PROVIDING SHELTER FOR THE URBAN POOR: 
A CASE STUDY OF DISPLACEMENT TRENDS IN 
DANDORA SITE AND SERVICE SCHEME: KENYA

BY

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DECLARATION

I would like to thank all the people whose concern, encouragement and advice served as a source of motivation and inspiration in the work, exercise of collection, analysis of the research and writing of this work. Special thanks go to my academic advisor, Prof. P. Ondiege, lecturer and constructive comments ensured that the threat of this work was not detailed. Any weaknesses, omissions or shortcomings are, however, my own.

I cannot forget the useful inputs in form or suggestions from other members of academic staff in the Department of Urban and Regional Planning and farming student college.

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I would like to thank all the people whose concern, encouragement and advise served as a source of motivation and inspiration in the whole exercise of collection, analysis of the research data and writing of this work. Special thanks go to my academic supervisor, Dr. P.O. Ondiege lecturer, Department of Urban and Regional Planning whose patience, continuous advice and constructive comments ensured that the thrust of this work was not derailed. Any weaknesses, omissions or shortcomings are, however, my own.

I cannot forget the useful inputs in form of suggestions from other members of academic staff in the Department of Urban and Regional Planning and fellow student colleagues.

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ABSTRACT

Shelter problems is common in most urban areas of both developed and developing Countries. Most urban migrants are faced with a challenge of identifying a suitable and affordable shelter in the midst of stife competition for the limited vacant houses in an urban setting. The search for shelter almost becomes a factor which determines urban peoples lives and a major problem. As the surge to the cities continue, the competition for space is bound to become stiffer, house rents higher and squatter and slum settlements will be more and more. There is therefore need to convince nations to undertake an assessment of their shelter and settlement proposals and priorities as well as draw up strategies, policies and programmes aimed at solving shelter issues for their respective societies.

This study attempts to investigate how urban shelter problems have affected the very low income earners who in the past have been considered as beneficiaries of site and service plots. The main approach to the problem resolves around critical analysis of the causes and implications of displacement, examination of the problems experienced by the Dandora Phase 1 allotees with regard to the project location, financing as well as highlighting the efforts so far undertaken towards alleviating shelter problems for the low income earners through Kenya's housing development and policy guidelines. Displacement will be taken to imply the process through which the very low income earners are displaced from their plots by urbanites with higher incomes forcing some of them to live in low quality houses.
This problem is a major one in most site and service schemes and has rendered a number of the would be target group for such projects homeless.

Various forms of data sources were used in the evaluation of the displacement phenomenon. Through observation at the site, details of the project and facilities were covered, while scanning of the available literature provided immense insights concerning the study subject. General aspects of site and service schemes, the Dandora project implementation and its impacts are examined. Observations arising out of formal and informal interviews have been used to explain the implicit process of displacement patterns along with the empirical exploration of the effective distinction of the socio-economic characteristics of the Dandora residents. It has consequently been established that those who have replaced the initial allotees at the project are significantly different in terms of family sizes, age and have higher incomes and education level. So far over, half of the original allotees have been displaced. From the same data source tentative determinants, patterns and effects of displacement have been derived.

The investigation reveals that the identified displacement trends in site and services schemes does not urger positively for the future of such schemes. There is need therefore to establish alternative ways and means of how the process could be minimised in future projects of this nature.
It could also be concluded that site and service housing approach has not been very successful, and as such, an alternative shelter policy to cover the urban poor is due so as to control the number of sprawling slums and squatter settlements in Nairobi and in other major towns.

The summary of the findings and recommendations finally outlined in Section 1.5 and 5.2 and Chapter 6 have emanated from the study observations and are by no means exhaustive. A further study covering certain scopes of site and service schemes would no doubt strengthen the rational issues raised here and consequently facilitate in the formulation of an alternative policy towards implementation of appropriate and affordable quality shelter for urban poor who may not afford conventional housing and have now been voted out of site and service projects formerly meant for them.
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CHAPTER ONE

INTRODUCTION

1.1 PROBLEM STATEMENT

As a result of rapid urbanization and population growth, Nairobi like most World Cities has been faced with housing problems. Immigration to urban areas creates an imbalance in terms of available services and facilities both in shelter and employment opportunities. Consequently, only a few urban dwellers manage to get well paying jobs to enable them live in standard houses. Most of the low income earners cannot afford rents charged in conventional housing units and are therefore forced to live in overcrowded unplanned residential areas in low quality houses with poor sanitary facilities, social and environmental conditions.

Their attempts to secure affordable houses are no doubt frustrated by the high standards and cost of conventional houses, lack of guarantees for homeloans, relatively high costs of urban land conventional construction materials, and high rates of loan repayment. This being so, it has been difficult for the private housing developers to include the urban poor in their housing programmes. It is with this insight that the Kenya Government adopted and supported the site and service scheme strategy through which a series of shelter projects could be started purposely to encourage the low income persons to own houses.
Constitution of the urban poor in terms of their income resources has varied between related subjects. The World Bank Paper No. 389 of 1980 quoted the lowest income earners as persons earning between Kshs.0-800/=.
The lowest paid persons in the Civil Service according to the 1979 - 80 Salary Review were getting Kshs.500/= and Kshs.400/= house allowance. This salary is certainly higher now after the 1985 Review. The Statistical Abstract 1985, shows that the very lowest income earners in urban areas are those earning below Kshs.700/=.

These figures closely tie with the Central Bureau of Statistics (CBS) where the lower income earners have been taken as that group earning below Kshs.700/= per month as of 1975, which if adjusted for inflation today comes to about Kshs.2000/= per month. The lower income households in this study will be split in three groups as below.

<table>
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<th>INCOME GROUP</th>
<th>MONTHLY INCOME KSHS</th>
<th>% OF NAIROBI POPULATION</th>
</tr>
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<tbody>
<tr>
<td>V.V. Low</td>
<td>700</td>
<td>15%</td>
</tr>
<tr>
<td>V. Low</td>
<td>701 - 1500</td>
<td>50%</td>
</tr>
<tr>
<td>Low</td>
<td>1501-2000</td>
<td></td>
</tr>
</tbody>
</table>

If we adjust Kshs.280/= as from 1977 to 1986 for inflation purposes, this comes to about Kshs.700/=.

Since Kshs.280/= was the minimum income used during the allocation of the Dandora Phase 1 Plots, it will imply that those earning Ksh.700/= today will be in the very very low income scale and could be termed as the urban poor. The study could also adopt the (CBS) classification of the urban poor i.e those earning below Kshs.700/= for it is based on the cost of living. The displacement process will imply the trend through which the site and service schemes' original allotees sell their plots or houses after failing to complete them, pay loans or afford to live in them and have consequently been bought off by better off landlords who have forced them out of the schemes. Some of those poor displaced persons reside in poor quality housing. This process could also apply loosely to the tenants who as a result of their inability to pay rents in site and service schemes may be forced out of the schemes due to relatively high rents that are unaffordable by them.

The displacement process in such schemes was identified by HOEK-SMIT (1982) in Zambia, MAYALLA (1974) in Tanzania, LAMBA (1983) and JORGENSEN (1971) in Kenya. However, no investigation seem to have been carried out to establish the degree of this process. This study is therefore meant to purposely determine the magnitude and implications of displacement in Dandora Site and Service Scheme. Phase 1 of this project which is the most developed has been taken as the case study.

Having been established as one of the ways of alleviating housing demands for the low income earners, Site and Service Schemes have been extended to other Kenyan towns like Kisumu, Mombasa, Nakuru, Thika and Kitale.
If displacement taking place in such Schemes result in creating houselessness for the majority of the target group who are poor, for who they are meant to benefit, then there is an absolute need for identification of an alternative approach to shelter problems likely to affect the very very urban poor earning below Kshs.700/= and leave such schemes to the low income earners i.e those earning between Kshs.701-2000/=.

The findings of this study may lead towards possible strategies for approaching this problem, while subsequent observations and proposals may also pave way towards a revision of regulations guiding construction and management of site and service schemes and hence become a sound contribution to the current efforts to identify alternative ways and means of providing affordable shelter for the urban poor using local skills technology and improved local materials for construction.

1.2 STUDY OBJECTIVES

The objectives of this study are to:

(i) Investigate the housing ownership change in the project,

(ii) Compare and contrast the socio-economic and cultural characteristics of the displaced and existing residents so as to determine if those allottees leaving are in any way significantly different from those replacing them,

(iii) Examine current and past problems in the design, location, financing, servicing and plot allocation process that may have contributed to high displacement,

(iv) Examine the impacts of the project on the community.
Formulate policy recommendations for minimising the displacement of allotees from future Site and Service Schemes.

1.3 SCOPE OF THE STUDY

This study is an attempt to evaluate displacement patterns in terms of its causes and implications. Phase 1 of the Dandora Site and Service Scheme has been chosen as it is the most developed compared to other Phases. Although there are numerous site and service schemes in Nairobi, Dandora happens to be the largest of all. The study is primarily concerned with the examination of households which have been displaced from the schemes, those which have held on to their plots and the tenants and new landlords who have moved into the Estate. The survey will also attempt a socio-economic analysis of the Dandora residents as well as evaluate the project problems and impacts on the community.

Brief review of the existing housing development strategies and housing policy in Kenya will be done. The core concern will however be the discussion of the displacement process in the project as a key factor through which the urban poor are displaced from their shelter programmes thus condemning them to live in slums and squatter settlements both in misery and despair.
1.4 HYPOTHESES

In this Study, it is hypothesised that:

(i) Site and Service Projects if properly instituted could greatly contribute in providing solutions to the shelter problems affecting most of the low income earners who constitute 50% of Nairobi's urban population,

(ii) The developers of Site and Service Schemes adopt too high housing standard in view of the affordability rate of the target group, thereby attracting the wrong group,

(iii) The basic priority need of the urban poor is beyond shelter and that shelter related programmes for this category of citizens should be planned along with other income supporting schemes within such future sites.

(iv) The victims of displacement come from the very poor who cannot afford the financial demands of Site and Service programmes,

(v) Those who succeed in constructing their houses at such sites obtain reliable incomes through subletting and hence consider their properties more as a source of income than private comfortable standard homes.
1.5 METHODOLOGY AND LIMITATIONS

The data for this study was initially obtained from reading the existing written materials on housing in general and specifically on site and service schemes. Details of Dandora Phase 1 plot allotees and change of house ownership was obtained through household interviews and from the house files at the project office. Information of the project management and related problems was got through interviewing officers at the project office.

For purposes of getting other information analysed in this study, three types of questionnaires were conducted to 130 respondents which is 12.54% of all the Phase 1 housing units. The questionnaires were split as follows: 50 to the Stack-on-Allotees, 50 to the New Landlords and Tenants and 30 to the Displaced Allotees. However, it should be noted that 60 questionnaires were posted to the displaced allotees the addresses given by some of the tenants and the new landlords. Other addresses were obtained from the Project Office. To assess housing conditions and familiarisation with the study area, an on site inspection was carried out. There are a number of Plates and Maps to support the findings and analysis.

One major limitation experienced is that out of the 60 postal questionnaires to the displaced persons, only 27 were returned most of which were partially filled. The other 3 displaced persons had sold their plots to relatives and therefore it was easy to trace them and interview them. Those 3 then could therefore be taken as the most complete amongst the 30 displaced persons' questionnaires analysed here.
This study establishes that: the Dandora Project did not fully and effectively achieved its objectives since most of those with the lowest incomes could not meet the project's financial demands and therefore sold their plots to better-off landlords; most of the Dandora residents earn between Kshs. 801-1501/= implying that this is the group that could afford the site and service schemes; those allottees who kept their plots have found them as sources of incomes through letting or subletting; 58% of the original allottees have been displaced by persons with higher incomes and education, smaller size households, younger households and with fewer dependents; some of the problems experienced by residents include, water, theft, rubbish, dust, sanitation and the distance of the estate from the City Centre; and that the majority of the residents are engaged in the informal sector economic activities.

This study is divided into 6 Chapter. Chapter 1 forms the introduction covering problem statement, study objectives, scope of the study, hypotheses and research methodology. Chapter 2 comprises of the literature review and Chapter 3 contains the background information to the study. The background information in this section covers the location of the study area, general aspects of site and service schemes, brief description of the project and the impacts of the Dandora project on the community residing there. Chapter 4 covers the housing development and policy in Kenya and how the two have affected the provision of low cost housing in Nairobi. In this Chapter are also suggestions of alternative shelter for the urban poor through which the process of displacement in such sites would be minimised.
Chapter 5 is the analysis section which has covered the issues related to displacement in general and specifically to Dandora Phase 1. It also covers the analysis of the Socio-economic characteristics of the Dandora residents, suggestions and observed causes and implications of the displacement process. Chapter 6 forms the conclusion and study proposals in form of tentative recommendations. Figure 1 shows Nairobi District in Central Province while Figure 2 shows Nairobi and its immediate hinterland. Plates 1 - 7 serve as illustrations of the existing situation at the project site as pertaining the construction process, and various forms of housing designs. These are clear manifestations of the project failure in terms of proposed designs and implementation process which has now run for over 10 years.
Boundaries:
- International
- Provincial
- District

Provinces:
- Nyanza
- Western
- Rift Valley
- Central
- Nairobi
- Eastern

Studies Area

Kenya: Administrative Districts Fig. 1
FIG NO. 2: The Nairobi Region.
Although completion of the Dandora houses was expected to take 18 months, construction is still going on even after 10 years. (SEE PLATES 1, 2 & 3) and construction materials are scattered all over the estate.
HOUSING DESIGNS

Plates 4, 5 & 6 shows some of the magnificent housing units constructed by rich plot owners, while Plate 7 constrasts sharply with the above.
CHAPTER TWO

LITERATURE REVIEW

Kenya like other Countries has sought through various ways and means to increase low cost housing units in urban areas by adopting the Site and Service Scheme Strategy. Other developing Counties which have adopted similar approach include amongst others, Tanzania, India, Iraq, Turkey, Jamaica, Senegal, Nicaragua, Botswana, El-Salvador and the Republic of Korea. In all these Countries the Site and Service Urban Housing Scheme are considered as a means for issuing low income people with legal titles to the property ownership.

However, as reported in the World Bank Sector Policy Paper of May 1975, the problem of displacement of initial allotees in such schemes is quite discouraging and portray negative implications of these schemes. Similar displacements were identified by PEATTIE (1978) who noted that Site and Service Schemes tend to attract economically well off urban households who buy or rent off homes from the target groups most of who subsequently move out and back to their original low quality houses usually in slums or squatter settlements.

Urban shelter problems for both the poor and advantaged groups have been expressed by most City authorities throughout the World. It is not only the very poor urban dwellers who have found it difficult to identify standard dwellings they can afford to pay for. This problems is wholesome in view of the rising cost of living and uncontrolled rent charges. This is why the Kenya Government has been concerned about shelter problems both in urban and rural areas.
WANJOHI and CHANA (1977) argue that the constraint towards planning shelter for the urban poor involves:

(i) Lack of defined national objectives and goals for planned housing programmes to coopt this category of citizens;

(ii) Problem in identifying and selecting the persons earning below Kshs.300/= per month (i.e below 700/= in today's standards).

(iii) Housing designs and plans are based on existing housing standards thus hiking the total cost of a dwelling and hence high loan repayments.

(iv) Inadequate Government subsidiaries for low cost housing programmes to supplement those offered by the City or town authorities and other donors.

Africans during colonial era were not considered as permanent urban settlers and therefore the housing for them was more or less based on the 'bed space per worker.' STREN (1970) related the rat-borne epidemics in colonial African quarters to low housing standards. In her Paper for a Workshop on Kenya's Informal Activities (1976) HOEK-SMIT noted that having irregular and unstable incomes, most of the urban poor have always been neglected when housing policy and development plans are formulated. She also expresses that most of the Private Sector housing developers restrict their loan coverage to those with substantive incomes. Her contention is that homelessness in urban areas of developing nations bear their roots from the inflexible housing codes and policies which ignore appropriate technology and also as a result of rapid uncontrolled urbanization trends. HOEK-SMIT has also touched on the issue of biased house allocation process.
which mostly favours influential and financially strong urbanites at the expense of the disadvantaged groups.

HOEK-SMIT is to some extent right in that the standards of housing construction operating in most developing countries were inherited from different environments. There is need to adopt relevant standards by adjusting the existing housing regulations inorder to address ourselves to the prevailing socio-cultural environment in Kenya. Besides the evaluation of the building codes, the issue of low cost housing construction costs be reviewed inorder to attract and retain the target groups in housing programmes planned for them.

Although most Governments cannot afford to provide subsidised rental houses to the urban poor, HENRY AARON (1972) argued that any Government with support from other housing related organizations is capable through strong commitment of alleviating housing problems through subsidy to provide shelter to the very poor urbanites. Subsidising poor urbanites shelter programmes was also recommended by OLU SULE (1981) who also condemned the existing urban housing systems allover the World for being biased towards urbanites with sound incomes. According to him, the following may be considered as the groups which rightly qualifies for the subsidised urban poor shelter programmes.

(i) Families with no housing facilities and squatting in crowded unhealthy environments.

(ii) Families which are just about to be homeless as a result of eviction notice, drought, floods or fire, and

(iii) Families paying rents which are unreasonable in relation to their incomes.
Having been convinced that conventional housing programmes is beyond the affordability of the majority of its urban growing population, Zambian Urban Authorities in an attempt to solve urban homelessness have embarked on community participation shelter programmes in squatter upgrading. However, Site and Service Projects were started there by the 1960s. Zambia became the first African Country to adopt an official housing policy of upgrading squatter settlements. This attempt was meant to benefit the very poor urban population.

Unlike the Kenyan Site and Service Schemes the plot owners in Zambia are expected to take part from the very initial stages i.e laying of the infrastructural systems and this minimises the construction cost and hence the loan repayment rates. Inspite of this SMIT (1982) indicates that some of the plot allotees being unable to pay back the loan have been bought off by better off landlords who takes over plot ownership. Although this happens to be one of the negative experience in such schemes, SMIT expresses that Site and Service Schemes approach is identified as a means of motivating the urban poor to build and own homes. This appears to be the only alternative in view of the rising costs of rents which are a product of the increasing costs of urban land and alarming prices of construction materials.

MORGAN (1983) relates shelter problems in most world cities with lack of concern of respective city authorities in 'coming to terms with urbanization and its problems.' May be MORGAN had in mind the idea of projecting housing with the increasing urban populations with prompt attempts being made at all costs to increase housing units before their demands become unmanageable.
In a bid to solve shelter problems for the urban poor in most U.S. Cities, the U.S. Housing and Urban Development Research (1979) recommended that the minority urban poor should be given equal chance and access to housing opportunities. However, a research done about the same time revealed that it is difficult to identify who could qualify as the urban poor and that identification of such a group could qualify us the urban poor and that identification of such a group could only be done in the framework of the historical socio-cultural and political system surrounding the U.S. Urban poverty. Contrary to the Kenyan situation, urban poverty in most Cities in the U.S. according to that report is closely related to racial climate, residential segregation and civil rights.

This issue of homelessness seem to have affected most nations. This is possible with regard to the (1982) United Nations General Assembly Proclamation of 1987 as the International Year of Shelter for the homeless (IYSH). This issue has been accorded strong support by various Government and Non-Governmental Organisations to the extent that over 100 member Countries had registered as participants by 1984. The (IYSH) programme as will be seen later is geared towards the need to secure renewal political commitment and effective action to help millions of the poor and the disadvantaged minority groups acquire and improve their shelter, as well as integrate them in development activities. Its main objectives is to improve shelter for the poor citizens and the homeless persons by 1987 and to thereafter develop and implement new national policies towards sheltering most of the urban and rural homeless families by the year 2000.
This study tie strongly with the views expressed by various writters on housing, quoted here, particularly as far as recognision of housing problems affecting the urban poor is concerned. This study has though gone deeper into the subject by investigating what actually happens at the site and service schemes once the developer has gone. Housing displacement of the initial allotees have been discussed critically as a key factor which has rendered the site and service schemes policy a failure in achieving its objectives of providing shelter for low income urbanites who cannot afford conventional housing. An attempt has also been made to identify appropriate alternative shelter for the very urban poor in order to defeat the process of displacement. Figure 3 on page 22 shows the study area in relation to other residential areas in Nairobi.
FIG. 3: LOCATION OF THE STUDY IN RELATION TO OTHER RESIDENTIAL AREAS OF NAIROBI
CHAPTER THREE

BACKGROUND

3.1 LOCATION OF THE STUDY AREA

The housing project covered in this study is located in Nairobi, Kenya's Capital City. It is part of the Dandora Site and Service Scheme which when implemented is expected to comprise of 6,000 housing units. The scheme is located in the Eastern part of Nairobi. Phase 1 of this scheme which has been taken as the study area comprises of 1,037 serviced plots which were allocated to Nairobi residents earning between Kshs.280-650/= per month in 1975. Construction of the units was however started in January 1977. Some of the residential areas surrounding scheme include Kariobangi Estate, Umoja, Ring Road, Ruaraka and Korogocho slum settlement. The Nairobi's Eastern residential zone is occupied by the middle and low income groups.

In general most residential zones in Nairobi bear roots of the Colonial legacy dated back to 1913 when Simpson articulated racial segregation to ensure effective control of the indigenous people. To some extent, similar trends prevail today conforming to 3 zonal stratum of high medium and low income units. It happened that Africans were the one living in the lowest housing quality. Residential racial segregation is gradually disappearing in that with a rise in income all citizens are capable of moving into a residential areas of their choice. This is why there has been a high turn over rate in house ownership within Nairobi.
With the racial barrier break through, it is expected that there will be mixed urban communities in the residential neighbourhoods.

Estate distribution by races was enforced after the 1948 Nairobi Master Plan. There were no residential plans for the Africans whose entry into the urban centres was controlled by the Immigration Repatriation Orders. Having overlooked the possible growth of urban population, during the Colonial error, it was impossible to service Nairobi population after Independence when such repatriation orders became inapplicable. Homeless migrants having no alternative turned into squatters and slum settlements. It is now that the Kenya Government is keen to reduce such unhygienic settlements through upgrading as well as planning numerous low cost housing at site and service schemes. Dandora is currently the largest of such Schemes in Nairobi. Projects of similar nature have also been started in some of the major towns in Kenya i.e. Kisumu, Nakuru, Mombasa and Kitale.

3.2 GENERAL ASPECTS OF SITE AND SERVICE SCHEMES

The main fundamental elements in the Site and Service Housing Strategy is that the approach makes homeownership possible for low income people on a special tenant purchase basis. Site and Service Schemes in Kenya date back to the 1960s. The earliest schemes were as a result of the urgent need of resettling squatters who had lost their land, homes and jobs during the Emergency period. It has been clearly stated in the 1970/74 Development Plan that Site and Service Housing Schemes were expected to be a significant part of Housing Programmes in view of the shortage of low cost housing units. This approach towards provision of houses to the very poor urbanites have so far been strongly supported by
the Kenya Government and various attempts have been made to define Site and Service Housing Schemes. The literal definition could be accepted as the incomplete housing programmes. In the 1970/74 Kenya National Development Plan, these schemes are defined as those that comprise of low cost houses, constructed at an average cost of K£450, per unit, and in which allotees are involved in the construction process. JÖRGENSEN and HOULÆRG (1971) defined them as schemes which, plots and services for low cost houses which are financed from private resources. STEELE (1971) defined them as housing schemes where residents have a wide range of household incomes while MARK (1974) describes the schemes as comprising of housing units where occupation takes place before completion and that completion time is infinite. In Volume II of the Integrated Improvement Programmes for the urban poor 1981, these schemes have been defined as a range of shelter projects which fall short of provision of complete dwelling units (p.7). In this context the owner is expected to develop the plot on progressive stages.

MAYALLA, (1976) generalised Site and Service Schemes to mean preparation of land to facilitate construction of homes by occupants using self help resources with provision of public utilities and communal facilities by public agencies. In this study, a Site and Service Scheme (in which Dandora Project falls) will be taken to mean a housing programme in which a plot with services such as water sanitation, roads and social services are provided by the developer leaving the plot allotee to construct the basic housing units through own savings to supplement the materials loans.
In most site and service schemes in Kenya, a materials loan is negotiated on behalf of the allotees by the Government at low interest rates. Site and Service Schemes are meant to assist the urban poor who cannot afford to rent or purchase conventional homes in urban areas. Although some critics view such schemes contemptuously as upgraded slums, they are nevertheless above this grade. The displacement which have resulted with the replacement of allotees with the lowest incomes by other landlords with better incomes have changed the community expected to live in such schemes tremendously (see 5.3). The site and service units low capital costs per unit is quite encouraging towards construction of more and more units. It is today the only means through which the low income groups in urban areas can be helped to own homes.

In most site and service schemes, the loan usually extended to plot allotees is normally small with low interest rates and repayment is extended over a long period 20-30 years. This applies to Kenyan schemes and to some extent the Zambian and Tanzanian schemes. Reviewing site and service schemes in Tanzania, KAMUKALA (1976) found that loans given to plot allotees of such schemes in Mbeya and Mikocheni ranged between Tsh.1095 and Tsh.4043 and loan repayment ran over a period of 20 years.

Another view on site and service schemes entails that a housing authority allocates an area for low cost housing development, provides the area layout of the housing designs as well as installing basic services then leaves the plot allotees constructing own homes through self help labour and resources under close supervision of the authority concerned.
The advantage here is tapping family savings into housing development.

Site and Service Projects could be considered as a shift of focus from providing houses to providing serviced plots. The original attempt to the approach was to develop a policy instrument capable of meeting the needs of families at the lowest income spectrum and to harness the energies of plot allotees by involving them in the project implementation. Being thus allowed to take part in the implementation, the beneficiaries of such schemes are likely to develop feelings of attachment to the project as well as feel committed to take part in the construction process. In the same way coordinators of such schemes must ensure that construction is done as swiftly and steadily as possible so as not to defer gratification of wants by the target group. It is normal for human beings to assess in advance the benefits expected after every attempt they make towards improving their lives. People have their own way of evaluating benefits according to time and therefore the time taken to complete the project must be well budgetted to avoid pulling off, of the weak participants.

Some of the roles played by site and service schemes towards an effective residential settlement policy include: improvement of the urban poor by increasing their access to urban facilities; directing and controlling urban growth by balanced housing development for all urbanites and orienting Government and private agencies towards addressing themselves to the housing problems affecting all citizens. In an attempt to make such projects relevant in alleviating housing problems; it is useful to identify the target group properly in terms of their affordability levels, that the allotees be not made to pay more for their plots than they were paying at their previous residence, that such projects be conveniently located within easy access to employment
sectors and to other urban facilities, and that evaluation of the implementation process be done in time in order to identify the allotees who may have serious problems that may force them to give up construction. Such intervention may to some degree control displacement of the urban poor from site and service schemes at the early stages of project implementation.

3.3 **BRIEF DESCRIPTION OF DANDORA HOUSING PROJECT**

The development of Dandora Site and Service Scheme was an attempt to solve housing problems for the low income earners. Its main objectives was to: create maximum number of housing units with basic facilities of privacy; provide security, health and social environment; increase overall housing stock in the City; creat self-generating housing development through self-reliance, extend basic facilities to the very poor in Nairobi; as well as improve progressive shelter development by tenants as they take up residence. Dandora is an example of a large scale attempt by the City Council and Kenya Government to programme, plan and implement a low cost housing for households earning as little as Kshs.280/= per month by 1977. The Kenya Government has continued to support such schemes even in smaller urban centres as an affirmation of its policy on provision of standard and affordable shelter to all the citizens.
Inspite of any shortcomings or constraints of the Dandora Project, the effort to launch such a project is nevertheless not futile for it resulted in the generation of collective skills which were otherwise not tapped before and it is one of the projects in which the allotees were given chance to participate in the implementation. The project emerged as an expression of a new alternative to the housing strategy for the urban poor. In some Countries like Zambia, involvement of citizens in Site and Service Schemes is even considered as an expression of democracy and a new approach to planning i.e. planning with the people and for the people.

Phase 1 of this project was prepared in accordance with the Grade II building By-Laws while actual construction commenced in January 1977. It is argued that the design standards especially for the sewer system, water supply, roads and house ventilation did not conform to the building code or the Public Health Act. However, this was not rectified since the plan was already approved.

The project was estimated to cost KSh10.54 million through loan arrangements from the (IBRD) and International Development Agency (IDA). The National Housing Cooperation and the Nairobi City Council were given the responsibility of processing and administration of the loans.
Loan repayment period was fixed to run for a period of 30 years at 8½% interest, LAMSA (1983). This study confirms that the average repayment per month is between Kshs.88/= to 150/=.

The project coordinators had a surprise when some allottees repaid the loan over a shorter period in anticipation of receiving title deeds. Although such allottees may have been the first ones to get displaced, this new development was accepted by the National Housing Corporation whose role was to see that loans were repayed and not concerned with the success of the scheme in terms of meeting its objectives. This experience may lead to the assumption that either such allottees did not have financial problems or they appeared in the allocation lottery by mistake probably after cheating in the application forms in order to be included.

**PROJECT OBJECTIVES**

The objective of the Dandora Community Development Department was to;

(i) Prepare and service 6,000 residential plots of about 100 - 160 square metres each with individual water and sewerage connections, access to roads, security, street lighting and refuse collection services,

(ii) Construct wet cores and demonstration houses for the serviced plots,
(iii) Operate and administer a materials loan to enable allotees purchase building materials required to set up at least 2 rooms through self-help labour,

(iv) Construct community facilities including Primary Schools, 2 Health Centres and 1 Sports complex Plus 400 Market Stores and to ensure impartiality in the selection of beneficiaries.

IMPLEMENTATION

Prior to the implementation, there was the formation of a Nairobi Harambee Housing Commission (NHHC) which was to be the coordination agency of the implementation activities. This Organisation was expected to submit regular reports to the (IBRD) on behalf of the City Council and Kenya Government. This Commission comprised of the Nairobi Mayor, his deputy, Town Clerk, Chairman, Housing and Finance, Permanent Secretaries Ministry of Finance and Corporation while Dandora Project Director was the Secretary.

Three types of plots were recommended and categorised in terms of options as follows; 690 plots, comprising 65% of all the plots in Phase 1 were given to the applicants with Kshs.280/= as their total income.
These were the option A plots measuring 100,120
140 square metres and serviced with a toilet
and a shower. Option B plots of similar sizes
were to be provided with a kitchen, toilet
and shower. These were allocated to persons
with incomes between Kshs.280/= to 650/=.
For these two types of plots, the owners were
expected to construct at least one room using
the materials loan and self-help labour within
18 months from the date of allocation. Option
C plots were expected to be 54 and serviced with
a shower, toilet, store, kitchen and one room.
These were to be sold to anyone at market prices.

Construction of the scheme was to be carried
out in 5 Phases all of which when completed would
meet the initial ideas of creating a residential
community of between 30,000 - 60,000 people.
Phase 1 which is the most developed among the
others was started in January 1977. It consists
of 1,037 serviced residential plots, 21 demonstra­
tion plots, 3 community service plots and 6
commercial plots. The main access roads were
expected to be of tarmac 20 metres and 12 metres
road reserve while secondary roads were to be
12 metres murram. It was expected that individual
homes were to be connected to private water tap, and
individual sewerage facilities leading to a major
waste stabilization pond.

In spite of the fact that construction started
9 years ago, an on site inspection indicated that
some units barely went half way before construction
halted as a result of the inadequate materials loan
and other problems. Information at the project office indicated that negotiation for more loan funds to enable tenants to complete their houses are underway. Some of the facilities at the project e.g Nursery Schools, Polytechnics, Library, Social Halls, Family Life Institute and a vocational rehabilitation recreation were all proposed to be set up through community combined efforts since they were meant to meet the basic needs of the residents. To promote economic welfare of the residents, it was proposed that handicraft consumer stores and a cottage Industry be started. These proposals were made under the assumption that the project would result with the formation of an integrated urban community contrary to the theories that urban communities are usually armophous and highly distinguished from rural communities by lack of solidarity, cohesion, morale, norms, stability, group survival and group identity.

PROPOSED TENANTS

At the time of the application, would be allottees and those members of his or her family expected to live on the plot were supposed to have a total income of between Kshs.280/= to 650/= per month to qualify for the plots. They were also expected to have lived in Nairobi for at least 2 years prior to the application and not to have owned any property in Nairobi. The prospective allottees were expected to pay the City Council for sewerage and water connection and a deposit of Kshs. 400/= within 60 days from the date of allocation.
It was agreed that upon completion of the loan repayment, the allotees could be given plot title deeds or other official documents of ownership covering the remaining period of leasehold. It is the attainment of such titles and absolute rights to their plots which has partly caused the harsal of displacement whereby the very poor allotees are bought off by the well to do urbanites.

SELECTION PROCESS

Responding to a question as to how much the allotees were earning at the time of plot allocation, This study reveals that only 5% of them had above the incomes required for the successful applicants. This percentage though not identified at the lottery stage, shows that the selection was fairly done. There is possible that such allotees who falsied their incomes in order to be included amongst the beneficiaries were the ones who within a short time had completed between 3-4 rooms on their plots and have set up magnificent houses compared to the others.

Selection of plot allotees was done by an impartial Committee. Ballot system could be self defeating should the applicants fill more than one form or when there are external influences against the system. Such loopholes were identified by OLU SULE (1978) when he reviewed the housing balloting system in Nigeria.
Before the application forms were issued, the project was publicised by posters, handouts, press release and mass media. Over 25,000 applications were filled and returned. Selection of successful applicants was mainly based on individual incomes and family sizes. All applications from employed persons had first to be endorsed by the employer while those from self-employed persons were expected to have been counter signed by the applicants area Chief. The applicants were required to give extensive information pertaining to their incomes, marital status, and period of stay in Nairobi, place of work, place of residence, number of dependents and contact addresses etc.

The applications were forwarded to the National Housing Corporation where they were vetted and subsequent interviews were conducted to ensure that those plots went to the target group. The actual selections was done through the balloting systems by an impartial Committee with members drawn from amongst senior Government Officials, National Christian Council of Kenya and some members from Voluntary Organizations. This exercise was finally concluded when allotees were shown their plots. The applicants not selected and felt that their cases were unfairly handled were given a chance to appeal in writing to the Plot Allocation Committee within one month from the date of balloting.
The selected applicants were then put on a 2 month programme aimed at training them in basic construction technics through which the would be community members were to acquire some form of interaction and familiarisation for eventual working group and introduction to the regulations governing the scheme. The situation was set up to the effect that all problems affecting owners would have to be channelled through the formed Dandora Development Council in which all Wards were represented.

UNSUCCESSFUL APPLICANTS

The following criteria was used to disqualify applicants for the Scheme;

(i) All those persons earning below Kshs.280/= and above Kshs.650/= per month,

(ii) All applicants with another residential property in Nairobi,

(iii) Those who had not lived in Nairobi for at least 2 years at the time of application,

(iv) All applicants not living with their families in Nairobi and

(v) Those who did not have legal supportive documents to their application along with those who submitted more than one application forms.
It was agreed in principal that even if subletting was to be there, it should not exceed the estimated population density for the project. The field data however, show that this regulation has not been effectively enforced and as a result of excessive subletting, services at the scheme have been overstrained. 89% of the respondents indicated the shortage of water as a major problem in the Estate. The other regulation was that no allotee was expected to sell the plot before completing the loan repayment and the required units. Information from the project office indicates that the office has tried to restrain the residents from selling out the plots but in most cases, they are only informed of such plot or house sales when all the transactions have been through between the seller and the buyer.

3.4 THE IMPACTS OF THE PROJECT

It is through transition of villages into towns and town to Cities in the faces of urbanization that result in breaking up of traditional communities as migrants adjust to the urban way of life. One of the challenges that face such migrants is identification of a proper shelter within limited choices. Shelter then almost become a factor of shaping their lives and in some instances subordinating them to live in extremely low quality houses. In such circumstances those affected do not wish to be associated with the rest of the community. They hence become alienated and individualistic.
This sociological experience was also identified by DE TECQUEVILLE (1940) — where such affected urbanites form little circles of themselves and gradually drift slowly from the rest of the urban community and their immediate neighbourhood.

Houses are considered as an integral part of man's life and makes a community establish a sense of territoriality. In ordinary circumstances a person's house reflect the socio-economic position the owner holds within a given community. Types of homes could also be used as indicators of class stratification in a society as well as the stage of development. To differentiate a rural and an urban settlement, the quality, size, form and design of houses could be used. Housing could be used as a form of incentives to stimulate community participation. Most employing agencies besides other benefits are known to have used housing provision to enable them maintain a high and stable workforce in their organisations. In cases where tenants are forced to pay high rents relative to their incomes, housing could be counted as one of the factors that deplete family resources. Such overspending on housing could affect the quality of foodstuffs consumed by the family affected thus directly dictating its lifestyle.

Housing Estates zoning i.e very low quality ones adjacent to those of very high quality, may create a feeling of relative deprivation amongst those living in the very low quality types.
This is a common feeling that individuals develop when they are put in positions where they are able to negatively compare themselves or their achievements with those of their neighbours, agemates or workmates. Should such a thing happen, those affected develop weak egos and continue to live in misery, bitterness and resentment. This experience has been supported by RAFIA ZAKARIA 1970 when he studied slum life in Bombay.

Construction of houses stimulates employment as well as activating Industries that produce building materials leading to the increase in demand for local building products. A housing programme could also lead to the development of savings in releasing unproductive capital and labour into the economy. Impacts of a housing project is by no means negligible and this is why it is useful to examine the impacts of Dandora Housing Scheme on the concerned community.

Dandora Site and Service Scheme in Kenya is an example of low income housing scheme. It is in such schemes that formal credit has been extended to low income persons to enable them construct permanent houses. Inspite of the existing displacement of the original beneficiaries from such schemes, nevertheless these structures once put up will alleviate housing problems to some extent. The materials loan extended to the plot allottees in absence of any guarantee requirements contributed much towards single family development which in normal circumstances would have never owned a permanent dwelling place in an urban setting.
Other facilities besides shelter provided at the scheme site especially off-site infrastructure by no means will serve other beneficiaries now or in the future, such as Industries, Factories and other Housing Schemes in adjustment areas. The massive housing construction at the project created additional employment of skilled and unskilled labourers who were previously unemployed or underemployment. Labourers who gained skills after participating at the project had a chance of utilising such skills elsewhere and continue to earn self or family subsistence income.

As a result of subletting and letting, houses in Dandora have become a source of income to most of the allotees living there or elsewhere. Jørgensen (1975) found that subletting in site and service housing schemes earn the families affected upto 20% extra incomes. Lamba, (1983) also found that 96% of the Dandora residents are subletting thereby earning an average income of Kshs.795/= per month. This evidence from these 2 studies is supported by this study in that 85% of the resident said they were subletting and consider their Dandora house more of a source of income than a self comfortable dwelling. This is so in view of the fact that most residents are subletting more rooms than they are occupying and the fact that 21% of the residents said they had no other source of income except that from rental rooms. Besides raising the incomes of the beneficiaries, letting and subletting to some extent makes their incomes more stable and reliable.
Although those allotees who sold their plots did so against the project objectives, funds thereby earned were utilized towards raising the social and economic status of those concerned (see Section 5.3 of this study).

These observations are an indication that most of the target groups got a possible prospect of mobilising self investment and increased their level of survival in an urban setting. In yet another view, the project to some extent met some of its objectives of providing permanent homes to the target groups which opted to live on their plots. This is confirmed by the fact that 50% of the stack-on-allotees (i.e those beneficiaries who did not sell their plots and are actually occupying their houses), said they hoped to live in Dandora for the rest of their lives. The fact that not a 100% of the initial landlords expected to live in Dandora entirely is a shocking revelation that absent landlordship at the project will be higher and there is a likelihood that in the final analysis there will be purely new landlords at the Estate.

Some of the reasons why Dandora landlords are making money out of letting and subletting of rooms is that the rents are not controlled. Many tenants 70% indicated that rent is occasionally added at the rate of between Kshs.50/= to 100/= per room over a period of 2-3 years. Besides letting and subletting some form of income may have been generated by the existence of the project in that the small business which were started to serve the initial construction work force are likely to have continued to expand as a result of the increasing number of households.
Further to this, the result of the growing community and scarcity of formal jobs, have led to the mergence of numerous kiosks of all kinds, (small shops) along the wide access roads. A number of rooms have been converted into business premises by the plot owners or are being let out. Considering that a business enterprise has tangible financial returns those allotees subletting or letting such premises might be earning substantive income out of them.

The project participants also indicated having faced a number of problems besides shortage of finance and costs of building materials. The residents feels insecure due to the adjacent sprawling Korogocho Slum Settlement currently gradually encroaching Phase 1 and 2. Such a slum is considered as the breeding ground of all social evils. However, most of the allotees are appreciative about the project assistance at the initial stages especially with the formation of working groups and simple seminars on the construction process. To the financially weak allotees, the requirements of the project proved burdensome for they had to continue paying rents for their previous accommodation while still financing construction at their plots. This explains why some of them i.e 7% gave up construction and sold their plots along with the materials hardly a year after allocation.

The project regulation that the City Council should hold the plot titles till the owners complete the loan repayment, though a form of security no doubt restricts the plot owners from ever using their plots as security for raising additional finance or access to other funding sources to
facilitate the construction process once the materials loan is exhausted. This disadvantage somehow explains why even after 10 years some units are still incomplete.

Although subletting and letting has been a source of income to most of the residents and absent landlords of the project, it should not be over-looked that it has made the Estate overcrowded and hence scarcity of the basic services offered at residential quarter e.g 89% of the respondents said that there is normally acute water shortage. This overcrowding though, could be better explained by a comparative analysis of the number of persons living on the plot now, with the official number expected to live in a plot. The problem could also be theoretically perceived by the physical view of how the streets are overcrowded and the overbuilding of rooms in a plot which have led to cramped units with no design at all. It is surprising that the overcrowding problem was only pinpointed by only 2% of the respondents. May be this is the proportion of residents who had lived in better estates before moving into Dandora.

Information from the Project Office indicated that there was an attempt to restrict the number of persons living on a plot to 10 but it failed for it would have meant employment of more Officers at the project office to act as patrol officers. The situation is now beyond control to the extent that upto 3 families may be found living on one plot.
The field survey illustrates the situation in that 56% of those subletting indicated that an average of 3 - 4 families including theirs are living in one plot. In some cases the owners only occupied one room.

Much as the current overcrowding over and construction of rooms could be related to financial commitments and lack of other sources of incomes, for some of the allotees, it could also be related to the existing demand of rental rooms at the Estate. Overcrowding, a typical feature of a slum settlement, result to all kinds of anti-social activities like petty theft, prostitution, drunkenness etc. 60% of the respondents indicated theft as one of the problems in the Estate. Large numbers of people in a limited space affect the aesthetic nature of the surrounding and this explains why dust and rubbish were listed as problems by a number of residents.

Inspite of the substantive incomes, accrued from subletting and letting, it appears that little of the money is returned into improving the site particularly the housing conditions. This situation may have resulted to the indicated dislikes of the estate by some of the tenants who expects comfortable houses no matter how little they may happen to be paying as rent. 62% of such tenants were dissatisfied with the housing conditions especially with regard to printing, leaking roofs, drainage and the sewerage system.
The allotees 97% who participated in the construction indicated having experienced financial problems. This is the major problem which made most of the very financially weak allotees sell their plots hardly a year after the allocation. If the site and service plots will continue being allocated to persons who cannot develop them, such projects are likely to develop into a kind of a money gamble through which the target group will gradually be replaced by urbanites with higher incomes and plots will be sold at exorbitant prices.

Those who sold their plots said they used the money amongst others things, for expanding or keeping businesses, paying School or College fees, buying matatus (i.e. public transport mini buses) etc. No respondent seem to have used the money accrued from plot sales for buying another residential plot or a house. This observation could be used as an indication that the very basic needs of an urban poor family is beyond ownership of a residential dwelling. If an urban poor family can part with a residential plot even when assured of a materials loan of low interest repayment rate, and opt to sell it for a business enterprise, while continuing to live in lower quality accommodation than offered at a site and service residential estate, then the basic needs of the urban poor families need be approached through different programmes. The experience in this regard show that shelter alone cannot be taken as the sole solution of the root causes of urban poverty and that without first ensuring sources of incomes
for the target group for a site and service scheme, or establishing of operational ordinance on the conditions of site and service plot sales, displacement in such schemes is bound to continue.

Although the project office complained about poor loans repayments by the allotees, the Dandora case, clearly show that, if well organised and instructed, the urban poor have the capacity and will, to repay the loans extended to them. The poor repayment reported could be associated with other factors e.g the machinery to enforce repayment. Another project hardcap is its locality. Some of the respondents said that the Estate is poorly located in terms of employment opportunities at the neighbourhood. This could be so in that 87% of the residents make about 18 kilometres (return journey) to their places of work. The Dandora Industrial Area is not well developed to absorb the majority of the unskilled and semi-skilled residents. Most of those conducting business within the Estate (94%) indicated having experienced high transportation costs leading to low net income margins. These low profits could also be accounted by the fact that there are too many small businesses at the Estate competing for customers.
ECONOMIC ACTIVITIES

PLATE NO. 8 Off loading of logs for saw mills

9. Dandora workshop cluster with Korogocho slum in the background.

10. Trinity Crafts.

11. Gas welding

12. One of the numerous kiosks at the estate.

13. Dandora Corner Bar. Many plot owners have converted some of the rooms into business premises.

14. The project office.

PLATE NO. 8
SOCIAL AMENITIES

PLATE NO. 15

15. School
16. Kenya Society for the deaf children
17. Church of God - (mud wall)
18. Catholic Church
4.1 HOUSING DEVELOPMENT

Housing development in Kenya have been adversely affected by various factors some of which include:

(i) Lack of appropriate housing policy

(ii) Disparity between planning and implementation.

There has been a significant disparity between the actual housing output in relation to the housing need. MALOMBE (1981) noted that by 1970 there was a housing short fall of 7,500 units, and that between 1970-1974 out of the 50,000 planned units, only 25,000 units were constructed and as the annual balance continued being carried forward, the situation became more acute to an extent that by 1983 about 430,000 housing units were required. Her projections are very close to those of ONDIEGE (1986) who notes that Kenya's urban housing needs will be 380,000 units between 1984-1988 out of which Nairobi requirement will be 41%. To satisfy this need about 58,000 - 76,000 housing units will need to be annually constructed.
(iii) Unrealistic housing standards - these high building standards end up raising the total cost of a house together with the rent to be charged for the same. This means that the very low income earners cannot afford to live in a standard shelter.

(iv) Lack of finance - especially to low income earners who due to lack of loan guarantees and meagre incomes cannot benefit from the mortgage and tenant purchase housing delivery systems.

Housing problems in Kenyan urban areas is closely tied with the population growth both naturally and by immigrations. Urban population growth rate is now at 6% per annum is a threat to all positive attempts to alleviate housing shortage. The projected population in Kenya if nothing changes will be 25 million by 1990 and 37 million by the year 2000. As the urban population continue to grow with almost a standstill employment opportunities which is currently growing at the rate of 2% per annum most of the urban migrants who are unskilled or semi-skilled and cannot afford rents in conventional houses will continue living in slums and squatter settlement in deplorable housing conditions.
Various forms of housing delivery systems include: rentals, tenant purchase, mortgage, Government pool housing and institutional housing. Most of these favour the middle and high income earners. The site and service schemes are the only programmes meant for the very low income earners. As a result of displacement of the very poor allottees by persons with high incomes, these programmes have almost failed to serve their purpose. This situation have been noted in other Countries like Tanzania, where the very poor who cannot afford loan repayment are forced to sell their plots. As the demand for houses by these low income urbanites continues, there is need to develop practical housing policy or strategy since the site and service approach cannot be relied on. In this regard, policy makers should not be mislead by REV. ALTHUS (1798) theory that 'it is the law of nature that all populations, at all times and places (unless deliberately checked) tend to go on expanding until they reach the units of subsistence, after which, they are checked by vice and misery.'

Kenya Government as explained in Section 4.2 of this study place strong emphasis on the need for standard quality shelter of all citizens. Strategies towards achieving this goal is given priority in all the National Development Plans. Further to this, workshops, seminars and conferences held annually in different parts of the Country in relation to housing is a clear indication that housing problem has not been taken lightly. Recent activities towards resolving housing problems
have been centred around the provision of low cost housing. Inspite of this attempt, the problem will still persist as a result of displacement of the target groups from units planned for them. The result being the proliferation of unplanned urban settlements which are a public health threat due to lack of essential services like water and sanitation, proper drainage and garbage disposal.

The Government has also encouraged formation of cooperative housing movement as a central means of mobilising domestic resources and is continually increasing the vote for Civil Servants pool housing mortgage as well as extending loans and grants to various institutions for their housing programmes. According to the 1984/88 Development Plan, it has been envisaged that the public sector will spend K£ 90.6 million and the Private Sector K£ 73.8 million on housing programmes. Implementation of these programmes will be effective by the following institutions.

(i) Housing department - will be responsible for formulating, reviewing, modifying and programming implementation guidelines for shelter and urban development projects. It has also been charged with the responsibility of preparing the national housing programmes, designing guidelines for their implementation and coordinating the activities of all implementation agencies. The department will also handle the financial and physical programming of housing and urban development investment.
(ii) National Housing Corporation - This is a statutory body which operates under the Ministry concerned with housing as the main Government housing agency charged with the responsibility of ensuring effective implementation of the Government housing policies and programmes. Since its inception in 1953, the NHC has constructed a large number of housing units both for rental and for sale at lower prices relative to what the private market would charge for similar structures. Its role during this planning period will be mainly concerned with the lending development funds to the local authorities, cooperatives etc. It is also charged with the execution of projects in those local authorities that lack project implementation capacities as well as provide technical assistance to local authorities.

(iii) Housing Research and Development Unit - this unit will be responsible for initiating and undertaking research projects on low cost housing, urban improvement programmes, building materials, house plan designs, training and community development aspects of housing and urban development programmes.

(iv) Local Authorities - are expected to deal with the identification of urban investment needs, project planning, preparation and enforcement of implementation at the grassroot levels.
(v) Housing Finance Institutions - to deal with mobilising financial, technical and management of resources for low and medium cost housing. They will also assist the local authorities in identifying suitable housing projects and

(vi) The National Cooperative Housing Union - to be involved in the shelter delivery process as well as promoting housing construction by the Cooperative Societies.

The Nairobi City Council which falls under (iv) above is a major contributor to Nairobi Urban Housing Development. As of 1985, the Council had a total of 38 Housing Estates with over 34,000 Housing units with rents ranging from Kshs.60 - Kshs.1,500/= per month. Amongst these Estates are 5 Site and Service Schemes each of which the Council provides a plot, infrastructural services and the housing design. Plot owners are left to construct own homes through own resources. In the absence of provision for materials loans, most of the Council Site and Service Plot owners have found it difficult to construct permanent structures. In Kariobangi for example, there are still mud houses. Makadara Site and Service Scheme is however better than Kariobangi may be due to its proximity to the Nairobi Industrial Area which has created more demand for rental rooms and steady tenants.
With this advantage, plot owners here have found it possible to consolidate resources and have consequently increased the number of permanent houses. The Council's charges for their Site and Service Scheme merely covers plot fee only which is at the rate of Kshs.141/= per year or Kshs.11.75/= per month. Just as observed in other Site and Service Housing Development, the Council authorities have been unable to control plot or house sales and consequently the displacement of their site and service schemes target groups. This being so, the Councils efforts in helping the urban poor out of their shelter problems have become self-defeating.

Inspite of this negative experience, the Council housing charges are quite low and have helped very many low income earners afford standard dwellings they would otherwise have not afforded. Such very low income earners comprise of the Councils own employees and others employed by various institutions. The effective role it has played in this regard affirms its ability to supply multiple low cost rental units should the Government commit itself in subsidising such units through long term loans to the Council.
Table 1 below shows the proposed housing output for the 1984/88 plan period.

# TABLE 1

PLANNED PHYSICAL HOUSING OUTPUT (1983/84 - 1987/88)

<table>
<thead>
<tr>
<th>AGENCY</th>
<th>SERVICED PLOTS</th>
<th>RENTAL UNITS</th>
<th>UPGRADING</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nairobi City Council</td>
<td>7,000</td>
<td>400</td>
<td></td>
</tr>
<tr>
<td>Mombasa Muni. Council</td>
<td>2,300</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>Kisumu Muni. Council</td>
<td>1,500</td>
<td>100</td>
<td></td>
</tr>
<tr>
<td>Other Municipalities</td>
<td>1,300</td>
<td>200</td>
<td></td>
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<td>Other Towns</td>
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<td>210</td>
<td></td>
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<tr>
<td>Rural Housing</td>
<td>-</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>Third Urban Areas</td>
<td>3,700</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>USAID PROJECTS</td>
<td>1,500</td>
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<tr>
<td>Mortgage Housing</td>
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<td>-</td>
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<tr>
<td>Gov. Staff Mortgage</td>
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<td>-</td>
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</tr>
<tr>
<td>Urban Pool Housing</td>
<td>-</td>
<td>500</td>
<td></td>
</tr>
<tr>
<td>Institutional Housing</td>
<td>-</td>
<td>4000</td>
<td></td>
</tr>
<tr>
<td>Local Authority Housing</td>
<td>-</td>
<td>4000</td>
<td></td>
</tr>
<tr>
<td>Private Sector Housing Devt.</td>
<td>-</td>
<td>4,300</td>
<td></td>
</tr>
<tr>
<td>NATIONAL HOUSING CORP. PROJECTS</td>
<td>-</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>18,044</strong></td>
<td><strong>14,110</strong></td>
<td></td>
</tr>
</tbody>
</table>

Figures in Table 1 above shows that the Private Sector housing production will lead at the rate of 19% in the plan period followed by the designated urban areas. Though in normal circumstances the Private Sector only caters for the high and middle income groups, through mortgage and tenant purchase delivery systems, its continuous and prominent role into the housing stock implies that if the mortgage regulations are revised as a kind of incentive to the mortgages, most of the middle income earners would thereby be oversupplied with affordable dwellings through this scheme and this would in a way stop them from pursuing site and service plots meant for the very low income earners.

Institutional housing is yet another indirect way of controlling the displacement of the urban poor from the schemes planned and designed for them. However, its current share of 6.7% is quite discouraging. If the Government could give incentives to institutions to enable them set up houses for their workers, this could in a way discourage the common system of rental housing allowances given by most Organizations. Slum upgrading though in some instances have negative implications of increasing rents for the upgraded units is important in alleviating housing shortage for the low income earners.
Besides the existing attempts to create affordable homes for the majority of urban citizens, the following could also be assessed as supplementive measures to this problem:
Control the rate of rural urban migration and natural population growth, overcome the existing housing deficit in relation to demand and formulation of relevant and applicable housing policy and building by-laws.

4.2 HOUSING POLICY IN KENYA

Different Countries have adopted diverse approaches as to housing problems. After the second World War as a result of housing shortage in Netherlands, the Government decided to create priorities particularly for special categories of citizens e.g. the very poor, handicapped, the aged, for singles and institutional housing. The Netherlands Government introduced personal house rent relief to low income earners. Though Kenya Government has other urgent priorities besides housing, this is one way of subsidising housing expenses just as heads of households are normally given income tax relief. A similar experience took place in Britain about the same time as a result of housing shortage and displacement of many families after the Second World War. In this case private housing developers were given enormous subsidized loans to set up mortgage homes while the Government concentrated on public rental housing schemes for the lowest income earners and for the foreigners.
Housing problem could be related to the housing policy of the Country concerned. Kenya housing development by providing housing development framework which were unknown or ignored before Independence currently, site and service projects are a part of the national policy towards alleviation of housing problem for low income earners. Although housing objectives and approaches in developing countries varies with practical, social and economic pressures, ABRAHAMS (1969) indicates the following objectives towards an effective national policy;

(i) Priority in housing production for low income families which comprise the majority of an urban population.

(ii) Creation for opportunity of homeownership by the low income families at suitable costs.

(iii) Establishment of housing programmes at minimum costs and acceptable environmental conditions.

(iv) An applicable house financing policy to cover even those with minimum wages.

(v) Establish ways and means of creating housing subsidies for the low income families from whatever sources.
(vi) Encouragement of Savings through Cooperatives.

(vii) Launching of a more effective building Industry.

(viii) Adoption of appropriate technology in order to reduce home construction costs.

(ix) Proposition of a workable programme for rehousing squatter and slum residents.

(x) Enforcement of effective rent controls or their repeals.

Kenya's housing development and policy seem merely to have addressed itself with regard to (i) (vi) and (viii) of the above proposed objectives so far.

According to the UN 1970 publication on slum improvement and control, it was expressed that the objective of a housing policy as a component of urban development policy, is to improve housing services and to facilitate the ideas of incorporation the urban marginal income earners into the urbanization process. This process takes into account the housing issue which is one of the basic facilities in an urban setting. With a strong and articulated housing policy, it is possible for most City authorities to positively face the existing housing shortage and high rent rates.
The objective of the Kenya Government housing policy is to tackle shelter problems both in urban and rural areas in order to arrive at a situation in which every family in Kenya would live in decent homes with basic living standards of health, privacy and security. This objective is likely to be condemned by critics as utopian but it still standards as a working policy.

A housing policy just like other development policies in many Countries take a process of evolution with incremental improvements here and there. Similarly, housing policy in Kenya formulated in 1966/67 has gradually evolved in response to 2 factors right from the Colonial period. At first, there were the changing economic and social conditions of urban African workers in Kenyan towns like Nairobi, Mombasa and Kisumu which implied changes in ideas preferences and evaluation of the housing conditions. It was mainly in such towns that strikes in connection with housing conditions amongst other grievances took place as early as the 1930s. It was as a result of such uprisings that Colonial Administrators started to evaluate the housing situation. The other factor was related to the awareness of Colonial administrators of the implications of poor housing conditions for African urban workers and migrants.
However, during the interwar period the main issue was not to improve housing for individual native groups but to maintain law and order in their living quarters, as well as controlling rural urban migrations by issuing effective repatriation orders. Inter-estate movements were also restricted as different ethnic groups were expected to stick to their residential zones. This means that housing displacement process never affected housing proposals or management at this early urbanization stage.

Urban population control which indirectly affected housing situation, was done by an Order from the Native Commissioner (1927) which specified that 'only those Africans who went to the town/city for legitimate purposes could be allowed to live within the town or city designated areas. Inspite of such orders the natural urban population growth plus the persistence rural urban migrations resulted in acute housing problems. Consequently, the post-wars period led to the recommendations on improvements of rental houses while repatriation orders continued to be detested by Africans. It is at this stage that the colonial administrators perceived the need for an alternative housing policy guideliness and started adopting positive measures on realization that they could not withhold urbanization through restrictive measures.
By 1939, the Native Affairs Officer had this to say, 'a native worker needs a comfortable accommodation and a permanent home which would go a long way towards the creation of stable urban communities.' He also pointed the negative effects of a sub-standard dwelling places. It is after such views that employers were given legal obligations to house their workers. There was also the establishment of a Central Housing Board in 1942. A special housing fund was also extended to the local authorities to enable them deal with housing problems.

Priority was given to the African urban housing conditions when the New Housing Ordinance became law in 1948. It is also after this event that housing zoning started being related to the places of work, access to basic facilities and future urban development though racial and ethnic boundaries were still strictly, being observed. New views on housing issues continued being adopted gradually till the time the Africans were allowed to own homes in urban areas. This is considered to be a historical stage and shift from 'a bed space' for the natives to homeownership. It is through the similar approach that the Kenya Government is trying to make it easier for the low income groups to own homes through site and service schemes.
This change brought about rental houses and in order to control rents, Rent Tribunals were set up within the main towns. Along with this was the formation of the National Housing Corporation with powers to monitor housing projects throughout the Country. As seen in Section 4.1 of this study, the Kenya Government has continued to show priority in having standard shelter for all citizens. Table 2 below shows the Government pool housing budget between 1962 and 1969.

**TABLE 2**

KENYA GOVERNMENT BUDGETARY ALLOCATION TO STAFF POOL HOUSING AND LOANS TO NHC 1962 - 1969

<table>
<thead>
<tr>
<th>FISCAL YEAR</th>
<th>ALLOCATION (K£.)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1962/63</td>
<td>172,000</td>
</tr>
<tr>
<td>1963/64</td>
<td>206,500</td>
</tr>
<tr>
<td>1964/65</td>
<td>280,000</td>
</tr>
<tr>
<td>1965/66</td>
<td>400,000</td>
</tr>
<tr>
<td>1966/67</td>
<td>1,282,500</td>
</tr>
<tr>
<td>1967/68</td>
<td>1,678,600</td>
</tr>
<tr>
<td>1968/69</td>
<td>2,000,390</td>
</tr>
</tbody>
</table>

The Government is also trying to sponsor research projects being done on the possible use of local construction materials in an attempt to reduce the total cost of housing units for the low income earners. The Governments objective to provide shelter for all citizens is however, literally said than done in view of the rapid urban population growth. As well as emphasising on low cost houses the Government has encouraged the Cooperative housing movement as an important means of mobilising domestic resources towards alleviation of housing problems (1984/88) Development Plan.

Specific roles have been given to various institutions related to the housing issues as outlined in Section 4.1. The City Council as a local authority has also been strengthened in order to assist the Government in solving the housing problem. The Department of Housing Development is now a special unit within the City Council dealing with low income housing projects with regard to management for the same and identification of such future projects. It is hoped that as more and more projects for the low income earners are being launched, subletting rents will keep low as the units floods the market so that those who earlier got displaced from site and service schemes will afford rents in such units for they are far safer than slum settlements.
Though housing Development and Policy in Kenya seem to have strongly focused on alleviating housing problems for the very low income earners especially through the site and services approach, the effort has not been effective especially with regard to the displacement of the target groups from the projects planned for them. This realization then calls for an alternative approach and policy for future housing programmes for this category of urbanites. In this section, tentative approaches have been suggested.

From the earliest days of civilization, man had been able to create a home through his own means. Now, this is no longer within his competence for there are multiple external forces which predetermines his destiny including shelter. In the urbanizing world, hovels in slum and squatter settlements where the urban poor man resides are even worse than those the cave man set up when he emerged. As the surge to the Cities goes on, the competition for space will become stiffer, rents are bound to rise and slum squatter settlements will increase.

Consequences of slum life some of them summarised in Section 3.4 of this study include high juvenile delinquency, illiteracy, unemployment, divorce, immoralities, alcoholism and minimal degree of shelter privacy.
This means upgrading this Phase at a cost of Kshs. 26 million. Although this will make that Phase nicer, the negative implication is that it will be more expensive, a problem already experienced by the majority of the allottees in Phase 1 and one of the major factors causing displacement. By making Phase 2 better than Phase 1 the project managers are providing for a wrong group since the very poor allottees who failed to make it at Phase 1 which was cheaper are unlikely to afford the Phase 2 financial demands.

Adoption of lower standards especially for low cost houses means revision of the building by-laws. Past Colonial African Countries have been faced with a dilemma as a result of the housing by-laws which were inherited from different environments and hence not applicable in many such Countries. These Countries have to come to terms with the reality and discard the dream of a dazzling age of illumination architectural housing designs and modern equipments and imported construction materials if the problem of providing shelter to the very poor citizens is properly addressed to.

To reduce construction materials and technology are the very basic steps. Studies in this area show that locally available materials with effective improvements could be used to construct houses which can last for generations. There is a type of clay in Kenya for example which is almost closer to natural stone.
The (IYSH) action areas are:

(i) To provide and improve shelter, community facilities and services e.g. drinking water sanitation, waste disposal, transport and health; extend the use of local methods and skills in housing construction methods and skills as well as generate jobs in the formal and informal construction sectors.

(ii) Extension of institutional and financial arrangements to help the poor and the disadvantaged to improve their housing situation.

(iii) Strengthening of local housing mortgage as well as establish a secondary mortgage market and the formation of private sector low costs housing programmes.

A research programme on local building materials and construction being undertaken while a number of low cost shelter projects are in the planning stage to test and access the use of indigenous building materials at on site production.

The need for alternative shelter for the urban poor has been supported by REEB (1973) who has supported the importance of a study of the socio-economic characteristics of the urban poor before planning housing programmes for them. He further recommends temporary pre-fabricated mobile houses for this category of urbanites constructed on a relatively small capital investment per unit with option to replace, remodel, re-extend and if need be to move them elsewhere. To REEB,
such structures could be adjusted according to family sizes, and individual level of incomes at one stage in time. Such housing units' location could be changed according to employment opportunities for the residents. If REEB's views could be implemented, they would certainly save many poor families from consequences of displacement.

Suggestion for such mobile homes for the very low income earners has also been expressed by RICKS (1973) who noted that if it was not through adoption of a mobile homes strategy, housing shortage after the 2nd World War in the US would not have been alleviated. He indicates how the sale of these homes increased steadily upto the 1960's. With the increasing cost of urban land and cost of construction materials for permanent houses, mobile homes seem to be one of the many solutions towards alleviating shelter problems affecting the financially urban disadvantaged groups. Policy makers need to access the applicability of such suggestions as substantial components of likely alternative shelter for the urban poor since timber structures do not require special construction expertise and imported construction materials, which increases the total cost of a house. If such units could be developed they would save poor families the financial burdens of conventional houses.
Adoption of such schemes might not however be feasible in Kenya due to the urban land cost increases which is unlikely to stop at any point in time unless the Government radically changes its policy on land ownership with implications that urban land loses its value, something that is pretty difficult and unreasonable in Kenya. In the current situation the idea of mobile houses would be unpractical. Price of timber in Kenya is also not significantly different from that of natural stones or bricks and therefore in Kenyan contexts, use of timber may not radically reduce construction costs.
FIG. 4: SITE PLAN, SHOWING THE STUDY AREA
CHAPTER FIVE

5.1 DISPLACEMENT PATTERNS

THE DISPLACEMENT MATRIX

Displacement in this analysis will be taken to mean the process through which families or individuals are displaced from site and service plots. Various factors, as will be seen later cause the displacement especially where the poor allotees are affected. In simpler terms, the trend of house change over is determined by the ability and desire of individuals or households to shift from their current residence and existence of alternative accommodation at their next choice of residence. As will be explained in Section 5.2 later, shifting from one house to another is determined by the level of incomes, family sizes, savings, house owner occupancy, rent charges and current housing conditions. House ownership change at Dandora though has not been fast. Majority of the houses sold seem to have gone upto the second owner only.

This section will merely be concerned with the analysis of factors related to displacement. The process form a kind of embeded mesh which can explain the displacement at Dandora Phase 1. The data analysed are as a result of responses from those interviewed who comprised of the displaced allotees, the stack-on-allotees and the new landlords and tenants in Dandora Phase 1.
In order to get an overview of the respondents' previous residential background from all those allocated Dandora plots, a question was put to the respondents in this regard and the results is as shown in Table 3 below.

TABLE 3

PREVIOUS RESIDENCE OF RESPONDENTS (ESTATES)

<table>
<thead>
<tr>
<th>ESTATE</th>
<th>NO</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mathare</td>
<td>44</td>
<td>33.8</td>
</tr>
<tr>
<td>Kangemi</td>
<td>26</td>
<td>20.0</td>
</tr>
<tr>
<td>Kawangware</td>
<td>14</td>
<td>10.7</td>
</tr>
<tr>
<td>Kibera</td>
<td>13</td>
<td>10.0</td>
</tr>
<tr>
<td>Easleigh</td>
<td>11</td>
<td>8.0</td>
</tr>
<tr>
<td>Pangani</td>
<td>7</td>
<td>5.9</td>
</tr>
<tr>
<td>Bahati</td>
<td>6</td>
<td>4.6</td>
</tr>
<tr>
<td>Kaloleni</td>
<td>5</td>
<td>3.8</td>
</tr>
<tr>
<td>Ziwani</td>
<td>1</td>
<td>0.8</td>
</tr>
<tr>
<td>Parklands</td>
<td>1</td>
<td>0.8</td>
</tr>
<tr>
<td>Uthiru</td>
<td>1</td>
<td>0.8</td>
</tr>
<tr>
<td>Pumwani</td>
<td>1</td>
<td>0.8</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td>130</td>
<td>100%</td>
</tr>
</tbody>
</table>
Contrary to the assumptions held prior to the interviews that only those with higher incomes move to Dandora to pay less rents, this study confirms a two way flow i.e there are low income earners who as a result of eviction or insecurity elsewhere move to Dandora to pay more rents while the majority of the new landlords and tenants from Mathare Estate are paying more per space occupied than they were paying before. Those who were previously living in Easleigh and Parklands Estates appear to be paying more for their Dandora room/s. Asked what they would expect to pay as rent should they move out of Dandora 79% of the tenants and new landlords in Dandora expressed a likelihood of being charged more, yet most of them did not expect to live in this Estate for the entire period they might live in the City. Such a realization is a clear indication that Nairobi residents are already aware of the scarcity of cheap rental homes.

Some of the reasons given as to why some residents moved into the Dandora Estate were recounted as: job acquisition and transfer rejoining relatives and friends, economic mobility, convenience to places of work, eviction, security family size and the services and public utilities offered at the scheme. Reasons for the projected moving out were given as; high rents, retirements, job transfers and ownership of a residential property elsewhere.
However, most of those landlords living in their houses as from the time of allocation (referred to in this analysis as the stack-on-allotees) had negative indication of moving out except on retirement. In this case most of them said they would go back to their original homes while continuing to let out their houses.

Though Dandora seems a place of diverse characteristics of residents, there is clear evidence of a high influx of persons earning between Ksh.1400-2400/= per month. These comprises of tenants and new landlords in the Estate engaged in business or in formal employment. Since almost all the stack-on-allotees (85%) said they were getting some form of income through subletting, it appears this is why they have no desire to move out. This experience implies that creation of sources of incomes along with appropriate shelter for the urban poor would not only check their displacement from shelter projects planned for them, but also contribute to the establishment of stable urban communities from which self-help activities could be organised to improve the residential site conditions.

The fact that those who had the lowest incomes happened to sell their plots to embark on different investments other than housing is the hidden truth that shelter alone cannot act as the sole solution to the problems affecting the urban poor. Available data shows that amongst the sold houses 79% of them were sold before being completed.
Although some of the displaced respondents were unwilling to indicate how they used the money they obtained from plot sales, those who responded positively said that they used the money to start or expand businesses, buying matatus, i.e. (public transport mini buses), paying School or College fees, while others said that they used the money to solve domestic problems.

However, responding to the question as to what they would do with another site and service plot if given a second chance, 80% of the displaced persons said they would complete the house against all odds and then let it out, while 17% indicated that they would complete the house then live in it while subletting, and 3% did not respond.

These are really surprising revelation. It shows how difficult it will be to recapture the interests of the displaced or to make them stay in a site and service project as 17% positive chance is far too small. The fact that 80% would opt to get incomes from the housing unit than living in it, indicates that a residential units is a prominent source of income and most citizens are aware of this. These responses also reflects the changed attitudes of most of the project's displaced persons possibly after having seen the benefits the houses have provided to those who retained their plots.
The house and plot turnover rate at Dandora Phase 1 is quite high. This was also confirmed by the project officers. However most of the houses sold, seem to have passed from the original owner to a second owner only. About 58% of the original allotees are absent. This proportion is closer to LAMBA'S (1983) report, where it was found that 50% of the original allotees were not living in Dandora. The increase in absenteeism by 8% in 3 years is very high. Some of the new landlords indicated having bought their plots at Kshs.30,000/= in 1979 and Kshs.45,000/= 1985. The project officers do not seem to have any control over rent charges or plot sales. In most cases they come to know of such sales after all the transactions are complete otherwise there was an indication that should they happen to know of the intended sale, they would try to repossess the plot and offer it to other deserving families.

It appears that problems at the construction stage besides being lured into selling contributes a lot in the sale racket. Most of the allotees (79%) though, had no prior intentions of parting with their plots since they embarked on construction immediately the materials loans were released. In terms of magnitude, the following were indicated as the problems experienced at the construction stage: finance, expensive materials, materials theft, unskilled and unreliable constructors, uncooperative building groups and the project officers delay in approving construction by stages as per project plan agreement.
Just as in ordinary circumstances, whenever there are problems that slow down construction of a project, the expected benefits from a project are delayed and this might have partly contribute to the early plot sales. It is also possible that when such a delay occurs some of the beneficiaries would be quick to identify alternative ways of getting financial gains by selling their plots. In order to recapture the project participants interests, project implementation ought to be done steadily and timely while the evaluation of possible shortcoming should be done progressively. This is crucial especially with regard to credit mechanism.

As shown earlier absent landlordship at the Dandora project has been rising at the rate of 8% per every 3 years and this means that soon there will be purely new landlords at the estate. While most of the houseowners might vacate for better financial prospects the poor tenants may be displaced as a result of their inability to pay house rents which are uncontrolled.

An attempt was made through interviews to measure the respondents level of satisfaction in the respondents current place of residence and housing conditions. Responses received could be taken to account for the dislikes of the Dandora estate by both the new landlords, tenants and to some extent the stack-on-allotees.
The answers recorded are empirically presented in Table 4 below. If these responses are cross-examined with the respondents' intentions to move to another residential area, these responses could give a graphic view of the future projected moves and base for predicting future displacement trends at the Dandora Scheme.

**TABLE 4**

**FEELINGS ABOUT HOUSING CONDITIONS**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>SATISFACTORY</td>
</tr>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>33%</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>26%</td>
</tr>
<tr>
<td>STACK-ON- ALLOTEES</td>
<td>70%</td>
</tr>
</tbody>
</table>

The degree of satisfaction was in most cases found to be proportional with the levels of owner occupancy. The level of satisfaction to some extent may determine the expected time of stay at the current residence. This implies that the tenants and the new landlords are likely to leave their current residents sooner than the other 2 groups of respondents.
Those who held on to their plots i.e the stack-on-allotees takes the lead as far as satisfaction with the housing condition is concerned. May be since they also live in the estate while subletting, they have taken the bother to improve their houses.

Poor houses and poor site environmental conditions was related to the absent landlordship at the Nakuru Site and Service Project by Jørgensen in 1971. Future displacement patterns was also measured through another question put to the respondents as to how long they expected to stay at their current residence and the answers given have been tabulated below.

### TABLE 5

**EXPECTED PERIOD OF STAY AT CURRENT RESIDENCE**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>NOT SURE</td>
</tr>
<tr>
<td><strong>DISPLACED ALLOTEES</strong></td>
<td>23%</td>
</tr>
<tr>
<td><strong>TENANTS &amp; NEW LANDLORDS</strong></td>
<td>24%</td>
</tr>
<tr>
<td><strong>STACK-ON-ALLOTEES</strong></td>
<td>-</td>
</tr>
</tbody>
</table>
The responses received here not only show urban family movements in search of appropriate accommodation but also a general house turnover rate in Nairobi. Compared to the displaced allottees i.e those who sold their plots, the stack-on-allottees seem to have special benefits out of the project in that 60% of them expect to live at the estate throughout their lifetime while the displaced allottees probably renting lower quality houses elsewhere have a comparable score of 10%. The results above also show that Dandora house ownership will soon pass on to third hands since none of the new landlords expect to live there for their entire life. Alternatively the new landlords may move elsewhere and retain their Dandora property as they continue to let rooms there. Intentions to move out was recorded as follows: 50% stack-on-allottees, 80% tenants and new landlords, and 83% of the displaced. This indicates that most of the displaced allottees have not identified permanent or suitable residence. Complaints about housing conditions ranged from dust and rubbish within the site, shortage of water, sewerage system, painting, leaking roofs, poor internal wall finishing, petty theft and lack of street lighting.

Facilities at the 100 houses visited were observed in order to establish if too high standards were adopted for the scheme and also to see if the residents dislike of the estate is in any way related to lack of essential provision.
These are as shown in Table 6.

**TABLE 6**

SITE FACILITIES

<table>
<thead>
<tr>
<th>FACILITIES</th>
<th>HOMES HAVE</th>
<th>HOMES HAVE NOT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electricity</td>
<td>44</td>
<td>36</td>
</tr>
<tr>
<td>Telephone</td>
<td>2</td>
<td>88</td>
</tr>
<tr>
<td>Hot water System</td>
<td>-</td>
<td>100</td>
</tr>
<tr>
<td>Car Park</td>
<td>4</td>
<td>96</td>
</tr>
<tr>
<td>Fence</td>
<td>52</td>
<td>48</td>
</tr>
<tr>
<td>Gates</td>
<td>42</td>
<td>38</td>
</tr>
<tr>
<td>Ceiling</td>
<td>48</td>
<td>32</td>
</tr>
</tbody>
</table>

Without undermining the need for a comfortable dwelling for a poor family, the fact that most of the allotees and tenants had previously lived in temporary housing structures, ideas of providing electricity and house ceilings was not necessary as these increases the total cost of a house. Provision of such services would have been left out for the owners to instal according to their ability. Also observed were the types of access roads or paths passing through various houses plus the type of waterpipe connection.
It was found that majority of homes have had access by tarmaced rods it is only the foot-paths separating houses that are of murrum. Most of the homes visited have private water connections. These provisions are on the higher standard and therefore not ideal for low cost houses. Observation of the access roads design showed them to be very wide and few vehicles seem to be passing through them since they are cramped by kiosks and construction materials. Along these access roads are surface drainage channels which look too wide and the fact that they are exposed makes them look awful.

These observations supports the common assumptions held that developers of site and service schemes aspire for too high standards and consequently attracts the wrong group. Provision of the very basic essential facilities is the only way to ensure affordable houses for the urban poor through the site and service scheme.

Having seen that the lowest loan repayment per month is Kshs.88/= and that the lowest income considered at the allocation time was Kshs.280/=, this meant that if a person or family in this region of income moved to live in the first completed room, he was expected to have started paying back the loan at this rate which would have left the family concerned with a balance of Kshs.192=/. This balance, meagre as it seems, was expected to cover all other living expenses as well as contributions to the self-help groups so as to set up other required rooms.
The family earning this much as of 1977 was then forced to spend about 31% of their income on housing alone. This is why most of the affected families found no option but to surrender the plot and embark on other investments. For such a family to move and live in their house they needed more space to sublet immediately in order to supplement their incomes. This revelation is a clear indication that the Kshs.280/= income group was far too low for such a scheme. The alternative for such income earners is public rental housing approach with possibilities of subletting for all those earning below Kshs.700/= today, which is equivalent to Kshs.280/= in 1977.

Since the loans normally given to the Site and Service Scheme allotees is inadequate and the Government cannot afford heavy subsides, such sites should be left to those earning about Kshs.700/= but below Kshs.2000/= (see Section 1.1) who are likely to afford the financial demands of a site and service scheme. This in a way would solve the displacement currently affecting site and service projects.

5.2 SOCIO-ECONOMIC CHARACTERISTICS OF DANDORA RESIDENTS

This section attempts to explain the characteristics of the Dandora Phase 1 plot allotees and the tenants. An attempt will be made to examine if those who have been displaced are significantly different from those who replaced them and also those who decided to develop their plots. The latter are referred to in this analysis as the stack-on-allotees.
Though shelter problems for the urban poor is a key issue, most of them are underemployed in informal occupations or marginally employed in low productivity sector. This is why before proposing a shelter programme for this category of citizens, it is important to establish what proportion can afford what type of shelter and also to investigate into the root causes of urban poverty. In this way, policy makers will have addressed themselves appropriately to the urban poor priorities in life as prerequisites for any programmes to improve their welfare. As heavily subsidised shelter programmes are impossible in most countries in view of their possible effects to the public sector housing output, the only assistance that could be extended to the urban poor to enable them live in standard shelter, is by way of first increasing opportunities for productive employment as well as encouraging them to form Cooperative and other collaborative groups.

As a result of displacement of the initial allottees from Dandora Phase 1 the estate has turned into a place of diverse urban community of different ethnic groups, age structures, incomes, lifestyles tastes and preferences. This experience diverts from the expectations of the project developers who had presumed a possibility of formation of an integral homogeneous and cohesive community with similar goals and aspirations. It was on the basis of these assumptions that self-help groups were expected to be formed to enable group participation in completing the required structures and construction of public utilities like social halls, day care units etc.
The variation of socio-economic characteristics of the respondents interviewed also reflect the past, current and future displacement trends. These characteristics are illustrated in the subsequent tables.

**TABLE 7**

**RESPONDENTS AGE - SEX STRUCTURE**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>SEX</th>
<th>AGE (YEARS)</th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M</td>
<td>F</td>
<td>19-25</td>
<td>26-35</td>
<td>36-45</td>
<td>46-55</td>
</tr>
<tr>
<td>DISPLACED ALLO-TEES</td>
<td>67%</td>
<td>33%</td>
<td>-</td>
<td>-</td>
<td>20%</td>
<td>67%</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>60%</td>
<td>40%</td>
<td>24%</td>
<td>30%</td>
<td>16%</td>
<td>20%</td>
</tr>
<tr>
<td>STACK-ON-ALLO-TEES</td>
<td>74%</td>
<td>26%</td>
<td>-</td>
<td>6%</td>
<td>16%</td>
<td>52%</td>
</tr>
</tbody>
</table>

The figures in the above Table shows that most of the residents are males. The female household heads are above 35 years old. Their responses to other questions indicated that they are either single, divorced, widows or separated from their husbands and majority of them, (32%) are self employed. The youngest respondents were amongst the tenants and the new landlords while the stack-on-allotees have the majority of the aged i.e. between 46-56 years.
Might be as seen in Section 3.4 of this study, age structure has some bearing on the prospective future movements out of the estate in that the proportion of those with intentions to migrate elsewhere was higher for the tenants and the new landlords than for the stack-on-allotees.

As shown in Table 7 above, there are 26% of the initial plot allotees aged above 55 years, currently continuing with loan repayment. Such a high percentage of the aged allotees leaves some doubt as to how many from amongst them will live to complete those loans which are expected to run on for the next 20 - 30 years. This is one of the aspects overlooked by the project planners at the allocation period.

**TABLE 8**

**MARITAL STATUS**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>SINGLE</th>
<th>MARRIED</th>
<th>DIVORCED</th>
<th>WIDOWED</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>5%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>38%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>8%</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The figure in Table 8, shows that the initial allotees have been displaced by relatively single persons in that tenants and new landlords seem to be overriding others in terms of single respondents.
### TABLE 9

**FAMILY SIZE**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>SIZE OF HOUSEHOLD</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>NON</td>
</tr>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>2%</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>40%</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>6%</td>
</tr>
</tbody>
</table>

Just as they led the others with the majority of singles the tenants and new landlords have a higher score of 40% of persons with no families or dependents. Considering the criteria used at the allocation stage, this category of Dandora residents would not have been selected to participate in the project.

### TABLE 10

**LEVEL OF EDUCATION**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>BELOW</th>
<th>CPE</th>
<th>KJSE</th>
<th>O LEVEL</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>20%</td>
<td>60%</td>
<td>4%</td>
<td>11%</td>
</tr>
<tr>
<td>TENANT &amp; NEW LANDLORDS</td>
<td>4%</td>
<td>16%</td>
<td>20%</td>
<td>50%</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>78%</td>
<td>18%</td>
<td>4%</td>
<td>-</td>
</tr>
</tbody>
</table>
If the contention held by most people that the level of education in some cases determines a person's monthly enumeration is in any way relevant, then those persons educated above a given level in view of the expected high incomes will be willing to spend more on housing. Hence their aspirations for better housing will force them to move from one residential zone to another in search of suitable accommodation unless of course they own a house already. In this case therefore, the largest proportion of Dandora residents which is likely to migrate elsewhere is the group of the tenants and the new landlords which has the majority (60%) members with 'O' Level education and above. Generally, it appears that only limited number of residents have 'A' Level education and above. This defeats an assumption or rather the argument that those displacing the poor at the estate are financially better off and are highly educated. The Stack-on-allotees have the lowest level of education compared to the other 2 groups. May be this restricts them from getting formal employment opportunities and this explains their firm decision and determination to retain their Dandora houses which subsidizes their incomes through subletting. Better educated persons have diverse chances of obtaining relevant job skills which enable them to earn stable and consistent incomes. This being so, they are able to negotiate housing on mortgage and other housing delivery systems.

The fact that most sites and service allotees have low skills puts them at a very disadvantageous position in shelter acquisition and affordability.
Those citizens in formal employment are in most cases supported by their employing agencies towards house rent expenses.

**TABLE 11**

**NUMBER OF DEPENDENTS**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>NON</th>
<th>1-4</th>
<th>5-6</th>
<th>ABOVE 6</th>
<th>NO RESPONSE</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>7%</td>
<td>47%</td>
<td>23%</td>
<td>13%</td>
<td>10%</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>40%</td>
<td>28%</td>
<td>26%</td>
<td>6%</td>
<td>-</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>16%</td>
<td>50%</td>
<td>20%</td>
<td>14%</td>
<td>-</td>
</tr>
</tbody>
</table>

The total number of dependents is yet another variable to show the diverse socio-characteristics of Dandora residents. It could also be used to determine residential shifting chances of a family. Table 11 above indicates that the displaced and the stack-on-allotees share similar characteristics i.e. large number of dependents, this somehow reflects a common feature which might have made the members of the 2 groups be allocated the Dandora plots. The fewer the number of dependents the more flexible it is for a family in changing housing occupancy, a characteristic featuring amongst the tenants and new landlords. Large family sizes may also explain the displacement in
that a family of 10 could not have moved in to live in the one room and kitchen at Dandora for which the materials loan given was merely meant to cover.

### TABLE 12

**INTENTIONS TO MOVE FROM CURRENT RESIDENCE**

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>83%</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>80%</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>50%</td>
</tr>
</tbody>
</table>

The high score (83%) of intentions to move elsewhere amongst the displaced allottees clearly shows that most of those who have sold their plots have not identified a proper residential place. The 50% responses from the stack-on-allottees yet again demonstrates how house owner occupancy may predermine the length of stay of a family in a given residential quarter. The stack-on-allottees are therefore likely to stay longer at the Dandora estate than the tenants and the new landlords.
TABLE 13

LEVEL OF INCOME (KSHS.) PER MONTH

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>401-800</th>
<th>401-1200</th>
<th>1201-1600</th>
<th>1601-2000</th>
<th>2001-2500</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>7%</td>
<td>7%</td>
<td>10%</td>
<td>30%</td>
<td>23%</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>10%</td>
<td>20%</td>
<td>34%</td>
<td>16%</td>
<td>12%</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>50%</td>
<td>36%</td>
<td>14%</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

Though one would have expected the displaced allottees to have the lowest incomes, the results tabulated above is surprising that most of the displaced allottees seem to have relatively higher incomes than the other two groups. May be this happens to be so after they started businesses with the money obtained from plot sales. An alternative explanation could be that the rest of the respondents especially new landlords and the stack-on-allottees who are subletting rooms withheld their true total income and persons might have falsified their income in applications for plots. Majority of the respondents (58%) seem to be earning between Kshs. 801 - 1600/. This implies that this is the income group that could benefit from a site and service scheme.
### TABLE 15
LEVEL OF EXPENDITURE (KSHS.) PER MONTH

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>400</th>
<th>401-800</th>
<th>801-1200</th>
<th>1201-1600</th>
<th>1601-2000</th>
<th>NO RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>7%</td>
<td>13%</td>
<td>50%</td>
<td>10%</td>
<td>17%</td>
<td>-</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>6%</td>
<td>14%</td>
<td>12%</td>
<td>50%</td>
<td>14%</td>
<td>4%</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>36%</td>
<td>35%</td>
<td>19%</td>
<td>5%</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

The Stack-on-allotees seem to be on the lower scale of spending. It was surprisingly found that 31% of the respondents are spending more than their total monthly incomes. This implies that this proportion of respondents might have had other sources of incomes or may be they live on gifts or on debts.

### TABLE 16
EMPLOYMENT

<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>NON</th>
<th>INFORMAL</th>
<th>FORMAL</th>
<th>NO RESPONSE</th>
</tr>
</thead>
<tbody>
<tr>
<td>DISPLACED ALLOTEES</td>
<td>24%</td>
<td>68%</td>
<td>16%</td>
<td>-</td>
</tr>
<tr>
<td>TENANTS &amp; NEW LANDLORDS</td>
<td>-</td>
<td>22%</td>
<td>64%</td>
<td>14%</td>
</tr>
<tr>
<td>STACK-ON-ALLOTEES</td>
<td>10%</td>
<td>53%</td>
<td>24%</td>
<td>13%</td>
</tr>
</tbody>
</table>
The above results closely reflect the information in Table 10 in that just as the tenants and new landlords had a leading score in the level of education, they are shown having a greater percentage of their members in the formal employment which is highly related to trained skills. The 24% and 10% no employment responses from amongst the displaced and the stack-on-allotees may be interpreted to mean that they rely on subletting or are engaged in illegal businesses for their livelihood.

The data analysed in this section clearly indicate that those displacing the initial allotees from their Dandora Phase 1 plots have: relatively small families, fewer dependents; higher level of education, incomes, savings and expenditure patterns. They also comprise of diverse ethnic groups. Majority of them are single and young i.e 70% are below 45 years old. These are crucial and fundamental observation to confirm that those displacing the poor from site and service schemes are significantly different from them in many aspects.

5.3 CAUSES AND IMPLICATIONS OF DISPLACEMENT

Causes of displacement in site and service schemes is closely tied with a number of factors some of which have been discussed in Section 5.1 of this study. In special circumstances where the very poor allottees are involved, the issue of the high demand for residential plots and subsequent prices likely to be paid for such plots is quite tempting for a poor family.
It is in this way that most of them are forced into selling their site and service plots.

The choice of investment is also another related aspect in that almost all of the displaced respondents indicated having invested the money from plot sales in other projects. The other issue is related to individuals' life priority. It appears that shelter is not a priority need for the very low income earners. Their own perception of need is survival and this happens to be the reason why some of those who sold plots and started businesses moved back to live in slum settlements.

As seen in Section 5.1, problems experienced at the construction stage may have made some of the financially weak participants to give up construction in addition to lack of other financial sources to supplement the loan given to them. It should also be made clear that most of the allotees continued paying for their previous residence while carrying on with the construction as well as meeting their family financial demand. This no doubt proved cumbersome especially to the very low income groups.

The well to do allotees found it easier to acquire funds from other sources to supplement the materials loans. This was not the case for the very poor inspite of the partial assistance some of them receive from a Welfare Revolving Fund set up purposely by the Nairobi City Council's Community Development Division.
This experience calls for appropriate estimate of the financial requirements of individual allottees based on their financial ability. The problems experienced at the Estate could also account for the displacement and their magnitude could be used to predict future trends in displacement in site and service schemes.

A number of respondents complained about the location of the Estate far off from the City Centre and lack of other services and facilities like water and Schools. Distance alone may make people move out into Estates with fair proximity to the City Centre. The need to be closer to the amenities offered by the City Centre was equally expressed across of the age and income groups of respondents in view of their choice of Estates they hoped to migrate into. Few people wish to live far off from the City Centre except those who own automobiles or with substantial incomes to enable them afford public transport expenses. Available information indicates that 20% of the Dandora residents walk to their places of work.

Other factors that may cause continuous displacement include the level of the residents satisfaction with the site conditions. Disatisfied tenants and plot owners at Dandora Phase 1 indicated lack of such comforts as security rubbish, dust congenial fellow residents and environmental pollution by noise (i.e some houses are still under construction) were also identified as problems.
Other complaints were leveled against dirty communal water places which is typical particularly when many households are sharing facilities. Such situations are possible especially within the plots where landlords are absent. In such cases none of the tenants feel responsible for the cleanliness or maintenance of the place.

The problem of untidy residential compounds is also tied with multi family occupancy which leads to overcrowding. These problems of environmental pollution were also identified by Jørgensen (1971) in Nakuru Site and Service Schemes. Such experiences may cause discontent amongst the tenants and landlords who contemplate on moving out immediately a better residence is identified.

Even though various responses to some of the questions intended to measure the level of satisfaction were so stereotyped, the final analysis per group apparently revealed that the allottees who did not show any negative feelings about the scheme were plot owners who indicated that they had nowhere else to go. Asked what improvements they would recommend in order to make the houses pleasant, majority of the dissatisfied tenants and the new landlords indicated: internal finishings, window, roof and door repairs and painting. Such responses could be treated as insights to the project officers that if the plot owners were refinanced in order to improve housing conditions the project site may also be improved for the benefit of the residing community.
Having such funds to improve their units, the landlords would feel secure in terms of attracting permanent tenants thereby regaining confidence in obtaining stable incomes from letting or subletting.

Although most plot owners were reluctant to indicate the number of rooms they were letting or subletting, there is evidence that most of them have constructed more rooms than expected. Such overconstruction imply encroachment of public abilities e.g. open spaces as well as overcrowding. Incidentally, only a few respondents indicated overcrowding at the Estate as a problem. With the increasing number of families per plot, high densities will be aminent in the scheme.

The most outstanding implication of displacement is the shortage of housing for the very low income owners. The fact that such poor urbanites will opt to give up a chance for a standard residence planned and partly financed for them, to live in lower quality housing just because of other financial needs implies that housing problem for the low income earners must be viewed as an integral part of urban poverty and closely related to incomes. This interrelationship means that all attempts or intervention by Governments and housing developers' intentions to alleviate poor housing conditions for the economically disadvantaged group can only be possible in the context of affordability as stable incomes are the only means through which an urban family may function, obtain and retain a socially acceptable dwelling.
More ethnic groups are likely to be presented as the plot/house sales continue. Similar trends were also observed in terms of District of origin analysis. Inspite of the fact that displacement at site and service schemes transforms a settlement into a mixed community which is a typical characteristic of an urban setting, it should be born in mind that the incoming residents end up depriving the original allotees of the facilities planned for them.

Having examined the incapacity of those earning below Kshs.700/= in meeting the financial demands of a site and service scheme, this means that no matter what the policy makers might attempt towards solving shelter problems for the urban poor there will endlessly be slum residents and homeless citizens who happen to be new urban poor migrants or those displaced from site and service schemes. Thinking of rental homes with provision for subletting for the very poor citizens may be a self-defeating alternative in that such rental units may still end up in the hands of those with relatively higher incomes and therefore may not be the solution to the housing problems facing the urban poor. Housing gentrification process seem to be very strong in Kenyan urban areas as we may not be catering effectively for the middle income households. Provision of adequate and affordable shelter for the urban poor could then be seen in two folds - first, provide enough for the middle income earners, then provide site and service schemes for the middle low income groups i.e those earning between Kshs.701 - 2000/=. 
SITE POLLUTION

Plate No. 23

25. Uncollected garbage
26. Some residents appear to be keeping goats
27. Dumped cars

PLATE NO. 24
Plates 28, 29, 30 & 31

Korogocho, the sprawling slum enroaching
Dandora Phase 1 and 2
CHAPTER SIX

CONCLUSION AND RECOMMENDATIONS

The purpose of the Dandora Project was to extend proper shelter services to the urban poor as well as increase housing stock for the low income residents in Nairobi; to improve the supply of basic and essential services to the beneficiaries and to involve the target group in the project implementation and development. As indicated earlier, the project stimulated and encouraged income generating activities for the urban poor through small businesses, letting and subletting the completed rooms. To some extent it proved an ideal project due to its financing approach which demonstrated an effective low cost housing delivery system especially for those who by virtue of their meagre incomes could not negotiate housing on mortgage or tenant purchase terms.

However, the project did not fully and effectively achieve its objective since most of those with the lowest incomes i.e Kshs.280/= as for 1977 could not meet the projects financial demands and therefore were forced to sell their plots or partially built houses and probably moved to lower quality houses than those offered at the Dandora Project.
The lesson to be learned here is that, shelter alone cannot form a sole solution to the root causes of urban poverty and that shelter programmes for the urban poor must be planned along with other programmes aimed at raising income earning opportunities of the urban poor. In case a shelter programme is thought as a priority by the policy makers, the housing units to be planned ought to be constructed as fast as possible so as to give a chance to the beneficiaries to sublet some rooms immediately.

Other project defaulters included allottees with higher incomes who sold or let out their completed houses and opted to live elsewhere. These comprises the number of absent landlords as identified in Dandora Phase 1. The project also failed to succeed in the formation of an urban cohesive community from which was expected to emerge self-help groups for construction purposes as well as setting up other public utilities not provided by the developer. Such a move was necessary since effective community development is normally an end in itself and important means of project planning and implementation. Such a unified group would have strengthened the neighbourhood to be formed. Most of the current tenants and new landlords at Dandora may not be committed to the project and their neutral and negative attitude to the wellbeing of the Estate may have had some impacts on the deteriorating site conditions.
The total cost of building a permanent house of Dandora type has gone up today and this is why it is vital to review the financial implications likely to affect the proceeding scheme phases and what may comfortably be paid as a loan by the target group in future sites in view of the inflation affecting everyone including the urban poor. Since the existing displacement can be said to have almost defeated the purpose of site and service schemes, there is need to formulate another policy in order to solve shelter problems of citizens earning the lowest salaries or wages thereby leaving the sites and service schemes to the lower middle income earners i.e those in the region of Kshs.701/= - 2,000/= This study somehow supports this view in that most of the Dandora residents (65%) have incomes ranging from Kshs.801/= to Kshs.2501/=.

The fact that the very poor did not struggle to complete their houses and that only 11.2% consulted the project coordinators regarding their financial problems is a clear indication to the policy makers that what such a group needs may be public low rental units not the ownership of the residential property. If the group's priority was to get some form of income first, it is no wonder then that the allotees rushed to sell the plots. It is also common knowledge that assurance of being issued with plot title deeds creates anticipations to future sales. The issue of diverting site and service schemes from the very low income groups should basically related to the affordability level of the target group and not on the housing needs.
If numerous of such housing projects were launched, cheap rental rooms would definitely flood the housing market and consequently their rents would drop to the minimum. This being so, most of the very low income earners who would not have otherwise owned a dwelling would thereby be housed and thus be saved from the consequences of slum life.

This study shows that the site and service as a policy to solving shelter problems affecting the urban poor has not been very successful. If no alternative approach is urgently formulated, the following is what might be expected in future sites.

(i) High plot or house turnover rates thereby making the projects merely a process of financial gamble whereby the financially weak allotees will be lured into selling their plots immediately after allocation,

(ii) If not effectively controlled and evaluated rents in such schemes will be on the higher scale leading to tenant exploitation.

(iii) Overcrowding and scarcity of essential facilities will turn such sites into slums and the Government will have no alternative but to embark on the upgrading exercise thereby spending money which would have otherwise been used for the construction of more of such units. It is well known that the urban poor in the upgraded slums are unable to pay for upgrading and most of them move out of an upgraded area.
(iv) Deterioration of environmental conditions at such sites since no incomes from rents or revenue from licenses seem to be returned into such projects to improve their site conditions.

(v) The very wide access roads provided in site and service schemes, having stayed for long periods without being used by any form of motorable and with no lighting system, may overtime be turned into garbage dumping grounds, unlicenced hawking, unhygienic and dangerous. What is needed at such sites is only the main access roads adjoined by convenient footpaths since the majority target group planned for, are unlikely to own personal private vehicles,

(vi) With the unnecessary long construction period e.g (like Dandora Phase 1 whose construction has run on for over 10 years, future such sites are unlikely to forever appear incomplete and the continuous noise of construction lorries and scattered heaps of construction materials not only become a nuisance but also a bother to the residents.

(vii) Reliance on individual construction end up in poor designs and low workmanship and in spite of the construction inspection which is proposed, most structures will divert from the architectural design expected making such sites look like villages.
Adherance to high standards for such sites as observed would merely mean high loan burdens to the target groups, most of who will find it difficult to bear and would consequently give up. Lowering of such standards would mean saving of some capital which could be used to refinance the very poor allotees who may experience problems at the construction stage.

The author's sincere and earnest hope is that this study will serve as a signal to spark off the interested housing experts and policy makers who seek solutions towards provision of affordable shelter for the disadvantaged members of our society. Consequently, the study will have served its purpose if it has casted a positive insight of what is happening and likely to happen in future site and service schemes. The study is nonetheless by no means exhaustive and a further related study is likely to reveal deeper views into the shelter problems affecting the urban poor as well as give unbiased challenge to the issues and recommendations given here.
RECOMMENDATIONS

It is the authors view that better shelter for the urban poor is not a priority solution to the root causes of the urban poverty, but one of the many programmes attempting to rehabilitate this category of urbanites. It is therefore being recommended that if the Government has to continue with this approach as the future housing policy for the urban poor;

(i) The very low income earners i.e those earning below Kshs.700/= who cannot afford the financial demands of such projects be left out while those selected for the same ought to be given enough loans to enable them construct their houses promptly. The low income earners disqualified be incorporated into a kind of low rental housing units with possibilities of subletting to enable them supplement their incomes.

(ii) That enough grace period of loan repayment be given to enable houseowners identify tenants.

(iii) That services and amenities at future sites be provided above the expected population density in view of the possible overcrowding already observed.

(iv) That the construction process be made as fast as possible in order to recapture the interests of the participants.
(v) That since the Government cannot afford heavy subsidies long term loans be extended to the local Government in order to facilitate additional series of low rental housing units into the housing market and that such units be planned with possibilities of subletting just like in the site and service schemes and that rents offered at such units be equivalent to the lowest rents offered at the City Council units. In view of the high cost of construction, such low rents would mean a longer loan repayment period than the current period given to the site and service allottees. In this regard, the Government will have to take charge of such a long term loans.

(vi) To co-opt the urban poor in any effective programmes, some means of generating reliable and stable incomes be envisaged through some kind of formal or informal employment opportunities in addition to efforts towards mobilising of financial savings for the target group through cooperative groups since shelter alone cannot form a sole solution to the root causes of urban misery.

(vii) That future site and service schemes be zoned in relation to the job creation opportunities of the community after an effective and thorough feasibility study.

(viii) Immediate introduction of the revised housing by-laws and use of improved locally available construction materials in future sites so as to minimise house total and cost, to encourage appropriate construction technology.
(ix) In view of the existing overconstruction of rooms and deviation from the original housing designs, there be established an inspectorate programme within the department of housing purposely responsible for monitoring and evaluating site and service projects. It is only through such a unit that problems affecting such schemes could properly be addressed to as well as bar those earning above certain scales from living in public low cost houses where rents are tuned to suit the middle income earners majority of who displace the urban poor from site and service schemes.

(x) To reduce the number of urbanites looking for residential houses, incentives be given to employers to enable them house their workers. In this way, overcrowding in site and service schemes already observed would be checked. This may also reduce the number of persons likely to displace the allotees of such site plots.

(xi) That land proposed for low cost housing be acquired way ahead in advance to avoid high prices of urban land as a result of speculation. If this is possible the total costs of low residential dwellings will be kept at the minimum and majority of the target group would afford to construct own houses.
(xii) Various ways of controlling urban population growth both natural and by migration be stepped up. This could be done by extending services and facilities to the rural areas as well as identification of ways and means of creating alternative employment opportunities for rural population through the current District Focus for Rural Development. In this way unskilled and semi-skilled labourers who are unlikely to acquire well paid jobs in the City will be held up in the rural places. This could help especially having observed that majority of those who qualified for plot allocation in Dandora i.e about 85% had below CPE level of education and 98% were born outside Nairobi.

(xiii) There is need to assess the possible underoccupation in the Government and City Council houses. In some instances a single Government unit may occupy too big a space this wasting land that could otherwise have been used for additional low cost housing units since majority of Nairobi residents 55% (see Section 1.1) fall within this group.

It is finally hoped that the combined efforts of the Kenya Government and other institutions involved in human shelter guided by the above tentative recommendations will no doubt identify an alternative programme for housing the very poor income earners into standard and affordable housing units.

There is need for a further study on the evaluation of more site and service schemes in order to establish their current and future role in alleviating housing problems for the very low income earners.
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This Survey is purely for academic work only and any information obtained will **not** be used for any other purpose.

DATE    DECEMBER, 1985

NAME OF INTERVIEWER
INTERVIEW SCHEDULE FOR DISPLACED ALLOTEES

QUESTIONNAIRE NO. ....................

1. SEX
   (1) Male
   (2) Female

2. AGE
   (1) Below 18
   (2) 19-25
   (3) 26-35
   (4) 36-45
   (5) 46-55
   (6) Above 56

3. MARITAL STATUS
   (1) Married
   (2) Single
   (3) Divorced
   (4) Widowed
   (5) Separated

4. HAVE YOU EVER ATTENDED SCHOOL?
   (1) Yes
   (2) No

5. IF YES, UPTO WHAT LEVEL?
   (1) Below C.P.E.
   (2) C.P.E.
(3) K.J.S.E. Level
(4) 'O' Level
(5) 'A' Level
(6) University Level
(7) Others (Specify).................................

6. FAMILY SIZE

(1) None
(2) 1-2
(3) 3-4
(4) 5-7
(5) 8-9
(6) Above 9

7. NUMBER OF DEPENDANTS ............................................

8. PLACE OF BIRTH ...........................................(Specify District)

9. ETHNIC ORIGIN...........................................

10. OCCUPATION................................................

11. MEANS OF COMMUTING

(1) Walking
(2) Cycling
(3) Public Transport
(4) Own Vehicle
12. LEVEL OF INCOME PER MONTH (KSHS.).................................

(1) Upto 400

(2) 401-800

(3) 801-1200

(4) 1201-1600

(5) 1601-2000

(6) 2001-2400

(7) 2401-2800

(8) 2801-3200

(9) Above 3201

13. SAVINGS PER MONTH (KSHS.). ..............................................

14. EXPENSES PER MONTH (KSHS.). ...............................................

(1) Transport to Work

(2) Food/Clothing

(3) Rent

(4) Education

(5) Others (Specify).................................

15. DISTANCE TO PLACE OF WORK (KM)...........................................

16. FOR HOW LONG HAVE YOU LIVED IN NAIROBI?............................

17. HOW DID YOU GET INFORMATION ON DANDORA PLOTS

(1) Through City Council

(2) Through Local Media
18. WHY DID YOU APPLY FOR DANDORA PLOTS?
   (1) ..............................................
   (2) ..............................................

19. WHAT WAS YOUR INCOME PER MONTH WHEN YOU APPLIED FOR THE
    DANDORA PLOTS (KSHS) ..................................

20. WHAT WAS YOUR INCOME WHEN YOU APPLIED FOR ONE?
    (KSHS,)......................

21. WHERE WERE YOU STAYING THAT TIME?
    (Specify the Estate)

22. DID YOU OWN THE RESIDENTIAL QUARTER?
   (1) Yes
   (2) No

23. IF NO, HOW MUCH RENT WERE YOU PAYING? (KSHS.)..............

24. HOW DID YOU RAISE THE INITIAL DEPOSIT FOR DANDORA
    PLOT?
   (1) Through Own Savings
   (2) Through Employers Assistance
   (3) Selling Some Other Property
   (4) Through Relatives and Friends
25. ARE YOU
   (1) Renting your Dandora House OR
   (2) You Sold It

26. IF YOU SOLD IT
   (1) Had you Started Construction OR
   (2) You Sold it Before you Embarked on Construction.

27. IF YOU HAD STARTED CONSTRUCTION, DID YOU COMPLETE ALL THE REQUIRED ROOMS
   (1) Before Renting OR
   (2) You Continued with Construction while Renting the Completed Units

28. WHAT CONSTRUCTION PROBLEMS DID YOU EXPERIENCE?

29. DID YOU REPORT ANY OF THESE PROBLEMS TO THE PROJECT OFFICERS?
   (1) YES
   (2) NO

30. IF YES, WHAT ACTION WAS TAKEN?
   (1) ....................................................
   (2) ....................................................

31. DID YOU STAY IN THE HOUSE AT ALL?
   (1) Yes
   (2) No

32. IF YES, FOR HOW LONG DID YOU LIVE THREE?
   (1) Less than 6 Months (4) 3-4 Years
   (2) Upto 1 Year (5) Over 4 Years
   (3) Upto 2 Years
33. IF YOU SOLD THE PLOT, HOW MUCH MONEY DID IT FETCH? (KSHS.) .................

34. WHAT DID YOU DO WITH THE MONEY?

(1) .................................................................

(2) .................................................................

(3) .................................................................

35. IF YOU HAD NOT STARTED CONSTRUCTION, WHY DID YOU SELL THE PLOT? .................................................................

36. WHERE ARE YOU STAYING NOW? .................... (Specify Estate)

37. ARE YOU RENTING?

(1) Yes

(2) No

38. IF YES, ARE YOU SATISFIED WITH THE CONDITIONS OF THAT HOUSE YOU ARE LIVING IN?

(1) Yes

(2) No

39. IF NO, WHAT IMPROVEMENTS WOULD YOU RECOMMEND? .................................................................

40. HOW MUCH ARE YOU PAYING PER MONTH? (KSHS.) .................
41. DO YOU THINK THE AMOUNT YOU ARE PAYING NOW IS

(1) More than the Loan you would be paying for the Dandora House?

(2) Less than that Loan?

(3) Same as that Loan you would be paying?

(4) No Idea

42. WHY DO YOU THINK MOST OF THE INITIAL ALLOTTEES HAVE SOLD THEIR PLOTS/OR ARE RENTING THEIR HOUSES?

(1) ..........................................................

(2) ..........................................................

(3) ..........................................................

(4) ..........................................................

43. WHAT DIDN'T YOU LIKE ABOUT DANDORA?

(1) ..........................................................

(2) ..........................................................

(3) ..........................................................

44. WHAT DO YOU THINK ARE THE MAIN WEAKNESSES OF THIS SITE AND SERVICE SCHEME?

(1) ..........................................................

(2) ..........................................................

(3) ..........................................................

(4) ..........................................................
45. IF YOU GET ANOTHER CHANCE OF OWNING A SITE AND SERVICE SCHEME WHAT WOULD YOU DO WITH IT?

(1) Sell it immediately?
(2) Complete the Unit and then sell it?
(3) Complete the Unit then rent it?
(4) Complete the Unit and live there?
(5) Complete the Unit and live there while subletting.

46. DO YOU HOPE TO MOVE FROM WHERE YOU ARE STAYING NOW?

(1) Yes
(2) No

47. IF YES; HOW SOON?

(1) Next 6 Months
(2) Next 1 Year
(3) Next 2 Years
(4) Next 3 Years
(5) Next 4 Years
(6) Next 5 Years
(7) Not sure.

48. WHERE DO YOU INTEND TO GO (SPECIFY ESTATE).............
WHICHEVER PLACE YOU CHOOSE TO GO; WOULD YOU EXPECT TO PAY

(1) More Rent than you are paying now?
(2) Less Rent than you are paying?
(3) Same Amount as you are paying now?
INTERVIEW SCHEDULE FOR STACK-ON ALLOTEES

QUESTIONNAIRE NUMBER ................

1. SEX
   (1) Male
   (2) Female

2. AGE
   (1) Below 18
   (2) 19-25
   (3) 26-35
   (4) 36-45
   (5) 46-55
   (6) Above 55

3. MARITAL STATUS
   (1) Married
   (2) Single
   (3) Divorced
   (4) Widowed
   (5) Separated

4. HAVE YOU EVER ATTENDED SCHOOL?
   (1) Yes
   (2) No
5. IF YES, UPTO WHAT LEVEL?

(1) Below C.P.E.
(2) C.P.E.
(3) K.J.C.E. Level
(4) 'O' Level
(5) 'A' Level
(6) University Level
(7) Others (Specify) ...........................................

6. FAMILY SIZE

(1) None
(2) 1-2
(3) 3-4
(4) 5-7
(5) 8-9
(6) Above 9

7. NUMBER OF DEPENDANTS ...........................................

8. PLACE OF BIRTH .................................................(Specify District)

9. ETHNIC ORIGIN ..................................................

10. OCCUPATION .....................................................
11. MEANS OF COMMUTING

(1) Walking
(2) Cycling
(3) Public Transport
(4) Own Vehicle

12. LEVEL OF INCOME (KSHS.) PER MONTH:

(1) Upto 400
(2) 401-800
(3) 801-1200
(4) 1201-1600
(5) 1601-2000
(6) 2001-2400
(7) 2401-2800
(8) 2801-3200
(9) Above 3201

13. SAVINGS PER MONTH (KSHS.)

14. EXPENSES FOR MONTH (KSHS.)

15. DISTANCE TO THE PLACE OF WORK (KM)

16. FOR HOW LONG HAVE YOU LIVED IN NAIROBI
17. HOW DID YOU GET INFORMATION ON DANDORA PLOTS?

(1) Through the City Council

(2) Through Local Media

(3) Through Friends

18. WHY DID YOU APPLY FOR ONE OF THEM

(1) .................................................................

(2) .................................................................

19. WHAT WAS YOUR INCOME PER MONTH WHEN YOU APPLIED FOR THE DANDORA PLOTS? (KSHS.).................................

20. WHERE WERE YOU STAYING BEFORE (Specify Estate)

.................................................................

21. WHEREVER YOU WERE STAYING, WAS IT

(1) Your House or

(2) Were You Renting

22. IF YOU WERE RENTING, HOW MUCH WERE YOU PAYING PER MONTH? (SHS.).................................

23. HOW DID YOU RAISE THE INITIAL DEPOSIT FOR THE DANDORA PLOT?

(1) Through Own Savings

(2) Through Employer's Assistance/Loan

(3) Selling Some Other Property

(4) Through Relative/Friends
24. WHAT CONSTRUCTION PROBLEMS DID YOU EXPERIENCE?
   (1) .................................................................
   (2) .................................................................

25. DID YOU REPORT ANY OF THESE PROBLEMS TO THE
    PROJECT OFFICERS?
   (1) Yes
   (2) No

26. IF YES, WHAT ACTION WAS TAKEN?
   (1) .................................................................
   (2) .................................................................

27. HAD YOU COMPLETED THE HOUSE?
   (1) Before Moving In or
   (2) You Moved In and Continued with the
        Construction.

28. HOW MUCH IS THE LOAN REPAYMENT PER MONTH (KSHS.).....

29. ARE YOU SUBLETTING?
   (1) Yes
   (2) No

30. IF NO WHY?.....................................................

31. IF YES, HOW MANY ROOMS?............................... 

32. HOW MUCH PER ROOM PER MONTH (KSHS.)...................

33. HOW MANY PERSONS ARE ACCOMMODATED/LIVE IN THESE
    ROOMS?.....................................................

34. ARE THERE TIMES WHEN YOU HAVE VACANT ROOMS?
   (1) Yes
   (2) No
   (3) .................................................................
   (4) .................................................................

35. DO YOU INTEND TO SELL THE HOUSE IN FUTURE?
   (1) Yes
   (2) No
35. IF YES FOR HOW LONG DO THEY REMAIN EMPTY?

36. ARE YOU SATISFIED WITH THE CONDITIONS OF YOUR HOUSE?
   (1) Yes
   (2) No

37. IF NO, WHAT IMPROVEMENTS WOULD YOU MAKE IF FUNDS WERE AVAILABLE?

38. WHAT DO YOU LIKE ABOUT DANDORA?

39. WHAT ARE THE MAJOR PROBLEMS IN THE ESTATE?
   (1) .............................................................
   (2) .............................................................
   (3) .............................................................
   (4) .............................................................

40. DO YOU INTEND TO SELL THE HOUSE IN FUTURE?
   (1) Yes
   (2) No
41. IF YES GIVE REASONS .................................................................

.................................................................................................

42. FOR HOW MUCH WOULD YOU SELL IT?
(KSHS.) ....................................................................................

43. IF NO, WHY?
(1) ..............................................................................................

(2) ..............................................................................................

(3) ..............................................................................................

(4) ..............................................................................................

44. IF YOU SOLD IT OR RENT IT, WHERE WOULD YOU GO?
(Specify Estate) ..............................................................................

45. WHEREVER YOU CHOSE TO MOVE TO, WOULD YOU EXPECT TO PAY

(1) Less

(2) More

(3) Same

RENT THAN THE LOAN YOU ARE PAYING NOW?

46. WHY DO YOU THINK SOME OF THE INITIAL ALLOTEEES HAVE SOLD
THEIR PLOTS OR ARE RENTING THEIR HOUSES IN DANORDA?

(1) ..............................................................................................

(2) ..............................................................................................

(3) ..............................................................................................
47. DO YOU OWN ANOTHER HOUSE OR PLOT IN NAIROBI?

(1) Yes
(2) No

48. FOR HOW LONG DO YOU HOPE TO LIVE IN THIS ESTATE

(1) Not Sure
(2) Next 3 Years
(3) Next 5 Years
(4) For the Entire Period You Will Live in Nairobi
(5) Throughout Your Life Time

FACILITIES AVAILABLE

49. ELECTRICITY YES/NO

50. TELEPHONE YES/NO

51. WATER SUPPLY

(1) None
(2) Communal Tap
(3) Private Water Tap

52. DO YOU HAVE A HOT WATER SYSTEM

(1) Yes
(2) No
53. WHAT TYPES OF RECREATIONAL ACTIVITIES ARE THERE?

(1) ..............................................................

(2) ..............................................................

(3) ..............................................................

(4) ..............................................................

54. DISTANCE OF THE HOMESTEAD TO THE NEAREST

(1) Nursery School ...........................................

(2) Primary School ..........................................  

(3) Secondary School ........................................

(4) Clinic ......................................................

(5) Shops/Kiosks .............................................

(6) Market .....................................................

TO BE OBSERVED BY THE INTERVIEWER AT THE HOUSE COMPOUND

55. CAR PARKING SPACE

(1) Yes

(2) No

56. TYPE OF ROAD

(1) Earth

(2) Murram

(3) Tarmac

57. FENCE (1) Yes

(2) No
58. GATE  (1) Yes  
      (2) No

59. CEILING  (1) Yes  
      (2) No

60. PAINTING  (1) Yes  
      (2) No

61. STOREYED  (1) Yes  
      (2) No

62. GARBAGE COLLECTION
      (1) No Litter  
      (2) A few  
      (3) Much
INTERVIEW SCHEDULE FOR TENANTS AND NEW LANDLORDS

QUESTIONNAIRE NUMBER

1. SEX
   (1) Male
   (2) Female

2. AGE
   (1) Below 18
   (2) 19-25
   (3) 26-35
   (4) 36-45
   (5) 46-55
   (6) Above 55

3. MARITAL STATUS
   (1) Married
   (2) Single
   (3) Divorced
   (4) Widowed
   (5) Separated

4. HAVE YOU EVER ATTENDED SCHOOL?
   (1) Yes
   (2) No
5. IF YES, UPTO WHAT LEVEL?
   (1) Below C.P.E.
   (2) C.P.E.
   (3) K.J.S.E.
   (4) 'O' Level
   (5) 'A' Level
   (6) University

6. FAMILY SIZE
   (1) Non
   (2) 1-2
   (3) 3-4
   (4) 5-7
   (5) 8-9
   (6) Above 9

7. NUMBER OF DEPENDANTS

8. PLACE OF BIRTH (SPECIFY DISTRICT)

9. ETHNIC ORIGIN

10. OCCUPATION

11. MEANS OF COMMUTING
   (1) Walking
   (2) Cycling
   (3) Public Transport
   (4) Own Vehicle
12. LEVEL OF INCOME (KSHS.) PER MONTH
   (1) Upto 400
   (2) 401-800
   (3) 801-1200
   (4) 1201-1600
   (5) 2001-2400
   (6) 2401-2800
   (7) 2801-3200
   (8) Above 3201

13. SAVINGS PER MONTH (KSHS.) ........................................

14. EXPENSES PER MONTH (KSHS.)
   (1) Transport to work
   (2) Food clothing
   (3) Rent
   (4) Other (Specify) ...........................................

15. DISTANCE TO PLACE OF WORK (KM) ............................

16. FOR HOW LONG HAVE YOU LIVED IN NAIROBI? ..............

17. WHERE WERE YOU STAYING BEFORE YOU MOVED TO DANDORA?
    (Specify Estate) .............................................

18. HOW MUCH RENT WERE YOU PAYING THERE? (KSHS.) ........

19. WHY DID YOU CHOOSE TO MOVE TO DANDORA?
   (1) .................................................................
20. ARE YOU RENTING THIS HOUSE?
   (1) Yes
   (2) No

21. IF YES, HOW MUCH ARE YOU PAYING PER MONTH?
    (KSHS.) ...................

22. HAS THE RENT BEEN INCREASED SINCE YOU MOVED IN?
    (1) Yes
    (2) No

23. IF YES, BY HOW MUCH? (KSHS.) ..................

24. ARE YOU SATISFIED ABOUT THE CONDITION OF THE HOUSE?
    (1) Yes
    (2) No

25. IF NO, WHAT IMPROVEMENTS WOULD YOU RECOMMEND?
    (1) ................................
    (2) .............................................................
    (3) ................................
    (4) .............................................................

26. WHO WAS STAYING IN THIS HOUSE BEFORE YOU MOVED IN?
    (1) The Owner
    (2) Another Person (Renting)
    (3) No Idea
27. IF YOU BOUGHT THE HOUSE, HOW MUCH DID YOU PAY FOR IT? (KSHs) ......................

28. WHEN DID YOU BUY IT? ............ YEAR.

29. WAS IT COMPLETED

   (1) Yes

   (2) No

30. IF NO WHICH STRUCTURES HAD BEEN PUT UP?

   (1) .................................................................

   (2) .................................................................

   (3) .................................................................

   (4) .................................................................

31. DO YOU KNOW WHERE THE PREVIOUS OWNER LIVES?

   (1) Yes

   (2) No

32. IF YES, SPECIFY THE ESTATE ........................................

33. WHAT IS HIS/HER CONTACT ADDRESS? ............................

34. OWNER'S PLACE OF WORK ........................................

35. WHY DO YOU THINK HE/SHE SOLD THE PLOT/HOUSE?

   (1) .................................................................

   (2) .................................................................
36. WHAT ARE THE PROBLEMS OF THIS ESTATE?

(1) ..............................................

(2) ..............................................

37. WHAT DO YOU THINK ARE THE MAIN WEAKNESSES OF THIS SITE AND SERVICE SCHEME?

(1) ..............................................

(2) ..............................................

(3) ..............................................

(4) ..............................................

38. DO YOU INTEND TO SELL THIS HOUSE IN FUTURE?

(1) Yes

(2) No

39. IF YES FOR HOW MUCH? KSHS.) .....................

40. WHERE WOULD YOU MOVE TO? ..............................

41. HOW MUCH RENT WOULD YOU EXPECT TO PAY THERE PER MONTH?

(1) Less than the current rent you are paying?

(2) More than this rent?

(3) Same as the rent you are paying?
42. FOR HOW LONG DO YOU HOPE TO LIVE IN THIS ESTATE?

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<tr>
<td>(1)</td>
<td>Not Sure</td>
</tr>
<tr>
<td>(2)</td>
<td>Next 1-2 Years</td>
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<td>(3)</td>
<td>Next 3-4 Years</td>
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<td>Next 5-6 Years</td>
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<td>(5)</td>
<td>For the Entire Period of Stay in Nairobi</td>
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<tr>
<td>(6)</td>
<td>Throughout Your Life Time</td>
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43. IF YOU MOVED TO ANOTHER ESTATE, WOULD YOU EXPECT TO PAY

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<td>(1)</td>
<td>Less than you are paying at Dandora?</td>
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<tr>
<td>(2)</td>
<td>More than you are paying?</td>
</tr>
<tr>
<td>(3)</td>
<td>Same as you are paying now?</td>
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FACILITIES AVAILABLE

44. ELECTRICITY YES/NO

45. TELEPHONE YES/NO

46. WATER SUPPLY

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<td>(1)</td>
<td>None</td>
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<tr>
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<td>Communal Tap</td>
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<tr>
<td>(3)</td>
<td>Private Water Tap</td>
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</tbody>
</table>
47. DO YOU HAVE A HOT WATER SYSTEM?

(1) Yes
(2) No

48. WHAT TYPES OF RECREATIONAL ACTIVITIES ARE THERE?

(1) ......................................................................
(2) ......................................................................
(3) ........................................
(4) ........................................

49. DISTANCE OF THE HOUSE TO THE NEAREST

(1) Nursery School ..............................................
(2) Primary School ..............................................
(3) Secondary School ...........................................
(4) Clinic .........................................................
(5) Shops/Kiosks ...............................................  
(6) Market .......................................................  

TO BE OBSERVED BY THE INTERVIEWER AT THE HOUSE COMPOUND

50. CAR PARKING SPACE

(1) Yes
(2) No
<table>
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<tr>
<th>Question</th>
<th>Options</th>
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</table>
| 51. TYPE OF ROAD | (1) Earth  
|           | (2) Murram  
|           | (3) Tarmac |
| 52. FENCE | (1) Yes  
|           | (2) No    |
| 53. GATE | (1) Yes  
|           | (2) No    |
| 54. CEILING | (1) Yes   
|           | (2) No    |
| 55. PAINTING | (1) Yes    
|           | (2) No    |
| 56. STOREYED | (1) Yes    
|           | (2) No    |
| 57. GARBAGE COLLECTION | (1) No Litter  
|           | (2) A few  
|           | (3) Much   |