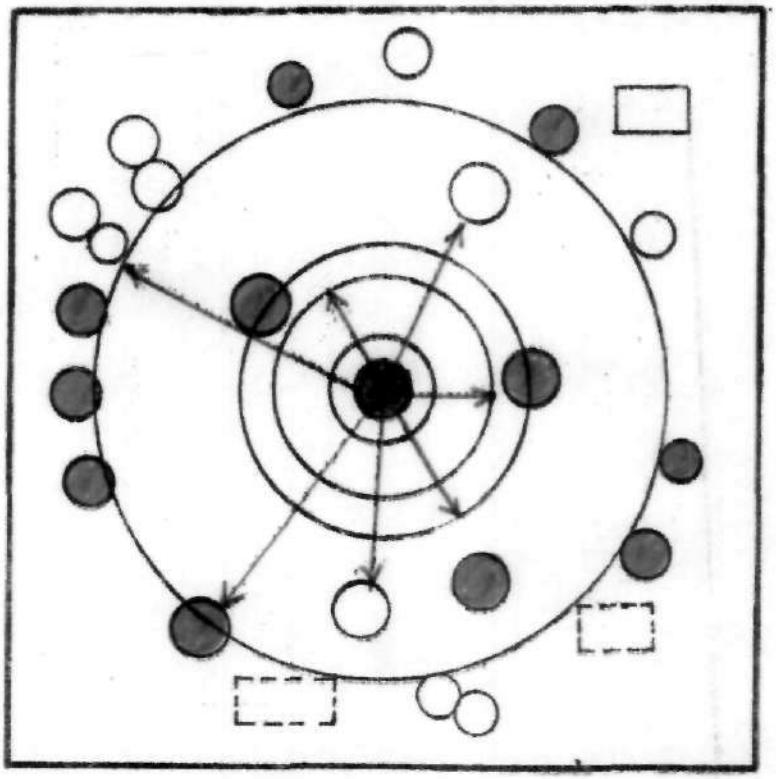
Doxiadis[1] in his study of human settlement identified five principles or forces which govern the physical structure of any settlement.

The first principle is man's decire to maximize his potential contacts. He therefore looks for a location that maximizes not his actual contacts (he may not want to visit anyone at all) but his potential contacts is always available at his disposal. Fig. 12 shows this idea in the first principle.

The second principle is in Fig 13 which shows that man always tries to act with a minimum effort. When he encounters a physical obstacle such as mountain, he does not cross it by the most difficult route but he gets a more gentle side on which to pass.

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1. Doxiadis, C.A. City for Human Development, Ekistics.

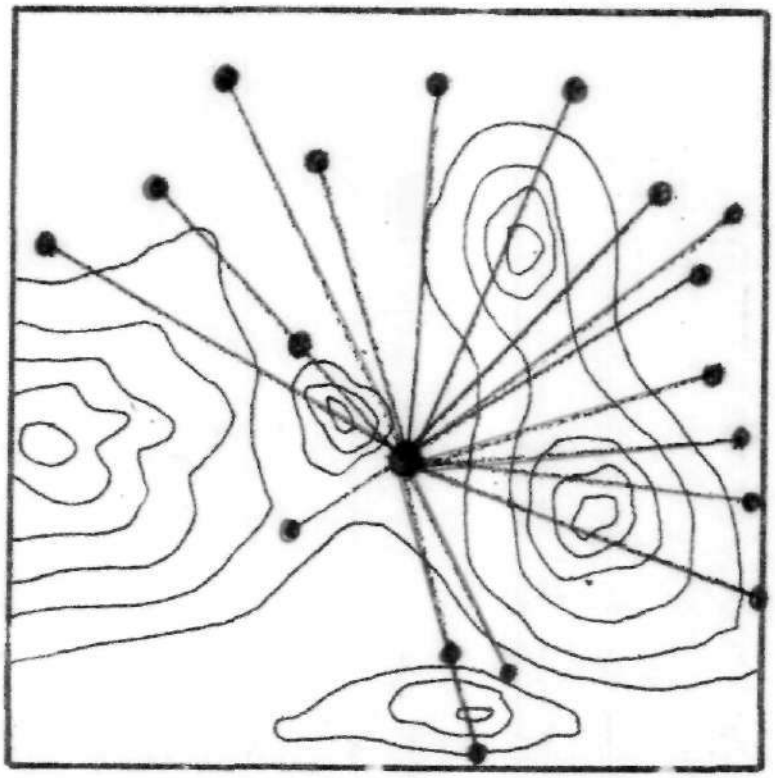


Man
Other elements
Direct human Contacts
Other contacts

First Principle. Maximization of potential contacts: Given certain condition in a certain area. man will select the location which permits a maximum of potential contacts.

FIG. 12

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Second Principle. At a minimum effort in terms of energy, time and cost, Man selects the most convenient routes

FIG. 13

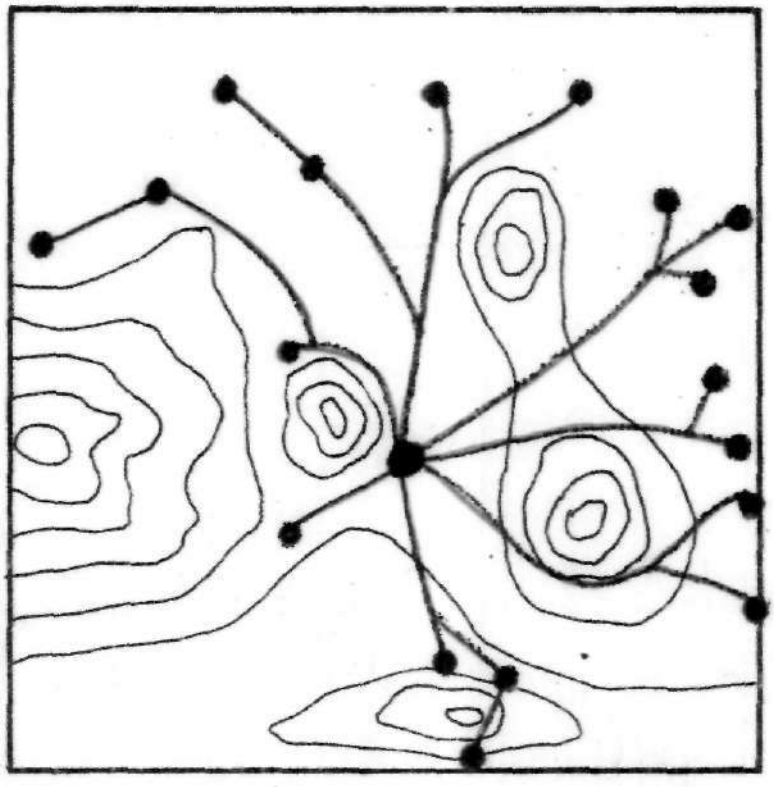
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The third principle is shown in Fig. 14 stating that there is the optimization of man's protective space. Man does not like to be in danger or to be squeezed, either as an individual or a group unless for very short periods and for special purposes. Only in moments of great love or great danger do we willingly squeeze up close to one another.

The fourth principle is the optimization of man's relation to the urban elements namely nature, man, shells (dwelling) society and network Fig. 15.

Lastly is the fifth principle in Fig. 16 which is the synthesis of all previous ones, which we will be able to see operating in the case of the courtyard, compound, or room. This is seen in Fig. 15. From these five principles one finds that the principles satisfies the basic human needs in his relationship with the physical, social and cultural environment.

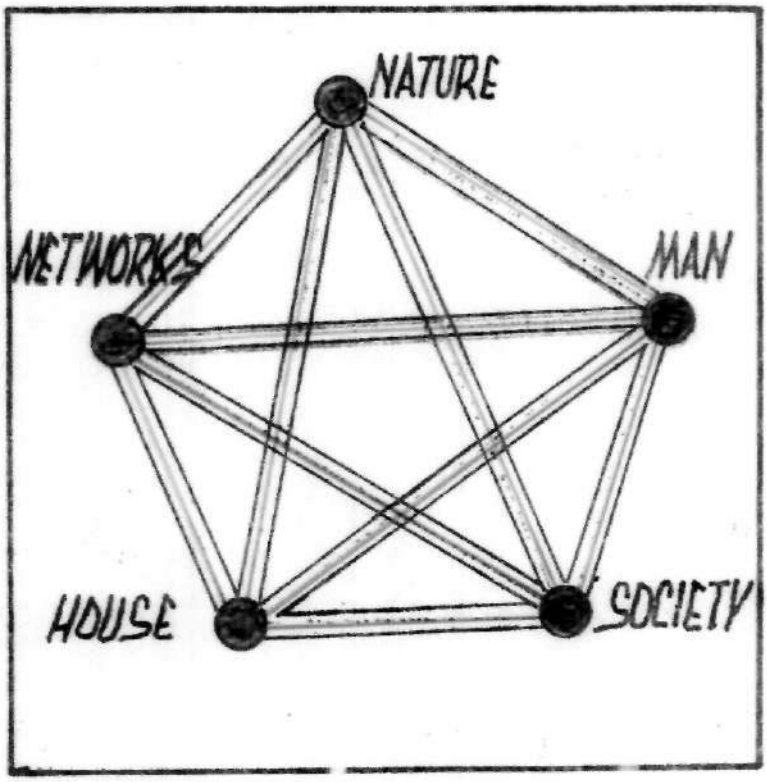
The Kanuri people are also influenced by these forces which are basic to human beings. The main differences one draws from these forces are the mechanism which results into something new because of its socio-cultural and religious background



Third Principle. Optimization of man's protective space.

FIG 14

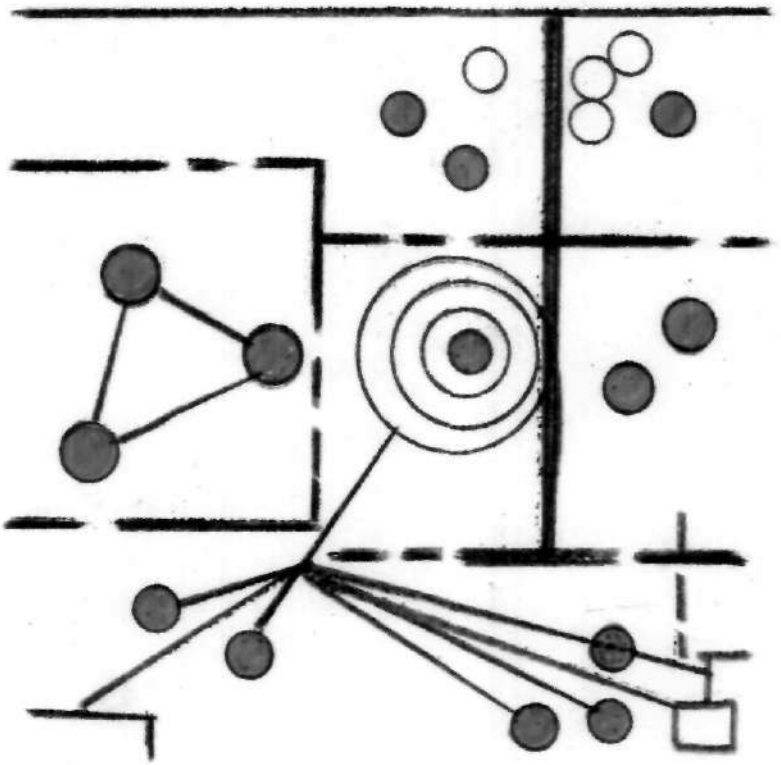
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Fourth Principle. Optimization of the quality of man's relations with his environment.

FIG. 15

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● Man
● Society
○ Nature
— Human Contacts.

Fifth Principle. Optimization of the synthesis of the four previous principles

FIG. 16

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which in turn influence the structure of its environment and settlement pattern. The Kanuri people have the household as the smallest residential unit such that almost all other social life among them can be analysed and understood once these particular parts are dscribed.

The Kanuri Kinship system involves three basic categories that may overlap one another but are always different from each other.

(a) The genealogical relations: this links individuals which are based upon biological reproduction.

(b) Descent relations:- this links between individuals which are based upon the allocation of members in a genealogy to a socially and culturally recognised kin group. This may include the same persons as a genealogical group, or it may include only part of them.

(c) Affinal relations:- The link between individuals which are based upon marriage through the socially recognised union of a husband and wife.

The Kanuri seperate genealogical relations from those of descent just as we do by speaking a distant relations. That is to say, Kanuri descent

groups are based upon an individual's relation to persons through both his father and mother (cognatic relationships), and a person feels equally related to all his four grandparents. However there is an emphasis placed upon those related to a person through males only for a number of activities.

The forces which have influenced the evolution of settlement in Kanuri areas therefore can only be understood from the changing relationship between man, his needs and his settlement. Within a human settlement the basic unit is the house or simple compound which is being occupied by a single household.

The simple compound is the smallest unit created by man beyond his clothes, and furniture, it is the smallest structure built by man for his household and serves all the basic needs. Secondly, the compound is also the smallest unit that can be discussed on a biological basis because it exhibits a wide range of variation. This large number of variants makes it possible for us to investigate them systematically to see if one can draw any general conclusion.

Considering the form and shape of a compound in traditional settlment pattern one tends to forget how long it looks to create such a shape, and at

times one try to change it without realizing the forces that shaped it, and without considering whether these forces still operate today. In the study of Kanuri Traditional Settlements one would want to discuss on these forces which have influenced the evolution of the settlment.

Before proceeding, one must clarify what one means by a simple compound therefore is the smallest single unit of residential unit for a household. This is a built-up space created by man for his normal daily life, his home, workshop or office. This is a pattern of clustered of inward looking unit which reflects not only a family's requirement for privacy, but also the settlements response to a frequent harsh external environment. The rooms are built around a walled courtyard and open into it. This courtyard helps protect the rooms from the occassional dust storm and the severely cold harmattan winds. In the hot seasons it acts as a well to trap cool night-time air and retains it throughout most of the day. The thick walls isolate the interior from the extremes of heat and cold. The thermal properties of the mud-brick wall store daytime heat from the sun and radiate into the interior at night. The predominant south orientation of the

buildings means that the sun can penerate and warm the interior of the house during the cold harmattan periods.

The indigenous process of construction for low-income familieis consists of first building a wall around the plot and then gradually adding rooms around as the need arises with an increasing family size as money becomses available. In other words, the number of rooms in a compound whether simple or complex is a function of family size. In some cases the rooms are added vertically to satisfy the room needs of the household.

In addition one finds that the size of and the form vary with the requirements and ability to build the number of room required. Numerous combination of materials from mud to the use of 'Zana' have been used for construction of houses. Some explanations are based solely on structure, the compounds are irregular in shape but some of the rooms are round while others are rectangular, the round rooms is based from the strucutral requirements, others are based on biological needs. The round rooms was rooted on a combination of biological and psychology. It was argued that "the roundness surrounds man more nicely than squareness" (Erick Erikson 1971). It has also been observed

that sheep always form a circle, never in line when sleeping together. This apparently indicates that the animals feel better when clustered in round groups. Darwin also on his first visit to South America, found some natives who always slept in circles, without any covering. They slept in a compact group sometimes not only at one level but one on top of the other, forming a level and a half. The explanation was that this enables them to exhange warmth and to protect one another. It seems that, if indeed the round house was first, this was probably caused by a combination of psychological and biological necessities and structural possibilities.

Kinship may form the biological and the behavioural basis for Kanuri society, but it does not provide a place for such relations to operate. The Kanuri live in cities, villages and hamlets and the basic unit of organization in these settlements is the household, rather than the family or any set of kinship group. Even though these may be synonymous in some cases, in many compounds family and household are certainly not the same, and the distinction is fundamental to an understanding of the society. Furthermore the household or compound as it is sometimes called, is stable in comparison to

family. The family can be split, and very often is, by divorce or death, or the movement of its members to a new place. While such changes occur, the household remains, its personnel may change, its hand holding may expand or contract, and its relations with other households through its household head may shift - but people see it as an organization in terms of which settlements are built into larger units, into wards, hamlets and villages.

Finally it is important to remember that, the most important of these relationships are basically those within a household. This is the stage upon which family life takes place. Here an individual learns the modes of behaviour towards others that tie requires for an adequate and household produce individuals who can live in other households; and using the basic modes of behavour form household life they can participate in the widely ramified political and from household life they can participate in the widely ramified political and economic organization of their society. Thus kinship, family and household - but most importantly the household and the superior - subordinate relations within it - provides a basis and a locus for maintaining the society and its values in their present form.

## 3.2 The Identification of Elements:

The elements identified in the Kanuri Traditional Settlement have resulted from the forces which was based on the aspiration, socio-political, and social needs of the people. Most of these elements have been identified through observation.

The elements identified include:-

1. The wall.
2. Gates.
3. Winding streets/paths.
4. 'Dandali'
5. Open Space.
6. Activity Area.
7. Socialization points.
8. Religious Focal points.
9. Residential units.

The influence of religious forces have great impact on the structure of the town and where most of the elements have featured as they are tody. These elements shall be considered when discussing the Kanuri Cultural background just as the Hausa-Fulani or Yoruba contains some ways of living which indirectly give form to towns and cities and their internal structure.

Therefore, trade and associated crafts industries have brought people of different ethnic groups together. Most Kanuri household have three to ten people living inside the compound walls. It is revealed that each person, except small children has his or her own room, and the major group in the household is generally a family. The cental traditional tends to be mainly Kanuri speaking people, is similar to the surrounding ethnic groups. It forms the oldest part of the city and its distinctive character is represented by palace, the mosque, the wide avenue or 'dandal' and the surrounding royal quarters - Shehuri North and South of the Palace respectively. Around this area migrants from other parts of Borno State had settled down to build their traditional compounds. As one moves any from the central area the organic pattern of the layout becomes more and more regular with the influence of gridion pattern by surveyors. Fig. 4 clearly shows this change in layout pattern. Some migrants came as existing entities for example when the village of Mai Sandari moved as a whole to Limanti ward. This forms the priesthood ward of Islamic religion. The non Kanuri population is mainly found near the boundary with Limisula and Shehuri South wards. Accomodation is scarce in the areas around the main Monday Market and rents are high in relation to

standard offered. In the Kanuri area there is far more owner-occupation than elsewhere.

Although the wide, well kept main roads give a sense of space and orderliness the layout of compounds within streets blocks is haphazards, narrow winding alley ways meander between outer mud walls of compounds. It is noted that as one takes a small lane one can never tell where it is going to end up. For instance in Limanti the end of narrow lanes always seem to end with small almost broken 'zana' house that belong to old woman. Perhaps this is part of the sad features of this older area, that so many compounds are not well maintained. Sometimes when looking for one of the sample compounds it looked as if it was uninhabited, the perimeter walls and entrance room crumbling so that one could see inside. One closer inspection a small thatched hut would be found in a corner of the compound, more often then not occupied by an old woman living alone.

The thick mud walls of these traditional wall house are well suited to the climate and are delightfully cool inside, but they are troublesome to maintain. When this is done it often leads to the fragmentation of the original compound. The old

compounds were large in size and few present owners could afford to replace all the existing units with 'modern' concrete structure. A member who rebuild will probably want to occupy a compound of his own, with seperate access to a street or alley way and not necessarily inter-communicating with members of the original compound.

The Kanuri settlement emerged not so much as a result of the natural increase of a single community but rather as centres of immigration. Movement of people into the Kanuri Traditional areas played an important role toward the growth of the traditional areas. Wards such as Hausari consisted more of Hausa migrants, the Fezzan, Zango and Gambaru wards are all migrants wards who came because of trade. Trade, effective political organization and defensive location attracted immigrants just as land shortages, family dispute raiding and warfare created emigrants. The concentration of traders and craftsmen and their families near the main market place creates the densest settlement within the Maiduguri. A mixture of temporary and permanent stall, shelter sales rooms and warehouses, the main market leading out in the city and joining its major section. In the market a complete range of

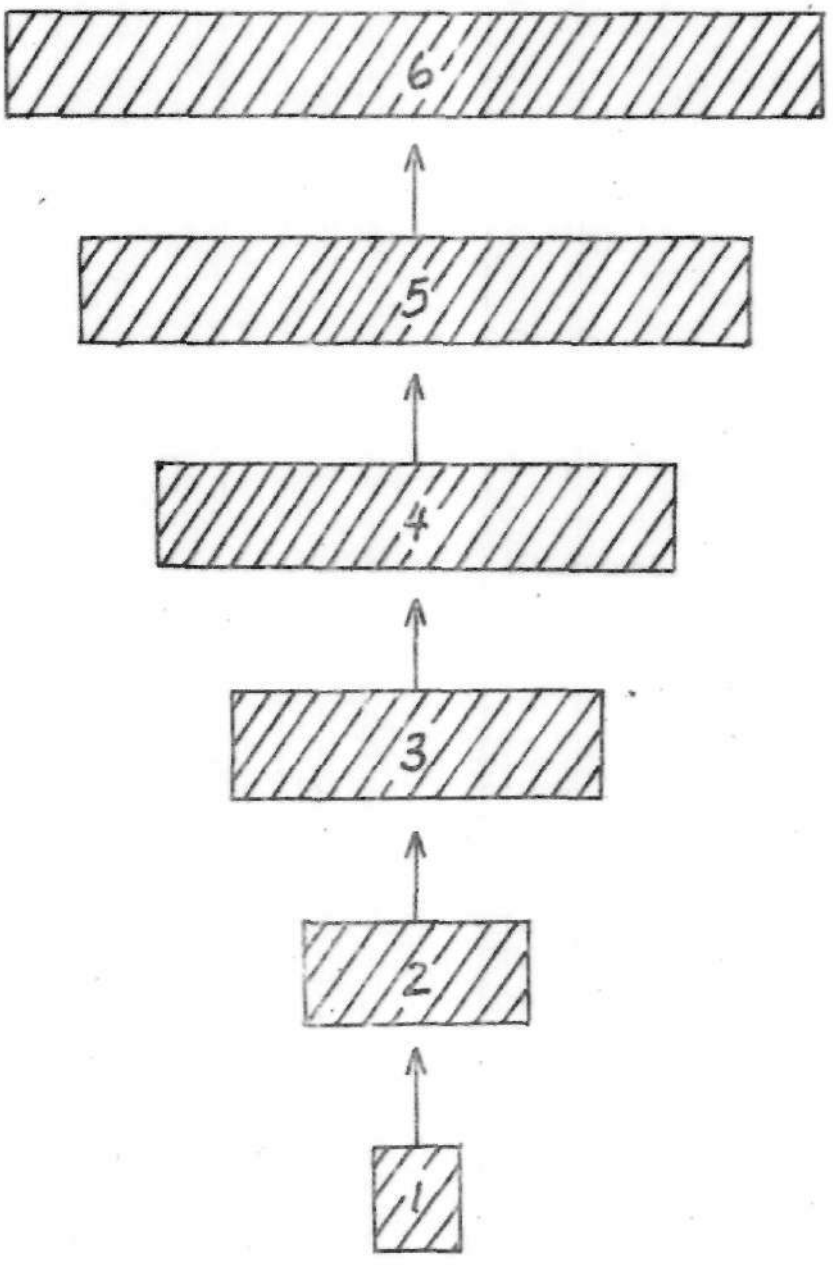
services and items for local consumption can be found. Further specialised products for more limited or distant markets are sold.

The housing density is great near the market, the presence of buildings crowded together along the paths from the market. This makes the craftsmen work in the entrance room ('Fugu Njim') to the compounds or in the street level shops of the storeyed houses.

The centralised bureaucracy of Kanuri people is ancient. This is well illustrated by the wide spread use of the seame Kanuri language title of officials in seperate sections of the Shehu and is chosen by a selected group of king makers. Others are 'Ajia' as district head, the 'Lawan' as the ward head or village head, the 'Bullama' as the sub-ward head and finally the household head as 'Suro-Fatoye', etc Fig.17 shows the existing socio-political structure of the Kanuri people .

The Shehu is seen both as a religious and a political leader of the Kanuri people. The wall and associated ditches which were built and maintained as one of the responsibilities of the Shehu as defender of the 'State'. Walls are seen in the oldest Kanuri towns such as Kakawa Mongono, Magumeri,

# THE SOCIO-POLICAL STRUCTURE IN BORNO.




6 The Shehu.
5 The Ajiya.
4 The Lawan.
3 The Bullama.
2 The Compound Head. (Baba Kura Fatoye)
1 The household Head. (Baba Fatoye)

FIG. 17

A.I. LAWAN, MSc. II URP. 1981

Ngala, etc. Maiduguri has no wall this resulted with the fact that the main function of the wall was for defence, with the establishment of Maiduguri around 1902 the inter-tribal wars and rading was virtually over. There is still a psychological impression of the wall, there is the large gate 'Welcome to Maiduguri' another one along the 'Dandal Way' to the Shehu's Palace, another one near the main market all these gives the impression that there is a wall around the Maiduguri Traditional area.

The palace, market, and the mosque are the major focal points of the urban activity. These areas requires high degree of accessibility to the gates and roads to outer district. The Friday Mosque and the Palace are at close proximity because the Shehu is seen not only as a political leader but a symbol of his religions position and must front and Open Space which is the largest. Fig 18 shows the distribution of these open spaces in other settlement. He receives salute from his officials and people on ceremonial occassions. The residential compounds of the ruling families and officials and their retainers are grouped in this secondary concentration - proximity to the Shehu in the tradi-

# DANDALI OPEN SPACE

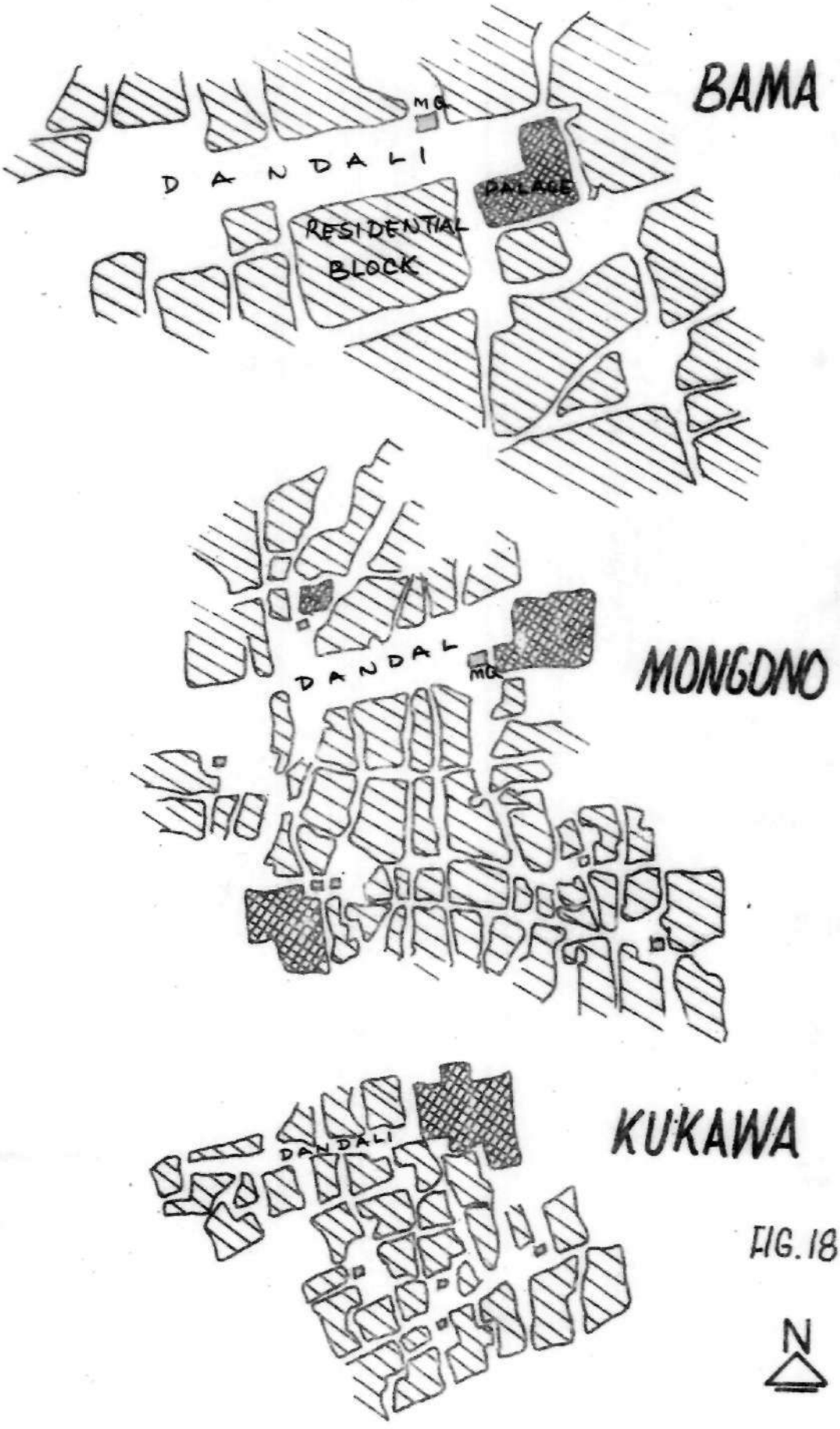
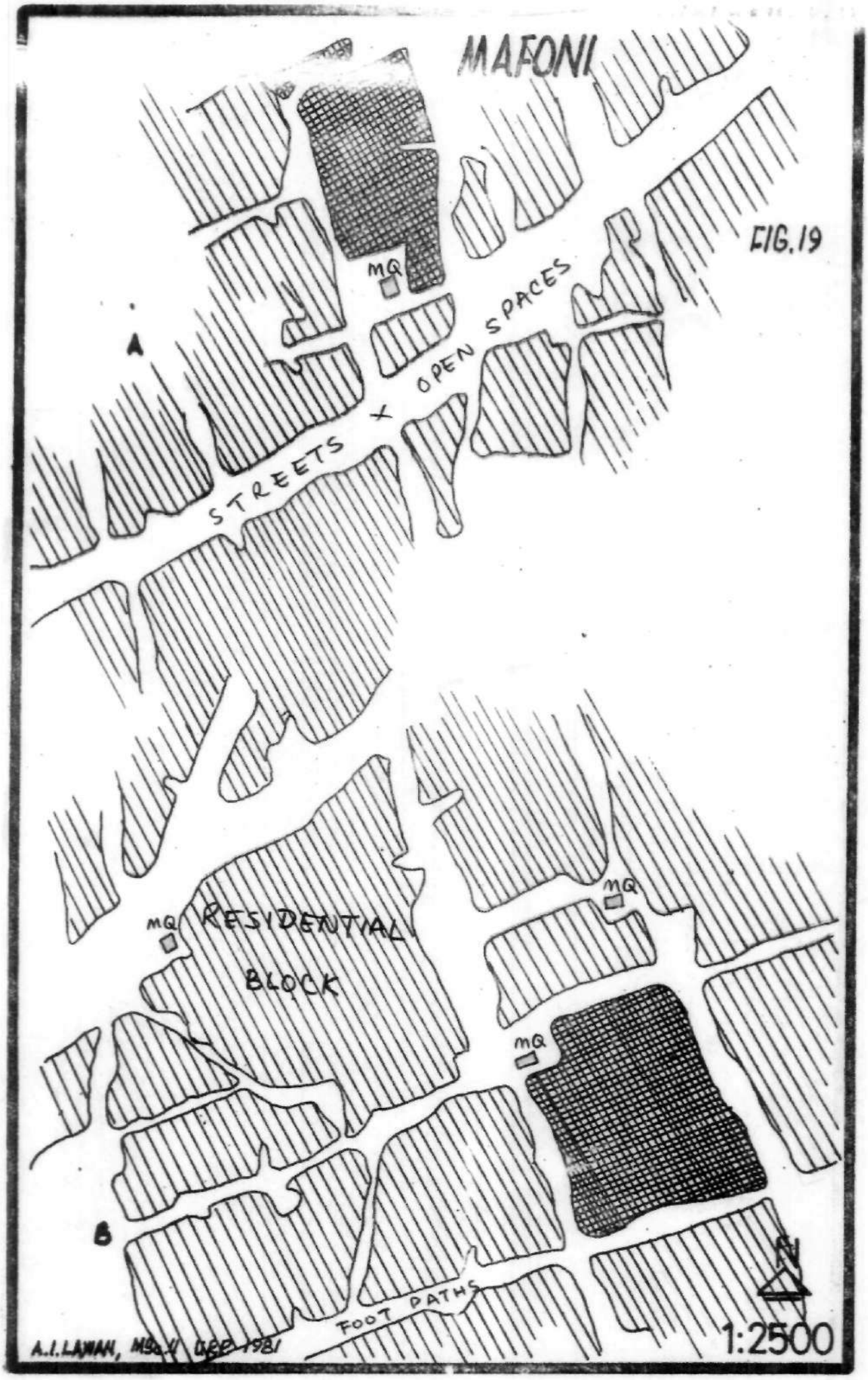


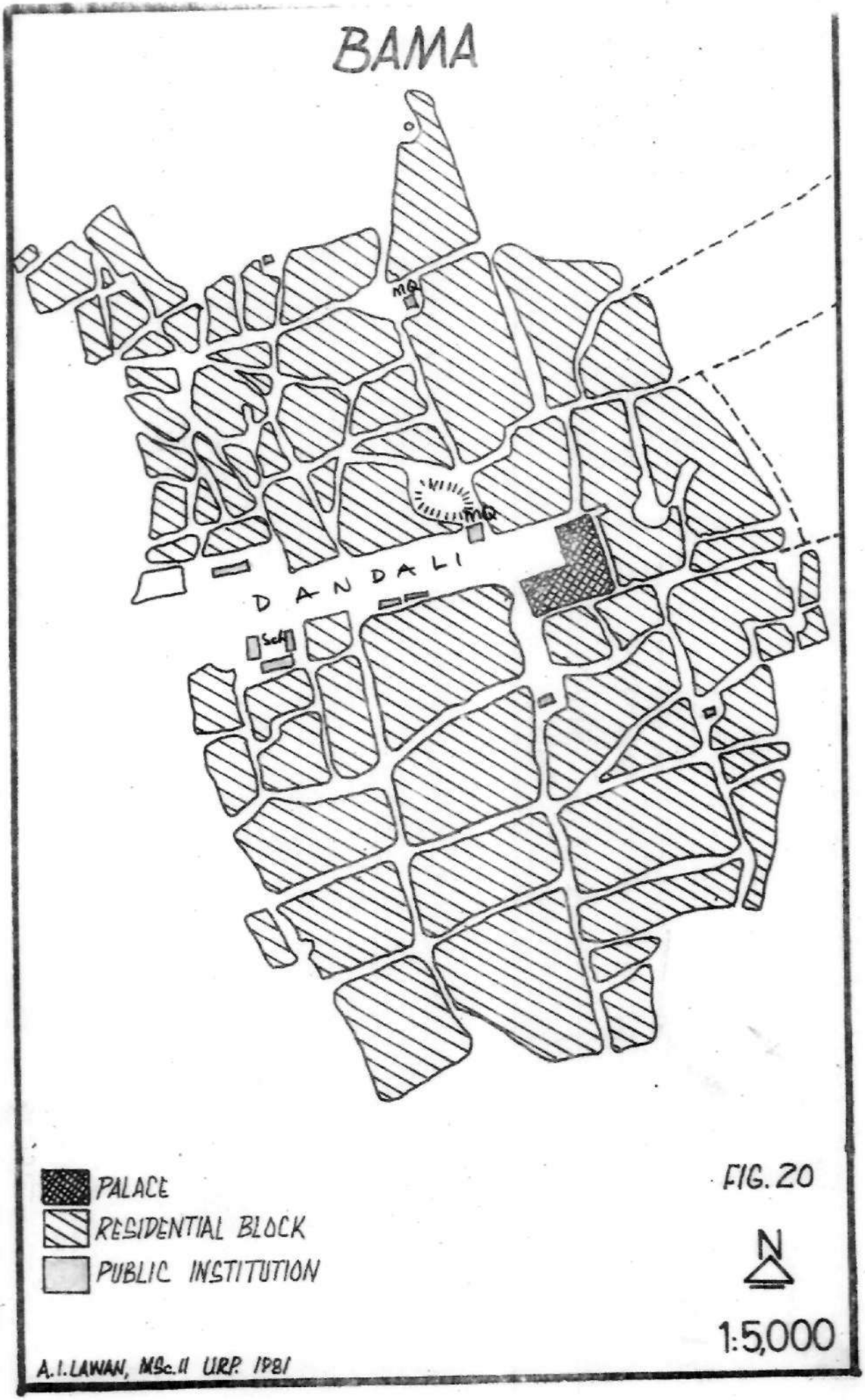

FIG. 18

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tional urban settlement. Similar open spaces are found along the hierarchy of the socio-political structure of the settlement. Open spaces and the position of Mosques in various wards are also identified. Fig. 19 shows a sample of these Open Spaces along with the ward and sub-ward heads in various locality in Maiduguri Traditional area. In Maiduguri to the north and south of the palace is the ruling familie s forming a ward i.e Shehuri north ward and Shehuri south as a ward. To the east of the palace is the prestihood ward the 'Limanti' ward they are next to him in the religious hierarchy. Just a close proximity is the Central Friday Mosque as a symbol of religious leader of the people. These features are also identified in other Kanuri settlements Bama for example. (see Fig. 20 for an illustration).

The physical effect of Islamic practices are easily seen in the landscape of the Kanuri Traditional Settlement. For Islam to function properly each town/settlement must have a Friday Mosque and generally it is centrally located near the palace or the market. smaller mosques and prayer grounds are scattered throughout the town or settlement and can be identified because they are often freestanding and of distinctive architecture.

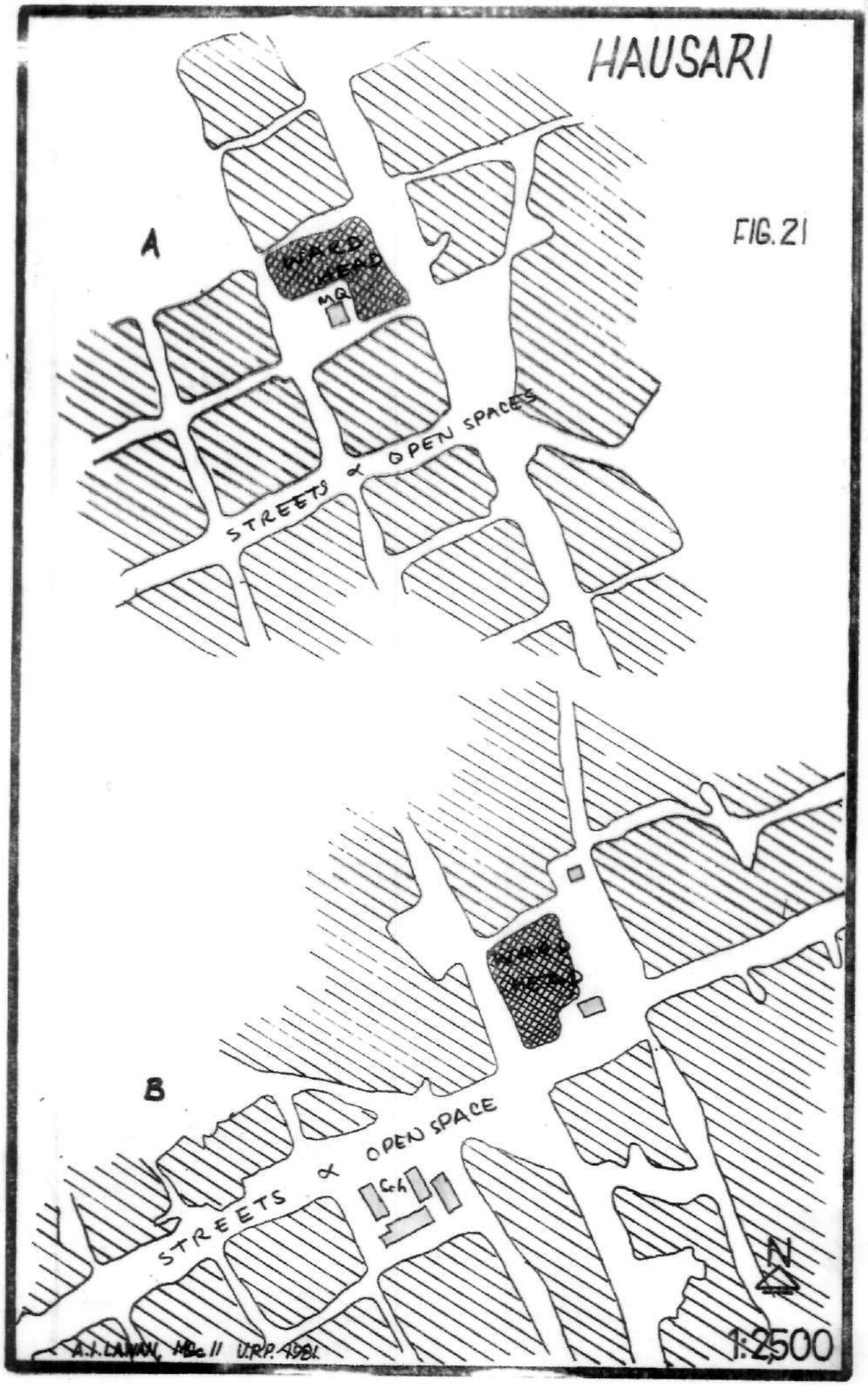

MAFONI
FIG. 19
MQ
A
STREETS
OPEN SPACES
RESIDENTIAL
BLOCK
MQ
MQ
MQ
B
FOOT PATHS
N
1:2500
A.I. LAWAN, MSc.V 1981


BAMA
DANDALI
Sch
PALACE
RESIDENTIAL BLOCK
PUBLIC INSTITUTION
FIG. 20
N
1:5,000
A.I.LAWAN, MSc.II URP. 1981

In Hausari and Shehuri wards are found mosque scattered here and there (Fig. 21). Cemetries may be found outside the city walls in settlements where the practices of burial within family compounds has not been abandoned.

The practice of purdah introduced with Islam only widely accepted in the cities in the 20th century has resulted in a great degree of residential privacy and partially explains the inward orientation of the walled compounds which black facedly live the paths and roads of the traditional area. In the agricultural village setting the women participate more freely in society and the compound are more open. The building of walls and compounds requires adequate supplies of suitable building clays, roofing poles and thatch. The demands of privacy probably increase these needs and indirectly and responsible for the large size of some of the numerous clay borrow pits within the city.

In general, when combined, the official policies and 'natural' or 'right' ways of doing things in the Kanuri traditional set-up result in a walled city encircling compounds, agricultural lands. At least four fortified gates breach the wall, one facing each cardinal direction and give


HAUSARI
FIG. 21
A
WARD HEAD
HQ
STREETS & OPEN SPACES
B
STREETS & OPEN SPACE
N
1:2500
A.Y. LAWAN, MDC II U.R.P. 1981

access to the main market, the less dense around the palace.

Smaller group of compounds form knots of settlment near the gates, roads and pathways radiating from each major focal point and connecting the market, palace, mosques and gates. Because they are not governed by any law that apply strictly to the Traditional Settlement, the citizens make compounds and fields that primarily reflect familial control, influenced strongly by occupational and religious forces/practices. Each compound or house is essentially shut off from public view and entered only through a series of rooms (Fugu Ujim) and courtyards in increasing privacy.

Walled towns and settlements are widely distributed over most of the populated parts of the Northern Nigeria, many are now abandoned and all the city walls are falling into disrepair.

Physical Planning and Design element in the Traditional Kanuri residential area: Circulation and Movement within the residential for example are casual and with a careful observation, it reveals that they are not used to walking along a straight corridors in houses, paths and roads. Fig. 22 shows the paths and roads.

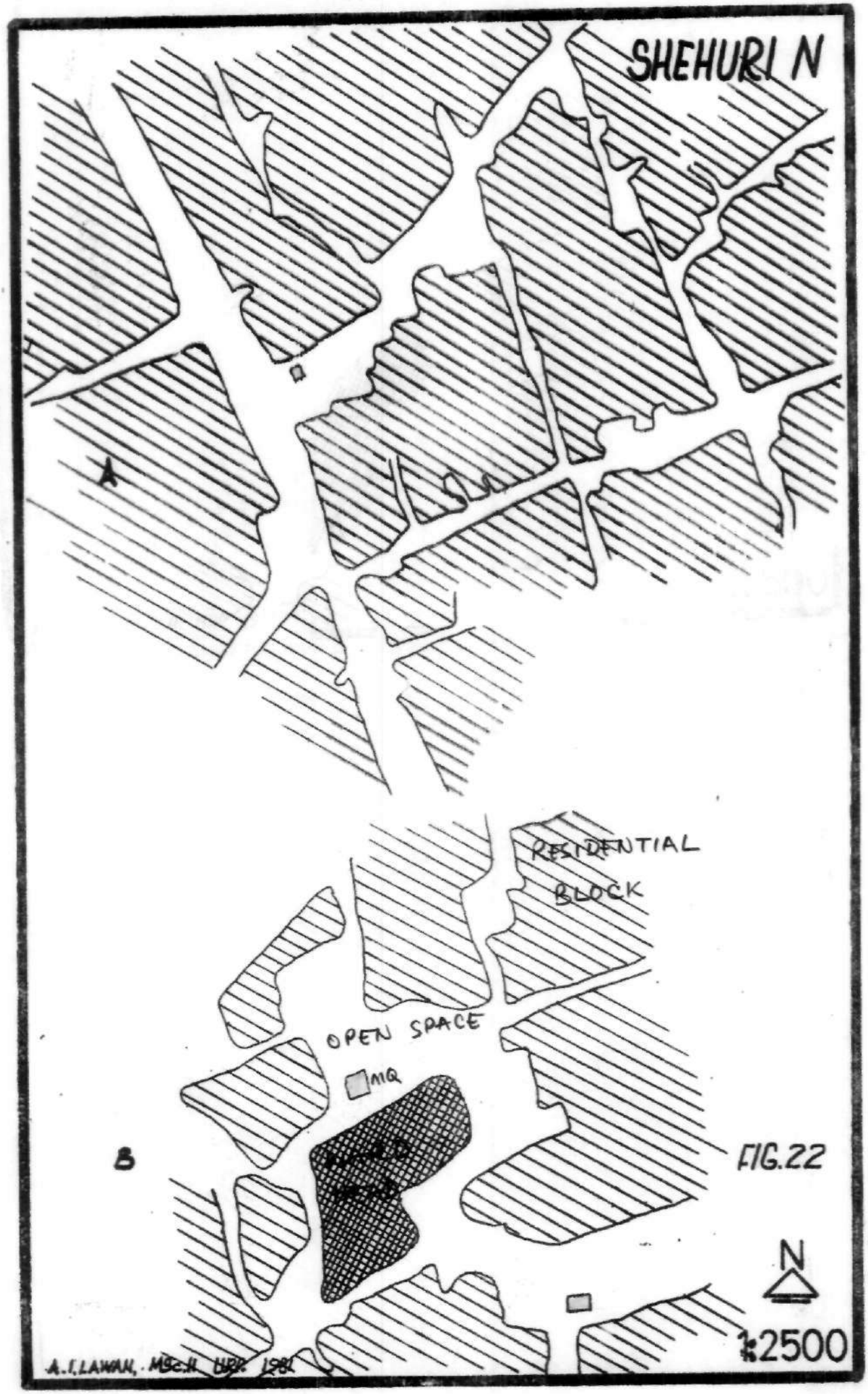

SHEHURI N
RESIDENTIAL BLOCK
OPEN SPACE
MQ
B
N
1:2500
A.I.LAWAN, MSc.II URP 1981

FIG.22

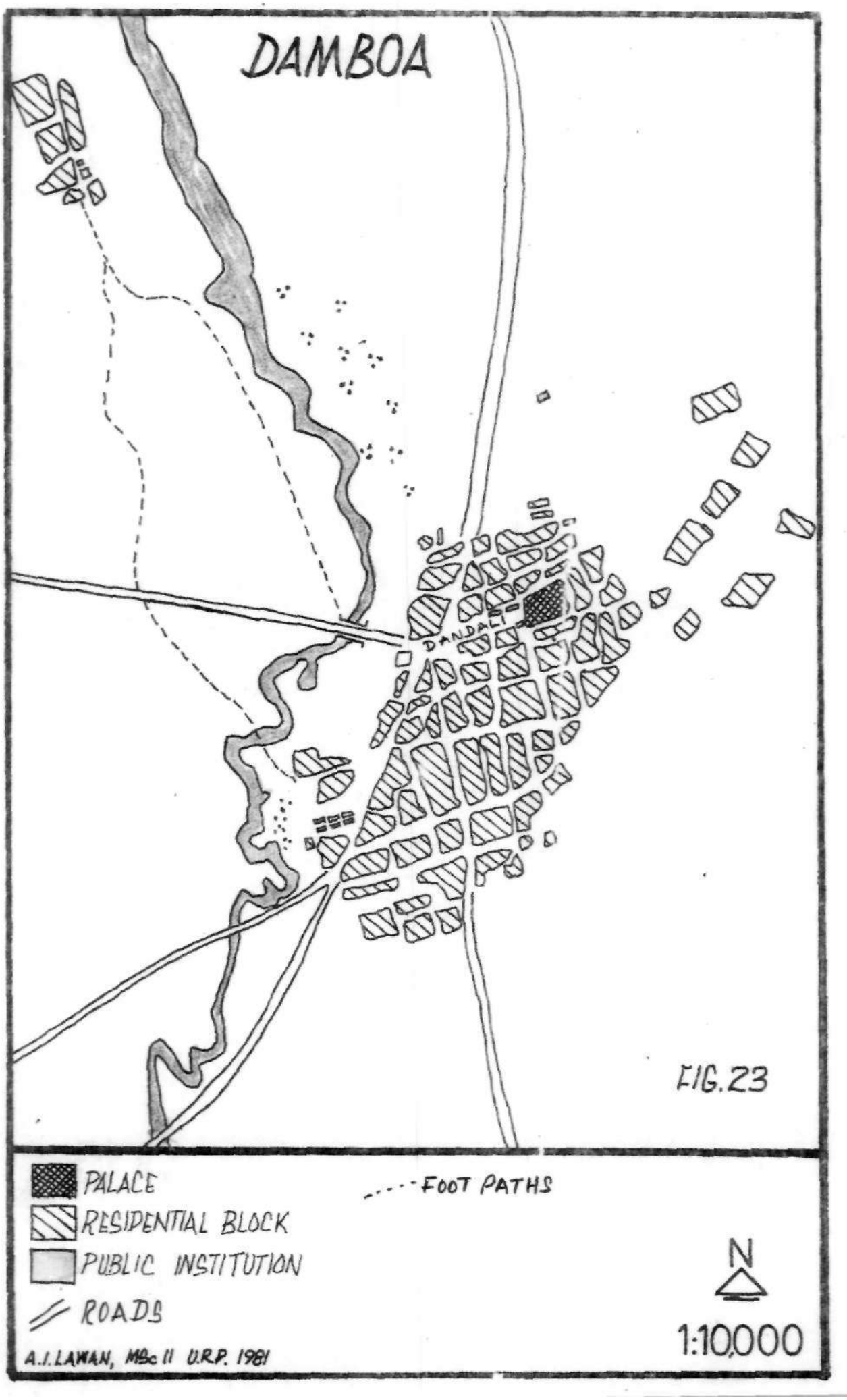
Rather they enjoy the use of taking winding paths, roads passing by their compounds, houses, trees and open market place to their destination.

For instance when a Kanuri man is going to his farm he does not proceed by taking a straight road which is usually shorter but because he considers strai ght course seems to be unending and monotonous and his farm much farther away than usual. This is a psychological feeling which is naturally inherent in him, it would therefore be difficult to easily persuade him to reach for instance his farm by a straight road. Then again a winding path as it meanders around, brings him in contact with many interesting landmarks, like the baobab tree or the big nim or mango tree from which he can always pluck some juicing fruits to eat, or even streams he can swim in or drink and such other natural landscape elements as have formed a substantial part and his way of life. This fact has remained for ages and has led to the organic evolution of the traditional core of Kanuri settlement in Maiduguri. The development grew out of the instinct for defence, secuity and agricultural, pastoral or hunting needs of the people.

Like in the Hausa and Yoruba settlements

where the wall surrounding the settlement provide proetction, so it is with the Kanuri settlements were located near the banks of river, stream both to provide water and protection from the other end. Fig. 23 and Fig. 4 shows Maiduguri, and Damboa. The river has been a means of defence during wars, as it was difficult for enemies to bridge over, this is so because of the low technology at that time. From the river bank the settlement spread farther and farther away in clusters of compounds with the Shehu's Palace nearest the river or in most cases in the centre of the community which is the case of Maiduguri Traditional Settlement , and commanding a good view everywhere befitting the dignity of a responsible overseer. Vast Open Spaces in the form of courtyards surround the palace and another large open space in front of the palace, while other compounds and houses randomly build around him secially people who are closely related to the ruling class.

There are no definite roads marked out, but there were footpaths that have developed naturally and organically depicting the movement patterns of the people and all converging to the palace for ceremonies, recreation, religious and administrative


DAMBOA
DANDALI
FIG. 23
PALACE
RESIDENTIAL BLOCK
PUBLIC INSTITUTION
ROADS
FOOT PATHS
N
1:10,000
A.I. LAWAN, MSc II U.R.P. 1981

functions. Fig. 24 shows these elements in Mongone and Kukawa as being old Kanuri towns.

The organic courtyard has emerged as one of the dominant spatial element in the Kanuri Traditional Settlement and in domestic house planning. Apart from the common recreational role it functions are numerous and vital to the culture and way of life.

The courtyard is the nucleus of the domestic house. It serves mainly for house-work and the adjoining verandah is its adjuncts. Formerly, it was relatvely uniteresting architecturally as its structure usually of rammed earth filling was not durable and bacame messy during rains. Nowadays conditions are improved with the courtyard being paved of concrete.

At its four corner are receptable permanently fixed to catch the rain water running off the roofs. Some firewood and old utensils are scattered here and there. Ropes stretch from one roof eave to the other for drying clothes in the sun. Women sit on the verandah busily spinning, sewing or engaging in other household industries. Here a woman is on her knees grinding pepper and there are some girls singing as the pound corn to the

# MONGONO

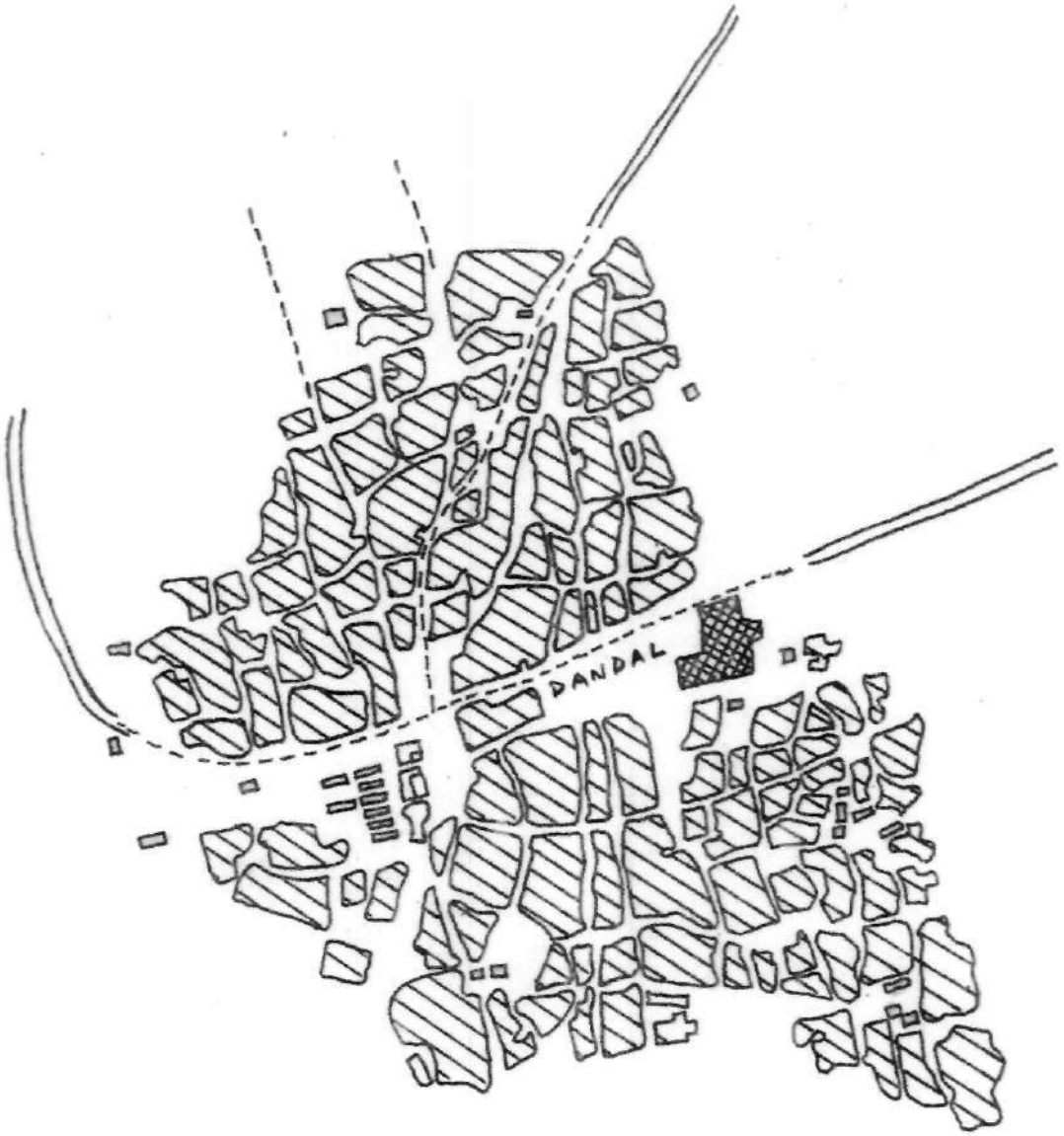



FIG. 24

PALACE
RESIDENTIAL BLOCK
PUBLIC INSTITUTION
--- FOOT PATHS
ROADS

N

1:10,000

A.I. LAWAN, MSc.II URP. 1981

rhythmic thud, thud of pestle against mortar. Sometimes there is open-air cooking, with smoke spiraling skywards. As children play within the courtyard, housewives of the typical polygamous home make it their battleground when quarrels and misunderstanding arises among them. And so life goes on within the courtyard.

Apart from above common utilitarian functions, the courtyard has significant social and communal aspects. The courtyard serves as the purdah for moslem housewives who are forbiden to go out. It also serves as playground for children. House unit with interlocking courtyards of various sizes to their age groups within the range of perent supervision. This means that the courtyard indirectly keeps children off the streets, especially away from automobiles.

The courtyard has been used for sleeping especially during hot hours both day and night. The courtyard and adjoining verandah, if the weather is favourable become hospitality and even sleeping places for new migrants to the city, thus providing shelter for the needy who otherwise must suffer lack of housing.

It can thus be accepted that the courtyard and verandah are sometimes the starting points for urbanization of new immigrant as he socialises by meeting other members of the household around his courtyard and becomes familiar with the tenor of city life. It 'contains' the dwellers, giving them a feeling of contentment, protection and security.

# chapter 4

# CHAPTER IV

## 4.0 DEVELOPMENT OF RESIDENTIAL PLANNING UNIT CONCEPT.

### 4.1 Principles derived from Forces and Elements:

The concept of Residential Area Planning is based on the outcome of the forces identified and the elements in the last chapter.

#### 4.1.1 Principles derived from Residential Units:

The element of Residential Unit: The room is the smallest component of the smallest residential unit which is the house or simple or complex compound. The simple compound ('Kor Gana') or complex compound ('Kor Kura') form the smallest residential unit. 'Kor Gana' caters for the husband, the wife or wives and children and they form a household with a household head ('fato'). The household for the complex compound is 'Kura Baba Fatoye' and simple household. 'Baba Fatoye'.

The ward and sub-ward comprises of a number of simple and complex compound. The sub-ward is headed by ('Bullama') sub-ward head while a number of sub-wards form the ward which is headed by a ward head ('Lawan'). It has a population of 2,500-3,500 people and it form the smallest residential planning unit. The District consist of a number

of wards headed by 'Lawan' and the whole city or town consist of a number of 4-6 district depending on the size of the town or city.

There is a hierarchy in term of the residential unit right form the simple compound to the city level.

The size and shape of the compound depends on the size of the household and the function it serves. The size of the cour tyard ('Suro-Fatoye') is the function of the rooms shape and size. The compound is surrounded by wall with one entrance and a frontage open space 'Fugu Fatoye'.

4,1.2 Principles derived from Socio-Political and Physical Layout:

The element from the socio-political and physical layout: Here there is a hierarchy from the Shehu down the hierarchy to the head of the simple hierarchy on the physical hierarchy we have the simple compouned (House) up the scale to the city level. Fig. 25 shows the relationship between the socio-politial. Structure of the society with physical layout of the city. Here emphasis would be put in the residential area in which the ward is the smallest residential area planning unit.

# THE HIERARCHY OF SOCIO-POLITICAL AND LAYOUT SUB-DIVISION

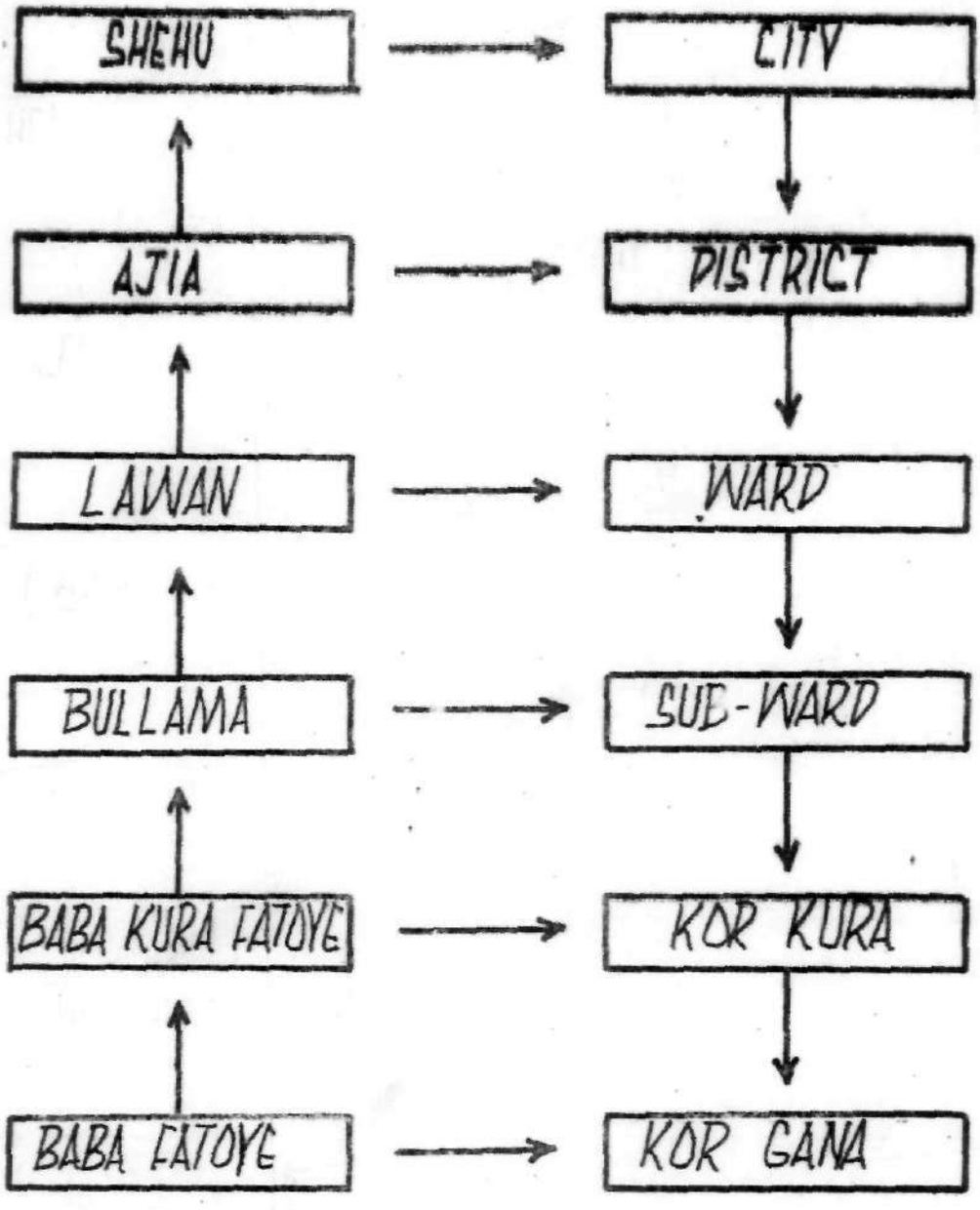



FIG. 25

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4.1.3 Principles derived from the influence of Islamic Religon.

The element of the structural positioning of the ward and the function it's serving. The mosque and the Shehu's Palace at city level form the focal points on which the Town develops. The Shehu serves but a religious/political leader. North and South of the Palace is the ruling class ward. On the east of the palace is the priest-hood ward - the Limanti ward while right infront of the palace is the largest hiearchy of open space which is multi purpose - 'Dandli'. There is a declining influence of both the religious and political ruling class as one moves outwards from the centre. Fig 26a shows the position of the various components which is depitcted in almost all Kanuri Settlements. The principle of proximity and social contacts are the main forces which influence such development.

4.1.4 The Religious Focal Point :

The element of religious focal point. The highest religious focal point is the Friday Central Mosque at the city level. It is also next to the Shehu's Palace. Around the wards are also mosque all scattered on the residential area. Such mosque are

# LOCATIONAL POSITION OF VARIOUS ELEMENTS IN RELATION TO THE SHEHU'S PALACE.

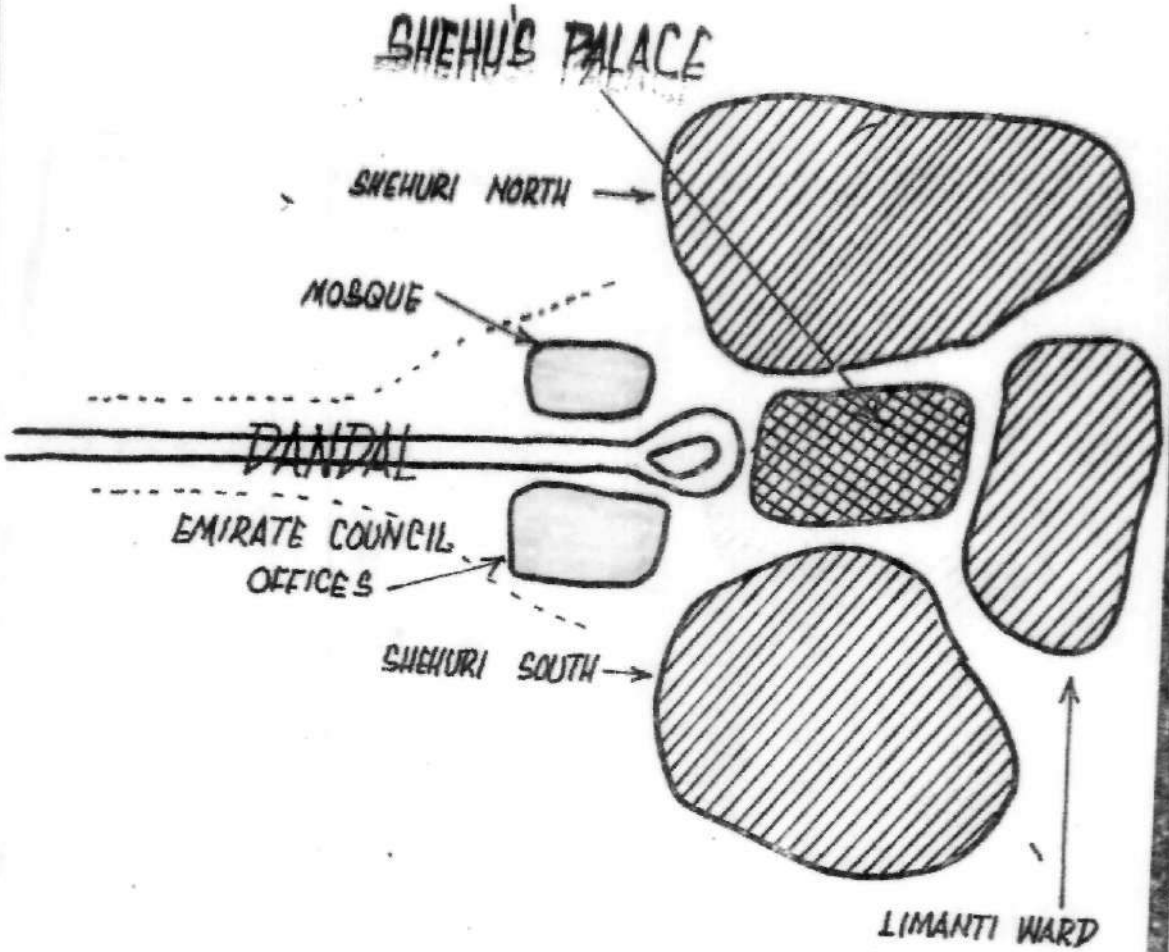



FIG. 26a

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used for the residents of the immediate locality. Others are found even at sub-ward level and in front of some well to do individuals. There is a hierarchy in terms of religiouns focal point right from the Friday Mosque to the sub-ward mosque at ward at ward level. The frequences of meeting decreases from Central Friday Mosque to the sub-ward mosque where people meet daily. Most of the open spaces are also utilised as open praying ground. Fig 26b shows the hierarchy in terms of religious focal points.

4.1.5 Socialization Points:

The concept of socialization points are usually open spaces where people come together for social activities such as playing cards, buying day-to-day items and kiosk where provision are usually available. Most cases open spaces under large trees are utilized for such purposes. Fig. 26b shows the hierarchy of socializatonpoints from the courtyard this forms the private socialization point at family level while the commercial socialization point from the open space shared by Simple Compounds right to the sub-wards which form the highest order socialization point. The socialization points can be categorised into two, the communal socialization

point and the private socialization points. Most of the religious meeting places also perform the socialization points, all the open spaces at all levels also perform the socialization functions.

4.1.6 Activty Areas:

The element of activity areas, these actitivity area includes the commercial points, administration areas and institutional areas. The commercial area have some elements of hierarchy from the city level we have the Monday Market - main market, then followed by the Women's Market 'Kasuwar Mata' usally at very close proximity to residential areas. The lowest hierarchy of the commercial activity areas are right in the residential areas they are usually open air mini market under the trees where day to day needs are purchased. Koisks also under the trees serve the same purpose. The administrative and institutional activity areas also serve the same purpose, socio-political functions. The Emirate Council Office, Local Government Offices, Traditional Court and Prison are all at close proximity to the Shehu's Palace while Schools both Primary and Islamic classes are all distributed in the residential area.

4.17 Open Spaces:

The element of Open Spaces. There are generally two categories, the private Open Space and the Communal Open Space. The Private Open Space is usually the courtyard found in compounds the highest hierarchy is the one in the Shehu's Palace 'Shehu Suro Fatoye' and the smallest is the courtyard in a simple compound 'Suro Tatoye' (Fig. 26b.

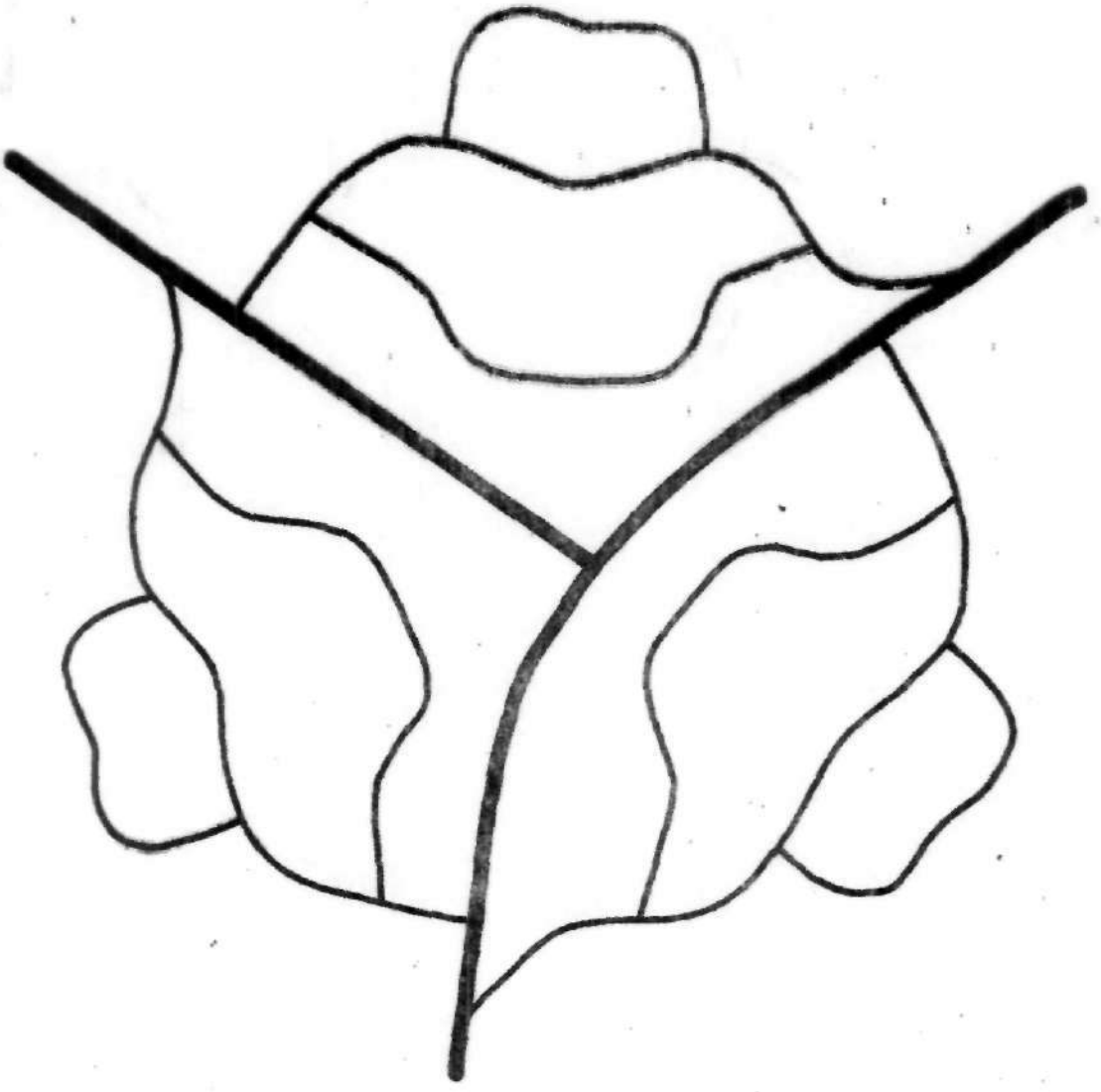
The Communal Open Space also in a hierarchy from the city level the largest is in front of the Shehu's Palace 'Dandal' then Communal Open Space at ward level complex compound and simple compound level. These open spaces are multi-functional.

4.1.8 Circulation Pattern:

The element of circulation pattern within the Kanuri Traditional Settlement grew organically. The roads are narrow and winding and they converge towards the palace. Towards the outer wards, the circulation pattern is more in a grid-iron pattern because of the influence of planning.

There is a hierarchy in the circulation pattern, the Dandal way forms the major road network pattern while the street and paths boarders the wards. Fig. 27 shows the hierarchy of circulation pattern.

# HIERARCHY OF CIRCULATION PATTERN



FIRST ORDER ROADS
SECOND ORDER ROADS
THIRD ORDER ROAD (FOOT-PATHS - UNDEFINED)

FIG. 27

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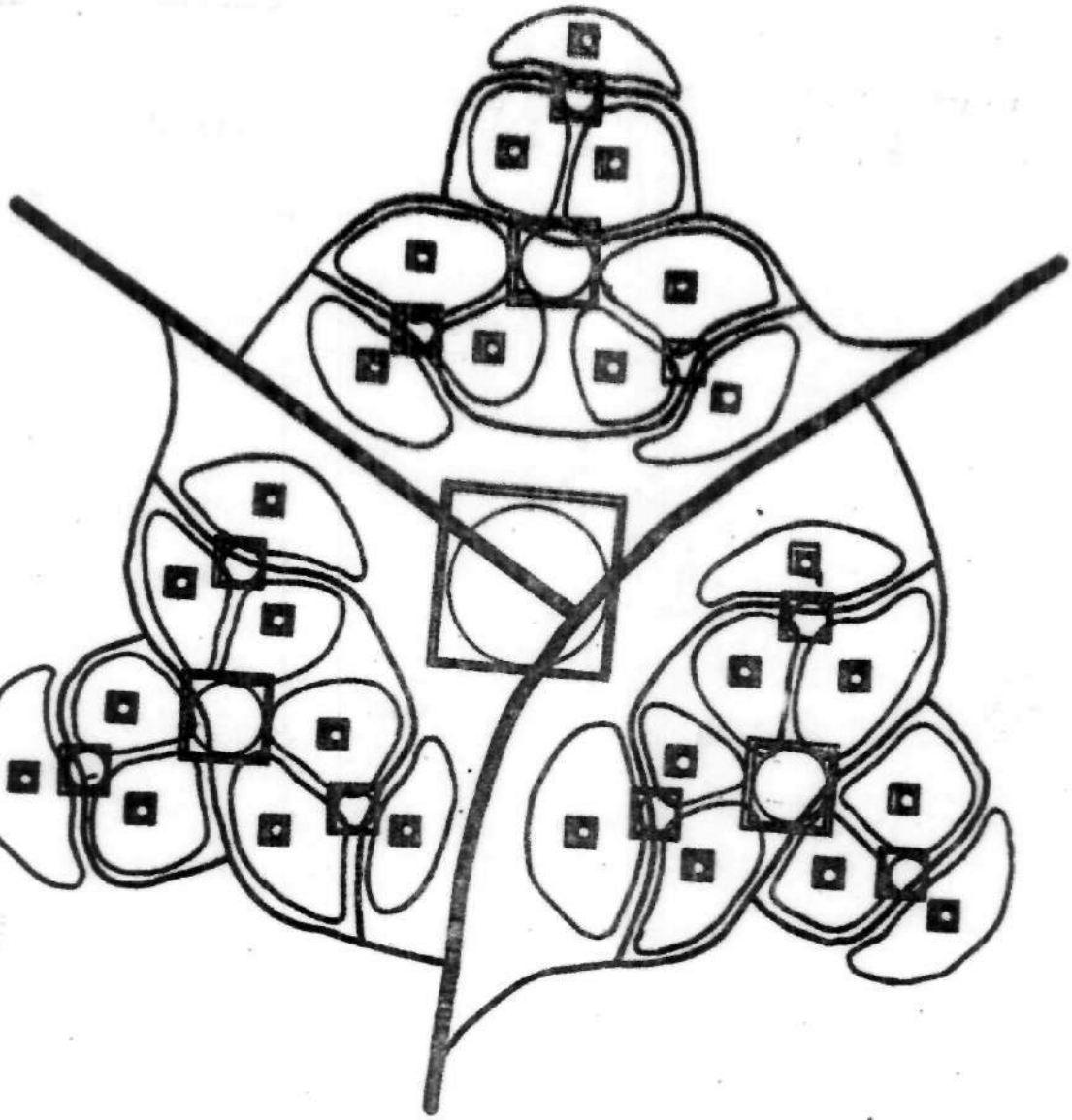
The individual compounds are served with foot paths. All the compounds accessible by foot path and they converge to open spaces at various levels. The pattern and shape of the compound form the boundary of the paths, streets and road network in the residential area.

4.2 Lawan Concept of Residential Planning Unit:

The Lawan Concept of Residential area Planning considers the ward system in the Kanuri Residential Settlement as the smallest basic Planning unit. It consist of a population of between 2,500 to 3,500 and it forms the basic unit to support facilities, amenities and services for the residential area. The Lawan Concept therefore is based on the elements evolved from the findings. Fig. 28 showing the concept developed from the elements idenfified.

The element derived from the socio-political an and the physical layout needs further modification for the Lawan Concept of Residential Planning Unit. For New Residential Area the place of the Shehu would no longer be there. Since the Shehu is seen both as a political and religious leader, it therefore been taken by the religious function to serve as the main pivot on which the new residential unit is to be formed. The largest open space forms is at

# LAWAN CONCEPT OF RESIDENTIAL AREA PLANNING



HIERARCHY OF

FIG. 28

○ OPEN SPACES.

□ ACTIVITY AREA.

□ SOCIALIZATION POINT.

RESIDENTIAL UNIT

CIRCULATION

A.I. LAXIAN, MSc. II URP 1981

the ward level 'Dandal Lawantiye'. The Dandal Lawantiye is multi-functional in the sense that it perform the main activity area and socialization point in the planning unit. Fir 26 shows the multi-functional open space distributed in a hierarchical order.

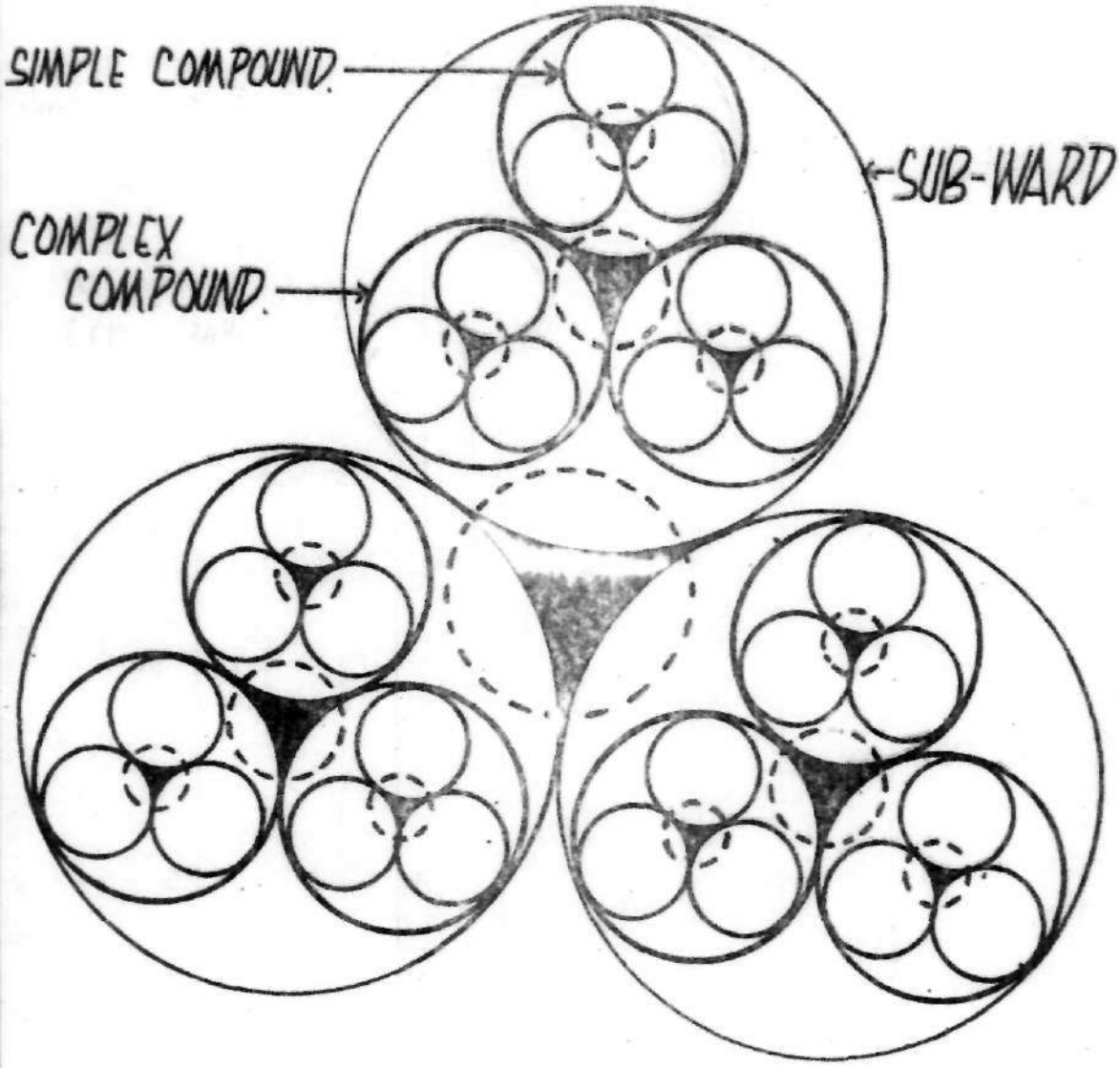
The private open space which is usually the courtyard 'Suro Fatoye', there should a hierarchy in terms of the private open spaces. Fig. 26 shows the multi-purpose nature of the open spaces they are hierarchical in nature.

There should be hierarchy of activity area based on the wards which is the smallest residential planning unit. Fig. 29 shows the hierarchy of residential units. The activity areas include those that cater for commercial activities which include today-today provision markets and Koisks and mini markets under trees. Other activities within the activity areas include institutions such as the primary school, dispensary and islamic schools. Offices such as the Lawans' office forms the highest activity area.

The circulation pattern is proposed in the Lawan Concept to discourage through traffic into all the residentail unit. The major street and

# HIERARCHY OF RESIDENTIAL UNITS

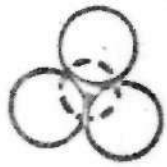
## WARD SYSTEM






SIMPLE-COMPOUNDS- COMPLEX-COMPOUND.

FIG. 29



SUB-WARDS - WARD.



COMPLEX-COMPOUNDS - SUB-WARD.

HIERARCHY OF OPEN SPACES

road pattern is to bound the sub-wards. Fig. 27 shows the circulation pattern and they are in hierarchical order. Within the complex compound level the network of circulation is left organic, it should be pedestrian in nature.

The residential unit formed basic structure for the residential area planning. The ward level form the smallest residential planning unit. Fig. 29 shows the various components which makes up the ward, right from the simple compound to complex compound, from complex compound to sub-ward and from sub-ward to ward. The wards forms the smallest residential planning unit.

The Lawan Concept of residential area planning is therefore the combination of the elements derived from the priciples of the existing residential area. Fig. 28 shows the Lawan Concept of Residential Area Planning and the hierarchical distribution of the open spaces, activity area, socialization points, residential units and the circulation pattern. The open spaces are also been utilized as religious focal points which is also distributed hierarchically in nature.

4.3 Application of the Concept.

The application of the Lawan Concept of

Residential Area Planning (Fig. 28) would generally be based on the provision of the threshold amenities, facilities and services that can be utilized at the ward level which forms the smallest planning unit.

The ward is expected to hold a population between 2,500 to 3,500. This is the expected to be sub-divided into three to four sub-wards which is expected to hold between 800 to 1,000 people each and it is to be headed by a 'Bullama' a title of administrator in case of any physical and planning requirement necessary. The Bullama's or the sub-wards are further sub-divided into complex compound which consist of compounds and households. The size of the simple compound in the traditional sense should be between 10-15 persons per household while the complex compound is anumber of simple compounds this varies with the nature of the extended family system. The complex compound may reach between 40-70 persons as the case may be in a traditional set-up.

All the supporting facilities should be based on the schedule of requirements based on the population it is been planned for. The road and the street network pattern should be based on the standards.

The Lawan Concept caters for flexibility in terms of movement especially pedestrian circulation.

There is a minimum travel distance for any conveniences in the ward.

Mixed-land uses would be encouraged especially those uses which does not conflict with residential uses.

CONCLUSION.

Proposing a concept for the Residential Area Planning in Kanuri Traditional Settlements and related settlements has to be considered from the existing situtation in the evolution of Organic Traditional Settlements. The proposal made on the Residential Area Planning should therefore be based on sound planning principles and the elements derived from the study so as to maintain the desirable cultural features of the society for whom the plan is made for.

The Traditional Residential Units are organically developed thereby showing a hierarchy of residential units, these units are inadequately provided with services, amenities and facilities. These has to be catered for towards developing a good livable environment. The Lawan Concept of Residential Area Planning Unit has taken care of such inadequecies. The Lawan is considered to be

the small residential planning unit for new areas.

The study also revealed that people in the traditional areas prefer locality shops to corner shops. In fact since certain individuals within the ward are known to be sellers of certain commodities, people prefer to patronise these sellers from whom they could buy anytime. For this reason it has been proposed that there should be a hierarchy in terms of activity areas which are usually found in most of the open spaces in the residential area.

The study shows the desire of the people in the traditional area and the use of traditional courtyard dwelling unit. This is becuase of the desire for the preservation of the linage system, as a basic residential unit, and the need for privacy.

It also shows a strong socio-cultural and religious cohesion more with the traditional compound set-up than the single detached houses.

It is also suggested that residential areas should be planned toward high density residential area, for the purpose of better utilization of space, for economy in the provision of urban facilities and services and above all for encouraging communal life and the desire for which socio-cultural

and religious activities are uphold.

It is therefore important to stress from the planning point of view that, whenever residential areas need to be proposed for either Kanuri or related societies, there is the need to study the forces and elements which have influenced the evolution of the existing settlments. A living example is the present housing scheme by the Federal Government, designing houses which does not serve the culture and the way of life of the community for whom the house was meant for.

## APPENDIX I

### Questionnaire

1. Serial No _____

2. Name of Locality _____

3. Age of Respondent

| 0-15 | 16-25 | 26-54 | 55+ |
|---|---|---|---|

4. Sex- Male _____

Female _____

5. Educational level

Illiterate _____

Primary Education _____

Post Primary Education _____

Post Secondary Education _____

6. Ethnic Group

Kanuri _____

Shuwa _____

Fulani _____

Hausa _____

Others _____

Reason of location, length of stay and the type dwelling

7. How you know anybody in this locality before you come to live here?

Yes _____

No _____

8. How long have you lived in this locality?

Less than 3 years _____

4-7 years _____

8-11 years _____

All my life _____

9. What other reaonss attracted you to this locality?

(a) Proximity to relative/ethnic groups

(b) Close to work place

(c) Close to religious groups.

(d) Close to friends.

10. Type of dwelling

(a) Courtyard compound

(b) Single detached house

(c) Others.

To find out if the household will want to remain in his present locality, dwelling type.

11. Which of the following type of Residential locality would you prefer?

(a) G.R.A. type

(b) Low cost housing estate type

(c) Traditional compound type

(d) Don't Know

12. Summing up your feelings about the locality

'Level of Satisfaction'

Very satisfied ____

Satisfied ____

Fairly satified _____

Fairly dissatisfied _____

Dissatisfied _____

Very dissatisfied _____

13. The General Housing Conditional Material for Construction, Facilities and Amenities.

| Types of material | General Condition | | |
|---|---|---|---|
| | Good | Modern | Poor |
| 1. Concrete block | | | |
| 2. Brick | | | |
| 3. Mud | | | |
| 4 No response | | | |

House Roofing Materials.

| | Type | % |
|---|---|---|
| 1. | Corrugated sheet | |
| 2. | Mud | |
| 3. | No reponse | |

Amenities in Household.

| Facility Yes/% No/% | % of No Response |
|---|---|
| 1. Latrine<br>2. Tap Water<br>3. Bath<br>4, Shower<br>5. Electicity | |

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