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ATKINS, KAREN S. Housing Needs, Expectations, and Satisfaction of Public and Turnkey III Housing Residents in High Point, North Carolina. (1973) Directed by: Dr. Kay P. Edwards. Pp. 78.

It was the purpose of this study to determine to what extent selected internal and external product characteristics of public and Turnkey III housing in High Point, North Carolina, meet the perceived needs and expectations of its residents; whether the selected human needs for social and psychological stimulation, creative outlets, a sense of place or rootedness, and to relate to others are being met in public and Turnkey III housing; and how needs, expectations, and other selected factors influence residents expressed degree of housing satisfaction.

It was hypothesized that there would be no difference between the selected internal and external product characteristics of existing public and Turnkey III housing and the characteristics expected by the residents. A second hypothesis stated that there would be no significant difference between the criteria representing an environment supporting the needs for social and psychological stimulation and creative outlets and what is actually available in the public and Turnkey III housing project to meet these needs. It was also hypothesized that there would be no significant difference between the criteria representing an environment supporting the need for a sense of place or rootedness and the need to relate to others and the perceived satisfaction of these needs as reported by the residents.

A group of 49 families was selected by stratified simple random sampling techniques from 801 public and Turnkey III housing residents in 6 public housing projects and 1 Turnkey III development in High Point, North Carolina.

The data were collected by means of a four-part questionnaire. A needs score and an expectations score were found for all families. Data were analyzed primarily with descriptive statistics. Chi square analysis and Spearman Rho rank correlations were also used. The significance level was set at the  $p < .05$  level of confidence.

The three hypotheses under investigation were all rejected. Length of residence was found to be significantly related to the extent to which the needs for creative outlets and social and psychological stimulation were met. Size of household and marital status did not have any relationship to the extent to which needs were met. Length of residence, size of household, and expectations did not have any relationship to the degree of expressed housing satisfaction. The extent to which needs were met for black families did have a relationship to their expressed housing satisfaction.

HOUSING NEEDS, EXPECTATIONS, AND SATISFACTIONS  
OF PUBLIC HOUSING AND TURNKEY III RESIDENTS  
IN HIGH POINT NORTH CAROLINA

By

Karen Solberg Atkins

A Thesis Submitted to  
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Approved by

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APPROVAL SHEET

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## Chapter I

### INTRODUCTION

#### STATEMENT OF THE PROBLEM

The importance of housing cannot be denied since it is one of the major purchases a consumer makes over the course of his life. It is one place where family members can relate to one another. It is one means by which man expresses himself. The housing he chooses is closely related to the manner in which man perceives himself as an individual and in the community (23). Housing is, therefore, one means of expressing human values. Housing also serves to meet the social and psychological needs of individuals functioning in the total environment.

As one source of housing, federally-assisted projects should meet the needs and fulfill the values of low-income families, in addition to providing lower rents for tenants (23). Construction of public housing is on the increase. In 1969, there were 160,000 publicly-assisted housing starts. In 1970, there were 400,000 and projections for 1971 and 1972 were even higher (27). In addition to the projections for publicly-assisted housing, it was estimated in 1967, that in the next ten years more than one million families will be forced to relocate because of urban renewal (23).

With more units under construction and greater numbers of future tenants, it is important to question now whether public housing is merely providing shelter for its residents, or if, in addition, it

is providing an environment which fosters individual and family development.

This study investigated the product characteristics of six public housing projects and one Turnkey III development in High Point, North Carolina, product characteristics desired and expected by the residents, whether certain human needs were being met by this housing, and what factors were related to expressed degree of housing satisfaction.

Underlying the research are theories of economic behavior and socio-psychological needs in housing. Classical economic theory of consumer behavior proposes that each consumer in the marketplace is confronted by a variety of goods and services from which he must choose those he prefers. It is assumed the consumer will order his preferences in such a way as to maximize his satisfactions within the limits imposed by his resources (5, 14, 20). Lancaster (18) has proposed that people do not rank a good or service as a whole according to the satisfaction it will bring, but rather that characteristics of that good or service which yield satisfaction are ranked in order of preference. Economic theory also assumes that the consumer will be able to find in the effectively functioning marketplace a good or service containing the preferred combination of characteristics. However, some consumers, by virtue of their resource limitations, are only able to exercise this choice function to a limited degree, even though they have preferences. This is true of public housing residents who are limited in their choice of housing units.

As consumers and human beings, public housing residents not only have preferences, but they have certain basic human needs that should

be met. Montgomery (23) proposes that there are seven basic human needs which must be met through housing. These needs are: for a wholesome self-concept; to relate to others; for protection from nature; for social and psychological stimulation; for privacy; for creative outlets; and for a sense of place or rootedness. Failure to meet these needs results in social-psychological problems in the individual, as well as in the family. Traditionally, one finds that those who design, build, and finance housing are unaware of these needs and do not plan with their fulfillment in mind. Montgomery believes that if those who constructed public housing were more cognizant of these fundamental needs, its residents would find public housing more satisfactory.

#### PURPOSE OF THE INVESTIGATION

The purpose of this investigation was to determine to what extent selected internal and external product characteristics of public and Turnkey III housing in High Point, North Carolina, meet the perceived needs and expectations of its residents; whether the selected human needs for social and psychological stimulation, creative outlets, a sense of place or rootedness, and to relate to others, are being met in public and Turnkey III housing; and how needs, expectations, and other selected factors influence residents' expressed degree of housing satisfaction.

The following null hypotheses were formulated:

1. There is no significant difference between the selected internal and external product characteristics of existing public and Turnkey III housing and the characteristics expected by the residents.

2. There is no significant difference between the criteria representing an environment supporting the needs for social and psychological stimulation and creative outlets and what is actually available in the public and Turnkey III housing projects to meet these needs.

3. There is no significant difference between the criteria representing an environment supporting the need for a sense of place or rootedness and the need to relate to others and the perceived satisfaction of these needs as reported by the residents.

#### OPERATIONAL DEFINITION OF HOUSING NEEDS

In order to test Hypotheses 2 and 3, the following criteria were established and defined to represent an environment meeting the selected individual needs:

##### Social and Psychological Stimulation and Creative Outlets

Facilities are available for the outdoor play activities of younger and older children. Opportunities are provided for adults to partake in project affairs through membership in special groups. There are opportunities for adults and children to pursue hobbies and interests within the project, and for adults to voice opinions at regularly scheduled meetings.

##### Sense of Place or Rootedness and Need to Relate to Others.

Residents express a sense of pride in their project and a willingness to participate in maintaining its appearance. Opportunities are available for residents to form meaningful relationships. Parents have a sense of responsibility about the activities of their children.

## Chapter II

### REVIEW OF LITERATURE

Recent investigations in the area of housing preferences and satisfactions have shown that satisfaction with housing is strongly affected by such variables as length of residence and size of family. Luker (19), in an investigation of families in Camden County, Georgia, found that low-income families with four to six members were more highly dissatisfied with their housing than families of other sizes. Luker also found that the shorter the length of residence in a community, the higher the amount of housing dissatisfaction reported. Only about one-half of the 400-family sample was moderately satisfied with their present dwelling. Other variables affecting satisfaction were tenure, value of the home, and number of years married.

In a study of factors related to housing satisfaction, Vars (33), found that, on the average, homemakers with smaller families expressed greater satisfaction with the house than did those with larger families. Those who had no children or had children over eighteen years of age expressed the most satisfaction. Homemakers forty years and older expressed more satisfaction than younger ones. In addition, satisfaction was greater for homemakers who did not have a high school diploma. Also, housing satisfaction was found to be positively related to the cost of the dwelling. In this investigation, those who had lived in their residence for less than two years expressed more

satisfaction than those who had lived in their residences for a longer period of time. As a result of these and other findings, Vars concluded that a positive relationship existed between expressed housing satisfaction and aesthetics. Values other than aesthetics were examined, but no significant relationships between them and housing satisfaction were found.

Investigation into satisfaction with rental housing among wives of undergraduate students at Oregon State University indicated housing satisfaction to be affected by freedom from noise, privacy, amount of space within the dwelling, and number of bedrooms. Cost, location, and amount of space within the dwelling were the most influential factors in the selection of rental housing (26).

Both the amount of space within the dwelling and family size were found to have a bearing on interaction among family members and the privacy experienced by each member. Spatial dimensions and arrangement of dwelling space not only affected family interaction and privacy, but these factors can determine the use of space by family members. In addition, stage in the family life cycle, age, and sex of children, the husband's occupational demands, the individual's feeling about privacy, and the amount of space allocated to individuals have an effect on the family's interaction and privacy (31).

In another study, Evers (9) found that overall housing satisfaction varied significantly with age. Of 105 respondents, eighty-two of them expressed some degree of satisfaction with their present housing. Cost, privacy, personal safety, and protection were considered

very important in the selection of housing by one-half of the respondents.

An investigation which sought to distinguish the demographic and social-psychological variables that separate movers from non-movers found that: 1) demographic and social-psychological variables as well as ecological factors, must be taken into account when explaining residential moves; 2) age of the head of the household more often distinguished between movers and non-movers than other variables such as family type; 3) the assumption that housing satisfaction would be negatively related to residential mobility was supported. Housing satisfaction was found to be just as important as age of head of household in distinguishing movers from non-movers. In addition, such factors as age, family type, social mobility, and neighborhood location, in conjunction with housing satisfaction, distinguished movers from non-movers (6).

Results of an investigation into housing satisfaction of the aged indicated that statistically significant relationships exist between income and overall satisfaction, overall condition of the home and rooms related to need, and overall condition of the home and overall satisfaction (32).

Cook (8) found, in examining families living in and out of Standard Metropolitan Statistical Areas, that the level of income had a greater relationship to housing condition and presence of household appliances than did the area in which the home was located. Households with higher income (\$3,000-\$4,999), both in and out of SMSA's, were



more likely to own their own homes. The homes of these higher income households were more recently constructed, had a higher property value, were more sound in structure, had one or more baths, and more adequate water and heating facilities.

In looking at residential attitudes and housing choices of working class households in the West End of Boston, Hartman (15) concluded that, for certain people, standards of housing quality and quantity may be secondary to residents' degree of satisfaction. He suggests that it is their social and cultural values which modify their attitudes toward the use of the physical elements of housing. One must look at these physical elements in terms of people. "Only with a deeper understanding of working-class orientation and life styles and of the familiar or unfamiliar alternatives which can be meaningful in working-class perspectives may we hope to design housing which is more gratifying than the slums we wish to eradicate." (15). Housing satisfaction, then, appears to be influenced by many different variables in varying degrees.

Montgomery (23) has suggested that the quality of housing affects the personal satisfactions a man feels about himself. This self-image is related to the proposed basic human needs and their fulfillment through satisfactory housing. In a study investigating relationships that might exist between mental health, social status, and Maslow's "need system", Margaret Goldstein found that socio-economic status is not a crucial determinant of mental health. Rather it is the number of ungratified needs representing the psychological status of the family which have a direct bearing on mental health,

emotional adjustment, and self-actualization. Unsatisfied needs appear to influence the following variables: composite mental health, the reaction to threat, degree of anxiety, amount of ego strength, and impulse control (13). Out of forty studies conducted in Europe and the United States, twenty-six showed a positive relationship between housing and health (35). In an address given by Schorr (29) at the International Seminar on Poverty in 1967, the effects of poor housing were cited as follows:

- 1) The way in which a man living in poor housing perceives himself can lead to mental stress and poor health.
- 2) Those living in poor housing are happier being with others, rather than being by themselves, thereby fostering relationships within the neighborhood, but not in the family.
- 3) The individual becomes skeptical about people and organizations trying to help him.
- 4) Often a high degree of sexual arousal is developed, without a legitimate outlet for this need.
- 5) Household management becomes difficult and burdensome.

Parr (25) believes that a limited physical environment constitutes a direct type of sensory deprivation. However, no clearly defined relationship has been found to exist between sensory stimulation and mental health. There does seem to be a high correlation between housing conditions, high density, ugly and unsafe neighborhoods, and crowded, unstimulating interiors.

Lady Allen (1), in a study of high-rise apartments in London, found that seventy percent of the children living above the third floor never or only occasionally played with other children because of unsafe and unsuitable play conditions.

In a Puerto Rican study comparing family structure, Icken (17) found public housing, while it strives to strengthen the conjugal tie

in lower class households, seems to further weaken the man's status not only in the family, but in the neighborhood as well, thereby reinforcing the trend toward matrifocality already begun in the ghetto. For the majority of public housing residents, Icken reported that the local community had little meaning. It served only to disperse family members and relatives.

Hollingshead and Rogler (16) investigating public housing residents in Puerto Rico, found that families in housing projects had better housing, paid less rent, and were less crowded than families in slum areas. However, people in the slums liked their neighborhoods, while most public housing residents disliked theirs due to the tension between families, and rules imposed on residents by a subculture with different norms and values from the people who are residents of such areas.

Fromm (11) proposed that the desire for rootedness is a fundamental psychic need. Fried (10), in his investigation of elderly persons forced to relocate because of urban renewal in Boston, found these people to be depressed and saddened about losing all their friends and moving out of the neighborhood. Many public housing residents, forced to move because of urban renewal or other economic reasons, lose their sense of spatial identity. Fried (10) offers certain conclusions about the relocation of people. He suggests that a relocation response can be viewed as a grief similar to the grief and mourning for a lost person. One component of such grief is the loss of spatial identity. A second component is the fragmentation of

the group to which the person belonged. In addition, the person feels a lack of security, and the dislocation breaks up the sense of continuity in the working class. On the other hand, Carp (7), in a study of older residents in a San Antonio public housing project, found that a new environment provided the residents with a new and more likeable image of themselves. They now felt more able to work; and they viewed themselves as being more middle-aged than elderly.

Back (2), in discussing the effects of new public housing on residents in Puerto Rico, stated that major changes in housing conditions result in a major change in one's self-concept. Where a person lives and how he lives determine the view which he has of his place in the community - his role, status, and style of life.

Residents choose to move into housing for a variety of reasons. Smith (30), investigating housing choices made by families who had moved from one owned house to another within five years, found that sixty percent of the families moved because their homes were too small. The number of children may have increased, and families did not want to add on to the existing house. In some cases older children needed more space. Another reason influencing a change in housing for twenty percent of the respondents was an increase in income. Additional explanations for making the move were that older and all adult families could not maintain upkeep on the home and that younger, expanding families needed more space. Of all the reasons given for moving, more were related significantly to family size and composition.

Some of the features desired by residents in their homes in Back's (2) Puerto Rico study were concrete structure, paved walks and

streets, a single, detached house with three bedrooms, and a separate kitchen. Women were more concerned with the condition of the home and were more likely to be dissatisfied with the number of rooms and the kitchen area. Men, on the other hand, were more interested in the building material and the streets. Younger people expressed more dissatisfaction and had higher aspirations with respect to the number of rooms, average size of the dwelling, and dwelling type. They wanted better equipped homes to improve their social position. Older people, however, were mainly concerned with meeting their needs.

McNeil (21), studying the meaning of housing to low-income families, found they wanted the community to provide such services as schools, clean neighborhoods, police, sheriff and fire protection, city piped water systems, supermarkets, and garbage pick-up. She also found that low-income families are concerned with the housing values of health, safety, comfort, convenience, privacy, aesthetics, and family centrism.

Watts (34), in a study of living patterns and housing preferences summed up the foregoing discussion when he said houses must be socio-economically suitable. The field of housing preferences, living patterns, and dwelling usage is relatively unexplored. With research in these areas, housing programs could conceivably become more suitable. Beyer (4) felt, however, that we can best help people to satisfy their needs by understanding them better, rather than by looking at their preferences and buying habits.

### Chapter III

#### METHODS AND PROCEDURES

##### THE SAMPLE

A sample of forty-nine families was selected from 809 units in six public housing projects and one Turnkey III development in High Point, North Carolina. This was representative of the ratio of housing units in each project to the total number of units, and also reflected the ratio of black to white families within each project. As a result of the sample selection technique, forty-one black and eight white families were interviewed. Public housing constructed for the exclusive use of the elderly was not included in this investigation. In order to assure random selection of the respondents, maps were obtained of the seven projects with units inhabited by white families indicated in red. For each project, units with black and white families were separated and a random list of all units for both black and white residents was drawn. Sample respondents were contacted by knocking on doors in the predetermined pattern indicated on the lists. If a resident was not at home or declined to be interviewed, the interviewer proceeded to the next randomly-selected unit on the list until the interview quota for that project was completed.

##### THE STUDY INSTRUMENTS

Four instruments were used in this study: a housing description questionnaire, a housing project solidarity and rating scale, a housing

expectations questionnaire, and a family description questionnaire.

1. The housing description questionnaire was used to obtain general information on the housing situation of the family, their reasons for moving into public and Turnkey III housing, their preferences for various types of housing, and their degree of housing satisfaction.

2. The housing project solidarity and rating scales were used to measure to what extent selected housing needs were being met. The questionnaire developed for use in this study was adapted from the Community Solidarity Index (Donald R. Fessler) and the Community Rating Scale (New York State Citizen's Council) found in the Handbook of Research Design and Social Measurement (22). The Community Solidarity Index contained forty questions, but only those dealing with community spirit, interpersonal relations, and responsibility toward the community were selected for use in this investigation. The index was modified by changing the word "community" to "project," and by changing the basis of rating responses from "very true" through "definitely untrue" to "strongly agree" through "strongly disagree". Only three of the ten standards in the Community Rating Scale were selected for use. These were the standards of housing and planning, recreation, and community organization. The wording was changed also to reflect only project life.

The first part of the questionnaire was used to assess whether the need for a sense of place or rootedness and need to relate to others were being met. The second part assessed the need for creative outlets and the need for social and psychological stimulation.

3. The housing expectations questionnaire included fifteen internal and external housing characteristics. The respondent was asked if he expected or did not expect to find each of these characteristics in his residence when he moved in. The expectations of the resident were then compared with the product characteristics actually available in the housing project at the time the family moved in.

4. The family description questionnaire was used to gather selected demographic information about the sample respondents.

All questionnaires were completed by the interviewer in the presence of the respondent. During the administration of the housing project solidarity and rating scales, cards were presented to the respondent to aid him in recalling the alternative responses that could be made to the statement.

#### THE INTERVIEW

Interviews with white families were completed by the investigator. A black interviewer was hired and trained by the investigator to interview black families. Interviews were given during June and July, 1971. Administration of the interview schedule to each sample respondent took approximately twenty to thirty minutes. The housing description questionnaire was given first, followed by the housing project solidarity and rating scales, the housing expectations questionnaire, and, finally, the family description questionnaire. All respondents were cooperative and answered the questions as best they could.



## ANALYSIS OF DATA

Needs Score

Individual scores were computed for the first and second parts of the housing project solidarity and rating scales. On the first part, which measured need for a sense of place or rootedness and need to relate to others, the most desirable answer was given 5 points. The point range was from 5 - 1 which corresponded to the five responses "strongly agree to strongly disagree". The highest score possible was 85 (17 questions) and the lowest was 17. On the second part, measuring need for creative outlets and social and psychological stimulation, each of the four responses was given a point value. They were: good - 4; fair - 3; poor - 2; no opinion - 1. The highest possible score was 32 (8 questions) and the lowest was 8. To determine how well all needs were being met, both scores for each respondent were combined. These scores could range from 117-125.

Expectations Score

Only the characteristics which the residents said they had expected were looked at. The total of these expectations was obtained and compared to the number of those expectations which were actually available in the housing project at the time the family moved in. A score based on the percentage of met expectations was then calculated for each respondent.

Housing Satisfaction

The resident's expressed degree of housing satisfaction was determined by a question on the housing description questionnaire where

the respondent could answer on a scale from "very satisfied to very dissatisfied".

## Chapter IV

### RESULTS AND DISCUSSION

#### DISTRIBUTION OF THE SAMPLE

The majority of the forty-nine sample respondents were female. Table 1 shows the distribution of the respondents by sex.

Table 1. Distribution of Respondents by Sex

Sex	Black Respondents		White Respondents		All Respondents	
	No.	Percentage	No.	Percentage	No.	Percentage
Female	39	78	7	14	46	92
Male	1	2	1	2	2	4
Total	40	100	8	100	48	100

The reason for the large number of female respondents was that the study was conducted in the home of the respondent. A large number of the respondents were mothers of young children and were living alone or with their children. Of the 46 female respondents, thirty-one were living alone or with their children. Of the 2 male respondents, one was living alone or with his children and the other was living with his wife.

As previously stated, the distribution of the respondents was not equal — either ethnic, divorced, separated, or single. (See Table 2) Of the 48 sample respondents, 30 were female and 18 were male.

## Chapter IV

## RESULTS AND DISCUSSION

## DESCRIPTION OF THE SAMPLE

The majority of the forty-nine sample respondents were female. Table 1 shows the distribution of the respondents by sex.

Table 1. Distribution of Respondents by Sex

<u>Sex</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Female	39	95	7	88	46	94
Male	<u>2</u>	<u>5</u>	<u>1</u>	<u>12</u>	<u>3</u>	<u>6</u>
Total	41	100	8	100	49	100

One reason for the large number of female respondents was that interviews were conducted in the morning or early afternoon when most male household heads were working. A more significant reason was that the majority of the female interviewees were unmarried and living alone or with their children. Of the 46 female respondents, thirty considered themselves to be head of household.

As previously stated, the majority of the respondents were unmarried -- either widowed, divorced, separated, or single. (See Table 2) Of the total sample, one-third were married, and more than

one-fourth (29%) were separated. Of the black respondents, almost two-thirds were either married or separated. Thirty-eight percent of the white respondents were married, while 25 percent were divorced.

Table 2. Marital Status of the Sample by Race

<u>Marital Status</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage*</u>	<u>No.</u>	<u>Percentage</u>
Married	13	32	3	38	16	33
Widowed	10	24	1	12	11	22
Divorced	3	7	2	25	5	10
Separated	13	32	1	12	14	29
Single	<u>2</u>	<u>5</u>	<u>1</u>	<u>12</u>	<u>3</u>	<u>6</u>
Total	41	100	8	100	49	100

\*Percentages may not equal 100 due to rounding.

When age of the head of the household is considered, 76 percent of the total sample were between the ages of 30 and 65. Table 3 shows the distribution of ages by race.

Table 3. Age of Head of Household by Race

<u>Age</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
20 - 24	1	2	-	-	1	2
25 - 29	4	10	-	-	4	8
30 - 44	15	37	2	25	17	35
45 - 65	16	39	4	50	20	41
Over 65	<u>5</u>	<u>12</u>	<u>2</u>	<u>25</u>	<u>7</u>	<u>14</u>
Total	41	100	8	100	49	100

Of the eight white respondents, 6 (or three-fourths) were 45 years of age or older. However, almost one-half of the black respondents were under 45 years of age.

Age of the spouse is presented in Table 4. Three-quarters of the respondents reported their spouse was between the ages of 30 and 44. The spouses fell in this age bracket in all the white households, and 69 percent of the black families.

Table 4. Age of Spouse by Race

<u>Age</u>	<u>Black Spouses</u>		<u>White Spouses</u>		<u>All Spouses</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
20 - 24	-	-	-	-	-	-
25 - 29	3	23	-	-	3	19
30 - 44	9	69	3	100	12	75
45 - 65	<u>1</u>	<u>8</u>	<u>-</u>	<u>-</u>	<u>1</u>	<u>6</u>
Total	13	100	3	100	16	100

None of the respondents had advanced education beyond high school. (See Table 5) There were several respondents who had no formal education. There were some who did not have any knowledge of their spouse's educational attainment. Approximately 41 percent of the total sample had some high school education. This included over one-third of the white respondents and 41 percent of the blacks. Over one-half of the respondents did not have any education beyond the eighth grade. When asked about the education of their spouse, almost

Table 5. Educational Attainment of Household Head and Spouse by Race

<u>Educational Level</u>	<u>Black Respondents</u>				<u>White Respondents</u>			
	<u>Head</u>		<u>Spouse</u>		<u>Head</u>		<u>Spouse</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
High School								
4 years	8	19	3	23	1	12	1	33
1-3 years	9	22	5	38	2	25	2	67
Grade School								
8 years	12	29	3	23	-	-	-	-
5-7 years	5	12	2	15	2	25	-	-
1-5 years	2	5	-	-	2	25	-	-
0 years	2	5	-	-	1	12	-	-
Do not know	<u>3</u>	<u>7</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>
Total	41	100	13	100	8	100	3	100

\*Percentages may not equal 100 due to rounding.

three-fourths of the respondents reported some high school education, while less than one-third had 5-8 years of schooling.

Practically all of the respondents' jobs could be grouped into the same occupational category. Ten black household heads were unemployed at the time of the interview. Thirteen were employed as factory workers, while the remainder were employed in such occupations as janitor, construction worker, city employee and machinist. In ten of the thirteen black families, the spouse was classified as a housewife. For the eight white respondents such occupations as fireman and factory worker were reported. One respondent was retired, another unemployed, and another disabled. In the three families reporting an occupation for the spouse, two considered themselves as housewives and one a factory worker.

#### NEEDS

Montgomery (23), in writing about housing, has stressed the importance of certain basic human needs which should be met for all housing residents, whether they live in public or private housing. To test Hypotheses 2 and 3, which related to the meeting of four of these needs in public and Turnkey III housing, it was necessary to divide the Housing Project Solidarity and Rating Scales into two parts. The first page of the questionnaire, which will be referred to in the following discussion as Part I, was used to assess the need to relate to others and the need for a sense of place or rootedness. The second page, or Part II in the discussion, was used to investigate the needs for creative outlets and social and psychological stimulation.

The range of the possible scores for Part I went from 17 - 85 and for Part II from 8 - 32. For purposes of analysis, raw scores were categorized as "adequate", "barely adequate", or "inadequate" regarding the meeting of the selected needs according to the following system arbitrarily selected by the investigator. Scores which fell in the lowest third of the range (39 and below for Part I, 15 or below for Part II) were classified as "inadequate". Those scores in the highest third (63 and above for Part I, 24 and above for Part II) were classified as "adequate", while those falling in the middle third were classified as "barely adequate". Tables 6 and 7 show the distribution of responses to Parts I and II by race.

In Part I, only 2 black respondents' and 1 white respondent's need scores were designated as "adequate". This accounted for only 6 percent of the total sample's scores, with a mean score for the category of 64.6.

Almost 90 percent of the total sample's scores were classified in the "barely adequate" group under Part I, with a mean score for the group of 52.2. This category included three-fourths of the white respondents and all but four of the forty-one black respondents.

Under the group labeled "inadequate", 6 percent of the total sample was distributed, with a mean score of 34.6 for the category. Only 2 of the black respondents and 1 of the white respondents were in this group.

For Part II, over one-third of the black families' scores and three-fourths of the white respondents' scores were categorized as "adequate". Of the total sample, 47 percent were distributed in this



Table 6. Degree to Which Need to Relate to Others and Need for a Sense of Place or Rootedness were Being Met by Public and Turnkey III Housing

	<u>Adequate</u> (63-85)		<u>Barely Adequate</u> (40-62)		<u>Inadequate</u> (17-39)	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Black Respondents	2	5	37	90	2	5
White Respondents	<u>1</u>	<u>12.5</u>	<u>6</u>	<u>75</u>	<u>1</u>	<u>12.5</u>
All Respondents	3	6	43	88	3	6

Table 7. Degree to Which Needs for Creative Outlets and Social and Psychological Stimulation were Being Met by Public and Turnkey III Housing

	<u>Adequate</u> (24-32)		<u>Barely Adequate</u> (16-23)		<u>Inadequate</u> (8-15)	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Black Respondents	17	41	20	49	4	10
White Respondents	<u>6</u>	<u>75</u>	<u>1</u>	<u>12.5</u>	<u>1</u>	<u>12.5</u>
All Respondents	23	47	21	43	5	10

group, which had a mean score of 26.8.

Almost one-half of the blacks' need scores were grouped under "barely adequate", along with one white family. This represented 43 percent of the total sample. The mean score for this category was 20.5.

One-tenth or 4 of the black respondents' need scores, as well as 1 of the white respondent's need scores were categorized as "inadequate". Of the total sample one-tenth was judged "inadequate", with a mean score of 11.4 for the group.

In order to determine if there were any significant differences between the scores of black families and the scores of white families distributed in the three groups of "adequate", "barely adequate", and "inadequate", chi square analysis was performed on Parts I and II. For Part I, a  $X^2$  value of 1.2513,  $df=2$ , was obtained, which was not significant at the  $p < .05$  level of confidence. This also held true for Part II, where a  $X^2$  value of 2.766,  $df=2$ , was obtained. Since differences related to race were not significant, the following discussion will relate to the sample of public and Turnkey III housing residents as a whole, rather than grouping the respondents by race.

Differences did exist for the total sample in demographic and selected housing characteristics of the three groups relative to their categorization in Parts I and II. Table 8 indicates the percentage of those within each group exhibiting the selected characteristics. A greater percentage of those in the "adequate" group were married, older, had lived in their residence longer, were generally more satisfied with their residence, had more of their expectations met, and had less education than those in the "barely adequate" group. In comparison, more of those categorized in the "inadequate" group were unmarried, did not have expectations met, and were dissatisfied with their present housing. The major differences which showed up in the "barely adequate" group indicated a greater proportion were satisfied, under 45 years of age, and had more formal education than in the other groups.

A similar analysis is given in Table 9 for Part II. In Part II, a greater proportion of respondents in the "adequate" group were completed, a "r" of 0 was obtained, indicating that no significant degree

Table 8. Selected Demographic and Housing Characteristics of Residents Categorized in Three Groups Under Part I

<u>Characteristic</u>	<u>Adequate Percentage</u>	<u>Barely Adequate Percentage</u>	<u>Inadequate Percentage</u>
Married	66	33	-
Unmarried	33	67	100
Expectations			
Met	100	76	33
Unmet	-	24	67
Length of Residence			
Old (over 2 yrs.)	66	58	66
New (2 yrs. or under)	33	42	33
Degree of Satisfaction with present Residence			
Satisfied	66	81	-
Dissatisfied	33	19	100
Age			
Under 45	-	51	-
45 or over	100	49	100
Education			
4 yrs. High School	-	21	-
8 yrs. - 3 yrs. High School	33	49	33
Under 8 yrs.	33	25	66
Unknown	33	5	-
Size of Household			
6 or less	66	83	100
more than 6	33	17	-

Table 9. Selected Demographic and Housing Characteristics of Residents Categorized in Three Groups Under Part II

<u>Characteristic</u>	<u>Adequate</u> Percentage	<u>Barely Adequate</u> Percentage	<u>Inadequate</u> Percentage
Married	39	24	40
Unmarried	61	76	60
Expectations			
Met	87	71	60
Unmet	13	29	40
Length of Residence			
Old (Over 2 yrs.)	43	76	60
New (2 yrs. and under)	57	24	40
Degree of Satisfaction with Present Residence			
Satisfied	91	71	80
Dissatisfied	9	29	20
Age			
Under 45	48	43	40
45 and over	52	57	60
Education			
4 yrs. High School	26	14	-
8 yrs. - 3 yrs. High School	52	48	20
Under 8 yrs.	22	19	80
Unknown	-	19	-
Size of Household			
6 or less	78	90	60
More than 6	22	10	40

satisfied with their present residence as compared to the other groups, as well as having more of their expectations met. Families classified under "barely adequate" generally were smaller, were more dissatisfied with their housing, and were considered as longer term residents of public and Turnkey III housing than those in other groups. Those in the "inadequate" group were generally older and less educated than those in the "adequate" and "barely adequate" groups. A greater percentage of married respondents also fell within that category.

To test Hypotheses 2 and 3, a scatter diagram analysis was performed on Parts I and II to determine whether there was any relationship between the scores the sample received on Part I and the scores obtained on Part II. Table 10 gives the number of respondents whose scores were classified as "adequate", "barely adequate", and "inadequate" for the scatter diagram analysis. It was interesting to note that almost half of the sample who had scored "barely adequate" on Part I, had "adequate" scores on Part II. After the analysis was

Table 10. Scatter Diagram Analysis for Scores on Parts I and II

<u>Part II</u>	<u>Part I</u>		
	Adequate	Barely Adequate	Inadequate
Adequate	2	20	2
Barely Adequate	1	18	1
Inadequate	0	5	0

of relationship existed between the two sets of scores.

The items in Part I of the Housing Project Solidarity and Rating Scales were used to test Hypothesis 3, which related to the meeting of the need for a sense of place or rootedness and the need to relate to others. Table 11 shows the percentage of respondents answering the questions from "strongly agree - strongly disagree". The questions pertaining to the need for a sense of place or rootedness were numbers 1, 4, 6, 7, 10, 12, 14, 15, 16, and 17. Those representing the need to relate to others were numbers 2, 3, 5, 8, 9, 11, and 13. (See Appendix I for Questionnaire) Each question was treated separately, and a mean score from the scores of all respondents was obtained for each particular question.

In order to quickly identify areas of needs which were lacking in the housing projects, the questions were rank ordered by mean score (Table 12). A value of 5.0 was given the most desirable answer, regardless of whether the question was asked in a positive or negative manner. A rank of 3.0, then, indicated indifference about that particular area of project life. Any rank lower than 3.0 indicated an area which needed improvement and which contributed to inadequate fulfillment of needs.

According to the data in Table 12, there appeared to be a definite lack in the fulfillment of the need for a sense of place or rootedness. The area needing the greatest improvement was the responsibility of parents toward their children and their activities. Parents did not seem to be able to keep their children under control;

Table 11. Part I: Answers of Respondents to Questions by Percentage

Questions	S. Agree Percent- age	Agree Per- cent- age	Indifferent Percentage	Disagree Percent- age	S. Disagree Percentage	Total Per- cent- age
1	10	67	6	12	5	100
2	-	33	20	45	2	100
3	-	47	22	29	2	100
4	-	29	14	43	14	100
5	-	53	10	33	4	100
6	-	27	16	45	12	100
7	-	31	29	38	2	100
8	-	29	47	24	-	100
9	-	53	31	14	2	100
10	-	29	16	51	4	100
11	-	51	10	35	4	100
12	-	27	27	42	4	100
13	-	24	39	37	-	100
14	4	39	14	35	6	100*
15	-	37	27	37	-	100*
16	4	73	6	12	4	100*
17	4	73	10	10	2	100*

\*Percentages may not add to 100 because of rounding

Table 12. Part I: Questions and Corresponding Rank Orders

<u>Questions</u>	<u>Mean</u>	<u>Rank</u>
1	3.67	1.5
17	3.67	1.5
16	3.61	1.5
2	3.38	4
9	3.34	5
3	3.14	6
5	3.12	7
11	3.08	8
8	3.04	9
14	3.00	10.5
15	3.00	10.5
7	2.87	12.0
13	2.84	13.0
12	2.75	14.0
10	2.69	15.0
4	2.57	16.5
6	2.57	16.5

they did not teach their children to respect other people's rights and property; and they were unconcerned about the activities of their children as long as they stayed out of trouble and out of their way. In addition, people did not work together to get things done for the project.



All of the above indicated a lack of commitment to the housing project, or a sense of place or rootedness. The need to relate to others seemed to be met fairly well, except for a feeling that residents were excessively critical of one another.

In order to see whether these same areas were lacking in all projects, similar analyses were performed on the data from each of the seven housing projects under investigation. (See Table 13) It appeared that people living in Morgan Courts, Daniel Brooks Annex, and Turnkey III housing had both these needs met to a much greater extent than families living in the other projects. Carson Stout, Clara Cox, Daniel Brooks, and Cedar Street appeared to have more areas needing improvement relative to both the need to relate to others and the need for a sense of place or rootedness. Again, areas which involved parental guidance and supervision of children were most in need of improvement. In addition, residents of these projects found it difficult to make real friends. They believed that people were generally critical of others and gave you a bad name if you insisted on being different; that people did not mind their own business; and that they were impolite and rude to other residents, as well as thinking they were better than anyone else. All this indicated a definite need to improve interpersonal relations among project residents.

On the basis of the above findings, Hypothesis 3 was rejected. Great differences were found between the criteria representing an environment supporting the need to relate to others and the need for a sense of place or rootedness and what was actually available in the

Table 13. Part I: Means and Ranks of Questions for Seven Housing Projects Under Investigation

<u>Carson Stout</u>			<u>Morgan Courts</u>			<u>Clara Cox</u>			<u>Daniel Brooks</u>			<u>Cedar Street</u>			<u>Daniel Brooks Annex</u>			<u>Turnkey</u>		
<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>
16	3.85	1	1	4.83	2	3	3.53	1	16	3.83	1	1	5.00	1	1	4.00	4.5	17	4.17	1
17	3.71	2	16	4.83	2	1	3.40	2	17	3.75	2	4	4.00	4	2	4.00	4.5	5	4.00	2
9	3.43	3	17	4.83	2	9	3.13	3	1	3.67	3	12	4.00	4	5	4.00	4.5	1	3.83	4.5
1	3.42	4	14	4.33	4	7	3.07	4	3	3.25	4.5	14	4.00	4	10	4.00	4.5	9	3.83	4.5
14	3.14	5	9	4.17	5	13	3.00	5	9	3.25	4.5	16	4.00	4	11	4.00	4.5	15	3.83	4.5
5	2.85	7	8	3.83	6.5	5	2.93	7	8	3.17	6.5	17	4.00	4	15	4.00	4.5	16	3.83	4.5
12	2.85	7	15	3.83	6.5	16	2.93	7	11	3.17	6.5	8	3.00	7.5	16	4.00	4.5	10	3.67	8
13	2.85	7	2	3.50	8.5	17	2.93	7	5	3.08	9	13	3.00	7.5	17	4.00	4.5	11	3.67	8
8	2.71	9	11	3.50	8.5	11	2.87	9	7	3.08	9	2	2.00	12.5	3	3.50	11	13	3.67	8
11	2.57	10.5	5	3.33	11	10	2.83	10	15	3.08	9	5	2.00	12.5	4	3.50	11	3	3.33	11
3	2.57	10.5	7	3.33	11	8	2.80	11	2	3.00	11.5	6	2.00	12.5	6	3.50	11	4	3.33	11
10	2.43	13	12	3.33	11	2	2.73	12	14	3.00	11.5	7	2.00	12.5	8	3.50	11	12	3.33	11
2	2.43	13	6	3.17	13	12	2.67	13.5	10	2.83	13	9	2.00	12.5	12	3.50	11	6	3.17	13.5
7	2.43	13	3	3.00	14.5	14	2.67	13.5	6	2.67	14	10	2.00	12.5	7	3.00	15.5	8	3.17	13.5
4	2.28	15	4	3.00	14.5	15	2.53	15	13	2.58	15	11	2.00	12.5	9	3.00	15.5	14	3.00	15
15	2.25	16	13	2.83	16	6	2.47	16	4	2.50	16	15	2.00	12.5	13	2.50	16.5	2	2.67	16
6	1.71	17	10	2.67	17	4	2.20	17	12	2.33	17	3	1.00	17.0	14	2.50	16.5	7	2.50	17

housing projects to meet these needs.

A similar analysis was conducted for Part II which assessed the need for creative outlets and social and psychological stimulation. Table 14 indicates the proportion of respondents answering "good", "fair", "poor", or "no opinion" to the individual questions on Part II. No one area had an overwhelming majority of respondents' answers. For Part II, the responses to the questions were given the following point values: good - 4; fair - 3; poor - 2; no opinion - 1. A score was obtained for all respondents based on their answers to each of the eight questions. The scores for each question were totaled and a mean score was determined for the total sample. The rank ordering of questions and their means are shown in Table 15. Most of the answers to all questions fell between the "fair" and "good" categories. Scores which were ranked 4 or above (4, 3, 2, 1) indicated areas of project life that were adequate in meeting the needs under investigation. Those scores ranked 5 or below (5, 6, 7, 8) indicated areas which were lacking in the housing project.

Because the two needs under investigation in Part II were so closely related and dependent upon the same areas of project life, all questions on Part II were analyzed together. The area which appeared to be lacking, overall, for the sample was in tenant participation in organized groups. These groups were defined as those which gave attention to each important project need; thereby leading to the advancement of all the residents. In addition, residents felt that there were not enough supervised playgrounds and areas for outdoor

Table 14. Part II: Respondents' Answers to Questions by Percentage

<u>Question</u>	<u>Good</u> Percentage	<u>Fair</u> Percentage	<u>Poor</u> Percentage	<u>No opinion</u> Percentage	<u>Total</u> Percentage
1	41	39	4	16	100
2	29	41	12	18	100
3	10	25	49	16	100
4	37	12	29	22	100
5	37	24	10	29	100
6	51	27	8	14	100
7	51	25	14	10	100
8	33	25	20	22	100

Table 15. Part II: Questions and Corresponding Rank Orders

<u>Question</u>	<u>Means</u>	<u>Rank</u>
7	3.16	1
6	3.14	2
1	3.04	3
2	2.75	4
5	2.69	5
4	2.63	6.5
8	2.63	6.5
3	2.28	6.5

activities, and that they did not have the opportunity to take part in arts, crafts, and other hobbies in the project.

To get a more detailed picture of how well these needs were being met, similar analyses were performed for each housing project. Table 16 indicates the questions, means, and corresponding ranks for each housing project under investigation. Questions 2, 3, 4, 5, and 8 were consistently ranked 5 or below, which meant those areas were lacking in almost every housing project. Morgan Courts, Cedar Street, Daniel Brooks Annex and Turnkey III projects all appeared to be better equipped to fulfill the needs for creative outlets and social and psychological stimulation than the older housing projects under investigation. However, overall, residents did experience differences in the degree to which these needs were met, with some projects lacking in some areas and not so much in others. For this reason, Hypothesis 2 was also rejected.

Table 16. Part II: Means and Ranks of Questions for Seven Housing Projects Under Investigation

<u>Carson Stout</u>			<u>Morgan Courts</u>			<u>Clara Cox</u>			<u>Daniel Brooks</u>			<u>Cedar Street</u>			<u>Daniel Brooks Annex</u>			<u>Turnkey III</u>		
<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>	<u>Q</u>	<u>M</u>	<u>R</u>
1	2.71	1	6	4.00	1	2	2.67	1.5	1	3.33	1	4	4.00	2	1	4.00	2	7	4.00	1
3	2.43	2	1	3.83	2.5	6	2.67	1.5	7	3.25	2	6	4.00	2	7	4.00	2	5	3.83	2.5
6	2.28	3	7	3.83	2.5	7	2.47	3	6	3.00	3	7	4.00	2	8	4.00	2	6	3.83	2.5
2	2.14	5	2	3.33	4	4	2.33	4	5	2.92	4	1	3.00	4	2	3.50	4	8	3.67	4
7	2.14	5	5	3.17	5	1	2.13	5.5	4	2.50	5.5	2	3.00	4	4	3.00	4	4	3.33	5
8	2.14	5	8	3.00	6	5	2.13	5.5	8	2.50	5.5	8	3.00	4	3	2.50	7	1	3.17	6
4	1.86	7	4	2.50	7	8	2.07	7	2	2.42	7	3	2.00	7	5	2.50	7	2	2.83	7
5	1.71	8	3	2.17	8	3	1.80	8	2	2.25	8	5	1.00	8	6	2.50	7	3	2.67	8

It was interesting to note that the four basic housing needs under investigation were really very dependent upon one another. The fact that parents were unconcerned about the activities of their children could be due to the lack of supervised playgrounds and areas for outdoor activities which was expressed on Part II. Also, the feeling that friends were hard to find and keep could be reflected in the lack of tenant participation in organized groups and the inadequate opportunities to take part in arts, crafts, and other hobbies in the project. These kinds of activities could, at least, provide an opportunity for residents to meet people with the same type of interests.

Montgomery's (23) analysis of housing needs seems to be supported by the evidence that these essentials in housing are in many instances inter-related and dependent upon the same areas of project life. If there is a lack in one need, there may well be another need which likewise is unfulfilled.

In addition to the analysis of the data described above, Spearman Rho Rank Correlations were performed on the ranks of the means for the questions on Parts I and II. The ranks of the questions for each housing project were paired against the ranks of the questions for every other housing project. The resulting "Rho" values then determined what similarities or correlations, if any, existed between housing projects in the way sample respondents answered the questions. For Part I, significant values were found between the pairs of housing projects indicated in Table 17. There was a good deal of similarity

Table 17. Part I: Spearman Rho Correlations Between Housing Projects

	<u>Carson Stout</u>	<u>Daniel Brooks</u>	<u>Cedar Street</u>	<u>Clara Cox</u>	<u>Daniel Brooks Annex</u>	<u>Turnkey III</u>	<u>Morgan Court</u>
Carson Stout		.63 <sup>a</sup>	.56 <sup>a</sup>	.63 <sup>a</sup>	.03	.52 <sup>a</sup>	.83 <sup>a</sup>
Daniel Brooks	.63 <sup>a</sup>		.09	.63 <sup>a</sup>	.37	.50 <sup>a</sup>	.70 <sup>a</sup>
Cedar Street	.56 <sup>a</sup>	.09 <sup>a</sup>		.07	.11	.23	.51 <sup>a</sup>
Clara Cox	.63 <sup>a</sup>	.63 <sup>a</sup>	.07		.03	.34	.15
Daniel Brooks Annex	.03	.37	.11	.03		.53 <sup>a</sup>	.28
Turnkey III	.52 <sup>a</sup>	.50 <sup>a</sup>	.23	.34	.53 <sup>a</sup>		.37
Morgan Courts	.83 <sup>a</sup>	.70 <sup>a</sup>	.51 <sup>a</sup>	.15	.28	.37	

\* Significant at the  $p < .05$  level of confidence when  $N=16$ .



between the various housing projects and the way in which respondents answered the questions pertaining to human needs in housing. This would tend to support findings in Part I where the same areas of need fulfillment were lacking in all projects. High degrees of correlation were found between Daniel Brooks, Carson Stout, Clara Cox, and Morgan Courts. This cluster effect could have been due to the fact that with the exception of Clara Cox, the other three housing projects were predominantly non-white. In addition, these housing projects were representative of the older complexes, with Morgan Courts being the newest of the three. Also, these projects consisted of apartment units and were larger than the other projects under investigation, with the exception of Turnkey III.

Table 18 shows the pairs of housing projects which had significant values for Part II. From this information, it was believed that projects did not experience as much similarity for Part II, as they did for Part I.

In analyzing needs, three other factors were examined to see if there was any significant relationship existing between them and the degree to which needs were met. The three factors were: length of residence, size of household, and marital status. In analyzing these factors, raw scores already distributed in the established categories of "adequate", "barely adequate", and "inadequate" were used.

For purposes of analysis, length of residence was divided into categories of "0 up to 3 years", "3 years up to 6 years", and "6 years or more". Chi square values were found for the total sample in Parts I and II. Values obtained were respectively:  $\chi^2 = 2.050$ ,  $df = 4$ , for

Table 18. Part II: Spearman Rho Correlations Between Housing Projects

	<u>Carson Stout</u>	<u>Daniel Brooks</u>	<u>Cedar Street</u>	<u>Clara Cox</u>	<u>Daniel Brooks Annex</u>	<u>Turnkey III</u>	<u>Morgan Court</u>
Carson Stout		.20	.58	-.12	.15	-.41	.29
Daniel Brooks	.15		.40	.28	.40	.63	.77 <sup>a</sup>
Cedar Street	.58	.40		.66 <sup>a</sup>	.55	.34	.49
Clara Cox	-.12	.28	.66 <sup>a</sup>		.07	.36	.69 <sup>a</sup>
Daniel Brooks Annex	.15	.40	.55	.07		.14	.21
Turnkey III	-.41	.63	.34	.36	.14		.52
Morgan Courts	.29	.77 <sup>a</sup>	.49	.69 <sup>a</sup>	.21	.52	

\* Significant at the  $p < .05$  level of confidence when  $N=8$ .

Part I, and  $X^2 = 9.73$ ,  $df = 4$ , for Part II. The latter value was significant at the  $p < .05$  level of confidence, indicating there was some relationship between the degree to which the needs for creative outlets and social and psychological stimulation were met and the length of residence of the respondents.

For purposes of chi square analysis, number of household members was separated into the categories of "6 or more", "3 - 5", and "2 or less". Chi square values for the total sample were again obtained for Parts I and II. The respective values were:  $X^2 = 4.149$ ,  $df = 4$ , for Part I, and  $X^2 = 5.920$ ,  $df = 4$ , for Part II. These were not significant at the  $p < .05$  level and, therefore, it was concluded that no relationship existed between size of household and the degree to which needs were met.

The final factor to be investigated was marital status. For purposes of analysis, marital status was collapsed into two groups - one representing all married respondents and the other all unmarried respondents. Of the total sample, thirty-three percent were married and sixty-seven percent unmarried. Approximately thirty-eight percent of the white respondents were married, while sixty-two percent were unmarried. Of the black families, thirty-two percent were married, and sixty-eight percent unmarried. In applying chi square analysis to Parts I and II, a value of 3.0,  $df = 4$ , was obtained for Part I and a value of 1.67,  $df = 4$ , for Part II. Both of these values were not significant at the  $p < .05$  level of confidence. It was concluded that no relationship existed between marital status of the respondents and the degree to which their needs were being met.

## EXPECTATIONS

Residents of public and Turnkey III housing do have expectations about the characteristics provided in this housing. Fifteen internal and external product characteristics were selected for investigation in this study. Respondents were asked to answer "yes" if, prior to moving into public and Turnkey III housing, they expected a particular characteristic to be available, and "no" if they did not expect it. Table 19 shows the number and percentage of respondents expecting each product characteristic studied.

More than one-half of the black respondents expected nine of the fifteen characteristics to be included in their homes when they moved in. The characteristics expected most were, in order of frequency mentioned: play areas for children, closet doors, central heat, and paved walks and driveways. Those least expected were a dining room and shelter for automobiles.

Over one-half of the white respondents expected six of the fifteen characteristics to be available in their homes upon arrival. The characteristics most expected were: play areas for children, paved walks and driveways, play areas for teenagers, and central heating. Those least expected were a family room, shelter for automobiles, and a dining room.

The characteristics most and least expected by black and white respondents were very similar. Over one-half of the forty-nine member sample expected eight of the fifteen characteristics to be included in their homes at the time they moved in. Those most expected were play

Table 19. Expectations of Availability of Selected Internal and External Product Characteristics in Public and Turnkey III Housing

<u>Characteristics</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Paved walks and driveways	31	76	7	88	38	77
Dining room	5	12	1	12	6	12
Porch lights	27	66	3	38	30	61
Showers	13	32	3	38	16	33
Shelter for automobiles	6	15	-	-	6	12
Closet doors	32	78	4	40	36	73
Family room	13	32	-	-	13	26
Day care center	22	54	1	12	23	47
Play areas for children	38	93	7	88	45	92
Play areas for teenagers	24	59	6	75	30	61
Shade trees	22	54	3	38	25	51
Separated child-adult areas	13	32	2	25	15	31
Space for washer	27	66	3	38	30	61
Porch	16	39	4	50	20	41
Central heat	31	76	6	75	37	76

areas for children, paved walks and driveways, central heat, and closet doors. Those least expected by all families were a dining room and shelter for automobiles.

To test Hypothesis 1, which stated that there is no difference between the internal and external product characteristics of existing public and Turnkey III housing and the characteristics expected by the residents, it was necessary to compile a list of those product characteristics that were actually available in each of the seven housing projects under investigation. To determine whether expectations had been met, each respondent's expectations were compared to those characteristics existing in his respective housing project. A percentage figure of expectations filled was found for each respondent. Table 20 shows the characteristics existing in each respective housing project. Table 21 shows the distribution of respondents relative to the degree to which their expectations were met.

Seventy-five percent of the total sample had one-half or more of their expectations met, while 8 percent were totally met. Three-fourths of the white respondents had one-half or more of their expectations met, while one-fourth were fully met. Over one-half of the 41 black respondents had more than one-half their expectations met, while only 5 percent of these families had their expectations completely met. One black respondent's expectations were completely unmet. Hypothesis 1 was rejected since there was a difference between the existing product characteristics of public and Turnkey III housing projects and those the residents expected to be available at the time they moved in.

Table 20. Availability of Selected Product Characteristics in the Housing Projects Under Investigation

<u>Characteristics</u>	<u>Projects</u>						
	<u>Clara Cox</u>	<u>Carson Stout</u>	<u>Morgan Courts</u>	<u>Daniel Brooks</u>	<u>Cedar Street</u>	<u>Daniel Brooks Annex</u>	<u>Turnkey III</u>
Paved walks and driveways	x	x	x	x	x	x	x
Dining room							
Porch lights		x	x		x	x	x
Showers							x
Shelter for automobiles							
Closet doors			x				x
Family room							
Day care center							
Play areas for children	x	x	x	x	x	x	x
Play areas for teenagers	x			x			
Shade trees	x			x	x		
Separated child-adult areas							
Space for washer	x	x	x	x	x	x	x
Porch	x	x	x	x	x	x	x
Central heat		x	x		x	x	x

Table 21. Degree to Which Respondents' Expectations were Met

	<u>Expectations Partially Met</u>							
	<u>Met</u>		<u>50%</u>		<u>Under 50%</u>		<u>Unmet</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Black Respondents	2	5	27	66	11	17	1	2
White Respondents	2	25	6	75	-	-	-	-
All Respondents	4	8	33	67	11	22	1	2

Sixty-three percent of the total sample held between six and ten expectations. (See Table 22) Almost 25 percent had between one and five, while 12 percent held between eleven and fifteen expectations. White families did not have as many expectations as black families. Thirty-seven percent held one to five, while 62 percent held between six and ten. Sixty-three percent of black families held between six and ten expectations, 22 percent between one and five, and 15 percent

Table 22. Number of Expectations Held by Respondents

	<u>Number of Expectations Held</u>					
	<u>1 - 5</u>		<u>6 - 10</u>		<u>11 - 15</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Black Respondents	9	22	26	63	6	15
White Respondents	3	38	5	62	-	-
All Respondents	12	25	31	63	6	12



between eleven and fifteen. Only black families expected between eleven and fifteen of the selected product characteristics. The mean number of expectations held by the total sample was 7.5, while the means for black and white families respectively were 7.7 and 6.2.

#### HOUSING SATISFACTION

In Chapter 3, it was noted that satisfaction with housing may be influenced by such variables as length of residence and size of household. To determine the respondents' degree of satisfaction with their present housing, a question was asked requesting the resident to respond on a scale ranging from "very satisfied" to "very dissatisfied". Table 23 presents the residents' degree of housing satisfaction. Of the total sample, over three-fourths expressed some degree of satisfaction with their present housing. This included one-half of the white respondents and over 80 percent of the black families.

Table 23. Expressed Degree of Housing Satisfaction as Reported by the Residents

Degree of Satisfaction	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Very satisfied	2	5	1	12	3	6
Satisfied	19	46	2	25	21	43
Barely satisfied	13	32	1	12	14	29
Dissatisfied	6	15	2	25	8	16
Very dissatisfied	<u>1</u>	<u>2</u>	<u>2</u>	<u>25</u>	<u>3</u>	<u>6</u>
Total	41	100	8	100	49	100

\*Percentages may not equal 100 due to rounding.

Because of the number of responses that residents could express about their housing satisfaction, the responses were collapsed for purposes of analysis into two groups of "satisfied" and "dissatisfied". The residents expressing themselves as "very satisfied", "satisfied", and "barely satisfied" were grouped into the "satisfied" category. Those who expressed themselves as "dissatisfied" or "very dissatisfied" were termed "dissatisfied". Table 24 reports the results of this analysis. Overall, 77 percent of the total sample expressed some degree of satisfaction with their residence, while 23 percent had shown some dissatisfaction with theirs.

Table 24. Residents Expressing Satisfaction or Dissatisfaction with Their Residence

<u>Degree of Satisfaction</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Satisfied	34	83	4	50	38	77
Dissatisfied	<u>7</u>	<u>17</u>	<u>4</u>	<u>50</u>	<u>11</u>	<u>23</u>
Total	41	100	8	100	49	100

To determine if length of residence had any relationship to expressed degree of satisfaction, a chi square analysis was performed. Table 25 shows the breakdown of length of residence in terms of old and new residents. Old residents were considered to be those who had lived in the housing project longer than two years. New residents were those who had moved in within the last two years. Of the forty-nine respondents, 59 percent were considered to be old residents of public

Table 25. Old or New Residents of Public Housing by Race

<u>Length of Residence</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Old (over 2 years)	24	59	5	63	29	59
New (2 years and under)	<u>17</u>	<u>41</u>	<u>3</u>	<u>37</u>	<u>20</u>	<u>41</u>
Total	41	100	8	100	49	100

and Turnkey III housing, whereas 41 percent were considered to be new residents. Using a 2x2 design, chi square values were obtained for the total sample and separately for black and white families. The values obtained were respectively:  $\chi^2 = 0$ ,  $\chi^2 = .1149$ , and  $\chi^2 = 0$ . None of these were significant at the  $p < .05$  level of confidence. Therefore, it was found that no significant relationship existed between length of residence and expressed degree of housing satisfaction.

The next variable to be investigated was size of household. (See Table 26) More than one-third of the total sample had either one, two, five, or six household members. About one-fifth had either three or four. Black families had the greatest number of household members with 22 percent having between seven and ten. One reason for the small number of household members for white families was that a majority of these respondents were elderly persons living by themselves.

For purposes of analyzing relationships that may have existed between housing satisfaction and size of household, household size was divided into those families having over five members and those with five

Table 26. Size of Household by Race

Number of Members	Black Respondents		White Respondents		All Respondents	
	No.	Percentage	No.	Percentage	No.	Percentage
1 - 2	10	24	5	63	15	31
3 - 4	9	22	1	12	10	20
5 - 6	13	32	2	25	15	31
7 - 8	5	12	-	-	5	10
9 - 10	<u>4</u>	<u>10</u>	<u>-</u>	<u>-</u>	<u>4</u>	<u>8</u>
Total	41	100	8	100	49	100

or fewer members. Upon collapsing these frequencies, thirty-five percent of the forty-nine member sample had six or more members, while thirty-nine percent of the blacks and twenty-five percent of the whites had over five members.

Again, chi square values were obtained for the total sample and separately for the black and white respondents. The corresponding values were:  $X^2 = .2084$ ,  $X^2 = .3886$  and  $X^2 = .6666$ . None of these were significant at the  $p < .05$  level of confidence. Therefore, no significant relationship was found to exist between size of household and degree of expressed housing satisfaction.

Another relationship examined was in regard to needs that were met and whether this had any effect on expressed degree of housing satisfaction. To obtain a score for needs, the raw scores of Part I and II were combined. The scores were then grouped into two categories. Those respondents having a combined score over 62 were said to have

had their needs met. Those with a score of 62 or below were lacking fulfillment of needs. Table 27 shows the number of respondents in each of these categories. Eighty-six percent of the total sample had a score above 62, which theoretically meant their needs were being met. Eighty-eight percent of the black families had scores above 62, as did 75 percent of the white families.

Table 27. Combined Raw Need Scores of Respondents

<u>Scores</u>	<u>Black Respondents</u>		<u>White Respondents</u>		<u>All Respondents</u>	
	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>	<u>No.</u>	<u>Percentage</u>
Above 62	36	88	6	75	42	86
62 or Below	<u>5</u>	<u>12</u>	<u>2</u>	<u>25</u>	<u>7</u>	<u>14</u>
Total	41	100	8	100	49	100

As with the other chi square analysis, values were obtained for the total sample and separately for black and white families. The respective values were:  $X^2 = 14.7752$ ,  $X^2 = 11.2666$  and  $X^2 = .6666$ . The values obtained for the total sample and the black respondents were significant at the  $p < .05$  level of confidence. Therefore, it appeared that some relationship did exist between expressed degree of housing satisfaction and the extent to which housing needs are perceived as being met by public and Turnkey III housing residents. This relationship did not exist, however, for white respondents, as their  $X^2$  value of .6666 was not significant at the  $p < .05$  level. This difference between black and white families could be due to the fact that white families had a greater percentage of their converted need scores fall into the "barely adequate" and "inadequate" groups than did the black

families. In addition, a greater proportion of blacks were satisfied with their housing compared to white families which were evenly distributed in the satisfied and dissatisfied categories.

Expectations of public and Turnkey III housing residents were also examined to see if there was any relationship existing between the degree to which expectations were met and the degree of expressed housing satisfaction. For purposes of analysis, expectations were collapsed from four categories of fully met, over half met, under half met and totally unmet to two, those of met and unmet. Met expectations referred to those respondents who had 50 percent or more of their expectations fulfilled. Unmet expectations corresponded to those families who had less than half their expectations met. As for the other variables investigated, chi square values were obtained for the total sample and separately for black and white families. The values obtained were respectively:  $X^2 = .0238$ ,  $X^2 = .1694$ , and  $X^2 = 0$ . All of these were not significant at the  $p < .05$  level of confidence. Therefore, no relationship was found to exist between number of expectations met and degree of expressed housing satisfaction.

#### ADDITIONAL INFORMATION

Some of the data gathered was for purposes of providing general information about the housing situation of the family. Much of this information is pertinent to those in the field as well as to interested laymen. For this and other reasons, the responses of the total sample to the questions on the Housing Description Questionnaire will be included here.

Of the total sample, 67 percent had moved into public and Turnkey III housing within the last six years. Over two-thirds of the black respondents moved in during that time, as did one-half of the white families. Table 28 shows the distribution of respondents according to the year they first moved into public housing in High Point.

Table 28. Year in Which the Sample First Moved into Public and Turnkey III Housing

Year	Black Respondents		White Respondents		All Respondents	
	No.	Percentage	No.	Percentage	No.	Percentage
1941 - 1946	1	2	1	12	2	4
1947 - 1952	2	5	-	-	2	4
1953 - 1958	3	7	1	12	4	8
1959 - 1964	6	15	2	25	8	16
1965 - 1971	<u>29</u>	<u>71</u>	<u>4</u>	<u>50</u>	<u>33</u>	<u>67</u>
Total	41	100	8	100	49	100

\* Percentages may not equal 100 due to rounding.

None of the white respondents had lived in any project, other than the present one, but thirty-one percent of the black families had lived in two projects and five percent had lived in three. No one had lived in more than three projects. It was possible, though, for a family to have lived in more than one unit within the same project. Table 29 presents the reasons given by black residents for moving from the last project to the present one. Of the fifteen black families who had lived in more than one project, 54 percent said they had moved because they needed additional room. Twenty percent said they left

Table 29. Reasons Given by Black Respondents for Leaving Last Project

<u>Reasons</u>	<u>Black Respondents</u>	
	<u>No.</u>	<u>Percentage*</u>
Additional room	8	54
Transferred to new project	1	6
Needed less room	1	6
Urban renewal	3	20
Convenience	1	6
Other	<u>1</u>	<u>6</u>
Total	15	100

\*Percentages may not equal 100 due to rounding.

because of urban renewal, while 6 percent moved because less room was needed, they were transferred to the new project, it was more convenient, or for other reasons.

The major reason for moving into public and Turnkey III housing is given in Table 30. The three most important reasons given by black and white respondents alike were urban renewal, only housing available at price they could afford, and dissatisfaction with previous housing. A move into public and Turnkey III housing was not perpetuated by a desire to be near friends. Reasons other than those given were not volunteered by the residents.

In order to ascertain whether residents would be interested in a program of home ownership, two questions were asked to this effect. The results of the questions are presented in Tables 31 and 32. Of the black respondents, 73 percent expressed a preference for home ownership,



Table 30. Reasons for Moving into Public and Turnkey III Housing

Reasons	Black Respondents		White Respondents		All Respondents	
	No.	Percentage	No.	Percentage	No.	Percentage
Urban renewal	13	32	2	25	15	31
Wanted to be near friends	-	-	-	-	-	-
Only housing available at price we could afford	13	32	3	38	16	33
Physical disability	2	5	-	-	2	4
Dissatisfaction with previous housing	8	20	2	25	10	20
Other	<u>5</u>	<u>12</u>	<u>1</u>	<u>12</u>	<u>6</u>	<u>12</u>
Total	41	100	8	100	49	100

\*Percentages may not equal 100 due to rounding.

Table 31. Respondents' Preference to Own or Rent

Preference	Black Respondents		White Respondents		All Respondents	
	No.	Percentage	No.	Percentage	No.	Percentage
Own	30	73	7	88	37	76
Rent	<u>11</u>	<u>27</u>	<u>1</u>	<u>12</u>	<u>12</u>	<u>24</u>
Total	41	100	8	100	49	100

yet only 49 percent of them showed knowledge of an interest in the Turnkey III Program, which aids public housing residents to assume home ownership. In addition, 41 percent of the black families had a

Table 32. Respondents' Knowledge of Interest in Turnkey III Housing Program

Answers	Black Respondents		White Respondents		All Respondents	
	No.	Percentage	No.	Percentage	No.	Percentage
Yes (knowledge of and interest in)	20	49	2	25	22	45
No (knowledge of and no interest in)	17	41	-	-	17	35
Do not know (no knowledge of program)	<u>4</u>	<u>10</u>	<u>6</u>	<u>75</u>	<u>10</u>	<u>20</u>
Total	41	100	8	100	49	100

knowledge of, but no interest in the Turnkey III Program. For white families, 88 percent expressed a desire to own, however, three-fourths of them had no knowledge of the Turnkey III Program leading to home ownership.

To determine something about residents' housing preferences, a question was asked about their preference for building type. (See Table 33) Of the forty-nine member sample, 86 percent showed a

Table 33. Residents' Preference for Building Type

Building Type	Black Respondents		White Respondents		All Respondents	
	No.	Percentage*	No.	Percentage*	No.	Percentage*
One-family	36	89	6	75	42	86
Duplex	3	7	1	12	4	8
Building housing more than two families	<u>2</u>	<u>5</u>	<u>1</u>	<u>12</u>	<u>3</u>	<u>6</u>
Total	41	100	8	100	49	100

\*Percentages may not equal 100 due to rounding.

preference for a one-family dwelling. This included 89 percent of the black families and three-fourths of the white families. There was an overwhelming preference for a one-family dwelling. Only 5 percent of the black respondents desired to live in a building housing more than two families; the type in which many of these families presently live.

## Chapter V

### SUMMARY AND CONCLUSIONS

Housing needs of public and Turnkey III housing residents, along with their expectations of and satisfaction with their present residence, were studied to determine whether these and other selected factors were related. A group of forty-nine families was chosen by stratified simple random sampling techniques from 801 public and Turnkey III housing units in six public housing projects and one Turnkey III development in High Point, North Carolina. Of these forty-nine sample households, forty-one were black and eight were white. Personal interviews were conducted with respondents by knocking on doors of units in an order predetermined by random sampling methods.

Each personal interview averaged from twenty to thirty minutes. The four testing instruments used in the interviews were a housing description questionnaire, a housing project solidarity and rating scale, a housing expectations questionnaire, and a family description questionnaire.

Three null hypotheses were formulated for testing:

1. There is no significant difference between the selected internal and external product characteristics of existing public and Turnkey III housing and the characteristics expected by the residents.
2. There is no difference between the criteria representing an environment supporting the need for social and psychological

stimulation and creative outlets and what is actually available in the public and Turnkey III housing project to meet these needs.

3. There is no difference between the criteria representing an environment supporting the need for a sense of place or rootedness and the need to relate to others and the perceived satisfaction of these needs as reported by the residents.

To analyze the data, a needs score and an expectations score were obtained for all families. The principal statistical tests used were the independent  $X^2$  test of significance, scatter diagram analysis, and Spearman Rho rank correlations. The housing project solidarity and rating scales were broken down into two parts. The first part assessed the need to relate to others and the need for a sense of place or rootedness. Part II assessed the needs for creative outlets and social and psychological stimulation. All the data relating to needs was analyzed on the basis of Part I and Part II.

It was found that no significant differences relating to race were experienced among the residents for Part I and Part II. Therefore, the remainder of the data was studied for the sample as a whole, rather than grouping the respondents by race.

Need scores of residents for Parts I and II were categorized into "adequate", "barely adequate", and "inadequate" groups. Differences did exist for the total sample in the demographic and other selected housing characteristics of the three groups relative to their categorization in Parts I and II. In other words, families whose need scores were categorized under "adequate" in Part I, were generally more

satisfied with their residence, had more of their expectations met, were married, older, and had less education than those families with needs scores in the "barely adequate" group. For Part II, families classified under "adequate" were satisfied to a greater extent with their residence and had more of their expectations met than families classified in the other two groups.

To begin testing Hypotheses 2 and 3, a scatter diagram analysis was performed on the scores families had received on both Parts I and II. After the analysis was completed, an "r" of 0 was obtained, indicating there was no degree of relationship between the scores residents obtained on Part I and those they obtained on Part II.

The items in Parts I and II of the Housing Project Solidarity and Rating Scales were used to test Hypotheses 2 and 3, which pertained to the four needs under investigation. Mean scores were obtained for each question and these means were ranked in order.

For Part I, this analysis indicated that the area needing greatest improvement was the responsibility of parents toward the activities of their children. More parental control was necessary, as well as parental guidance in teaching children to respect other people's rights and property. In addition, people did not work together to get things done for the project.

All the above indicated a lack of a sense of place or rootedness among the tenants. It seemed that the need to relate to others was met fairly well for the total sample. However, in order to see if there were any differences between the respective housing projects, similar

analyses were performed on the means and ranks of questions for each project under investigation. It appeared from this analysis that people living in Morgan Courts, Daniel Brooks Annex, and Turnkey III housing had both the needs under investigation in Part I met to a much greater extent than families living in the other projects, although all projects seemed to experience a lack of parental supervision of children and their activities. Also, it seemed that there was a definite need to improve interpersonal relations among the tenants.

On the basis of the above findings, Hypothesis 3 was rejected, since the environment supporting the need to relate to others and the need for a sense of place or rootedness was different in all of the housing projects.

A similar analysis was conducted for Part II, which assessed the needs for creative outlets and social and psychological stimulation. The area which appeared to be lacking for the total sample was in tenant participation in organized groups. In addition, there were not enough supervised playgrounds and areas for outdoor activities, as well as opportunities for residents to partake in hobbies and arts and crafts. Again, after performing similar analyses on each of the housing projects, Morgan Courts, Daniel Brooks Annex, Turnkey III, and Cedar Street housing all appeared to be better equipped to fulfill the needs for creative outlets and social and psychological stimulation than the older housing projects under investigation.

To see if there was any similarity between housing projects and the way in which questions were ranked, Spearman Rho rank correlations were performed on the ranks of the questions for each

housing project against the ranks of the questions for every other housing project. As a result of this analysis, a high degree of correlation was found for Part I between Daniel Brooks, Carson Stout, Clara Cox, and Morgan Courts. Part II projects did not experience as much similarity as did those in Part I.

Three factors (marital status, size of household, length of residence) were examined to determine any relationships that might exist between them and the degree to which needs were met. No significant relationships were found to exist between marital status and needs and size of household and needs. However, there was a significant relationship between length of residence and the extent to which needs for creative outlets and social and psychological stimulation were met.

To test Hypothesis 1, which stated that there is no difference between the internal and external product characteristics of existing public and Turnkey III housing and the characteristics expected by the residents, it was necessary to compile a list of product characteristics available in the seven housing projects and then to compare them with what residents said they expected. This determined an expectations score. Over 67 percent of the total sample had more than one-half of their expectations met, while less than nine percent were totally met. Because the majority of residents did not have all their expectations met, Hypothesis I was rejected since differences did exist between the existing product characteristics and those the residents expected to be available at the time they moved in.



Degree of satisfaction with the present residence was determined by a forced-choice question on the housing description questionnaire. Three variables were examined to see if they had any effect on expressed housing satisfaction. The three variables were length of residence, size of household, and extent to which needs were met. When length of residence and size of household were examined, no significant relationships were found to exist between them and housing satisfaction. When needs were investigated, significant relationships were found to exist between the blacks' need scores and the degree to which they expressed satisfaction with their present housing. Most of the black respondents who expressed satisfaction with their housing had needs that appeared to be met. This reason also accounted for the significant relationship found to exist for the total sample. No relationship, however, was found for white families and their expressed housing satisfaction. An explanation for this could have been that white families were about equally distributed in the satisfied and dissatisfied categories, whereas blacks had a majority distributed under satisfied.

Expectations of public and Turnkey III housing residents were also examined to see if there was any relationship existing between the degree to which expectations were met and the degree of housing satisfaction. Chi square values for the total sample and for black and white respondents individually were not significant at the  $p < .05$  level.

Several conclusions were drawn from the above mentioned results in addition to other information obtained in the study.

1. Public and Turnkey III housing in High Point, North Carolina need improvement in the areas of child supervision and guidance by the

parents, interpersonal relations among tenants, and tenant participation in organized groups which are working to get things done for the project. The need for a sense of place or rootedness is greatly unfulfilled for the tenants. Criteria supporting an environment leading to fulfillment of this need were seriously lacking.

2. Expectations of public and Turnkey III housing residents were more or less in accord with what was actually provided for them in the project, although there were differences in the expectations of residents and what was available at the time they moved in. Things most desired were play areas for children and teenagers, closet doors, paved walks and driveways, and central heat.

3. Such factors as size of household and length of residence did not influence residents' expressed degree of housing satisfaction.

4. The extent to which needs are met did have an influence on the degree of housing satisfaction expressed by black families.

5. Black residents had a greater number of expectations than did white families.

6. Black families in public and Turnkey III housing had larger households than did white families.

7. A greater proportion of black families expressed some degree of satisfaction with their present residence than did white families.

8. A greater proportion of white families had lived in public housing for more than two years.

9. Black families had a greater tendency to move from one project to another for a variety of reasons.

10. Most of these residents would prefer to own their own one-family house, but more than one-half of the sample showed no knowledge of or interest in the Turnkey III Program of home ownership.

11. Dissatisfaction with previous housing, urban renewal, and availability of housing at affordable price were reasons most often given for making a move into public and Turnkey III housing.

12. More than two-thirds of the forty-nine member sample moved into public housing within the last six years.

From this investigation, it was seen that residents of public and Turnkey III housing in High Point, North Carolina, generally were satisfied with their present living situation, however they had definite basic human needs which needed to be met. The High Point Housing Authority has been known for the rapport it has been able to maintain between itself and residents of public and Turnkey III housing. A modernization program, now under way, is taking care of many of the complaints which residents have registered in the past. For these reasons, the High Point situation, in terms of public and Turnkey III housing, can be seen as more ideal than situations in other American cities. It is mainly for this reason that investigations such as the one reported here be conducted in conjunction with other housing authorities to assess their success as determined by the residents' feelings.

Because of the high proportion of blacks living in High Point public and Turnkey III housing, it is necessary to conduct research where a better representation of white families' needs and expectations

can be obtained. There has been virtually no research of this kind conducted in relation to public housing residents. Meanwhile, new projects are being constructed with meager knowledge of what future residents' needs and experiences will be. There is a vital need now for continuing research in this area, not only in the physical determinants of satisfactory housing, but in the socio-psychological functioning of the human being in an environment such as the one created by public housing.

1. Gilliam, Vincent and Lewis Brysonberg. "Relationships among Activities, Attitudes, and Behaviors: The Case of Housing for Public Housing." *Ecology and Social Research*, 1:1-2, July, 1964.
2. Gilliam, Vincent. *Housing and Health*. New York: MacMillan Company, 1965.
3. Gilliam, Vincent W. *Psychiatric Aspects*. Vol. 1. *Introduction*. New York: New York: Harper and Row, 1964.
4. Gilliam, Vincent W., George Gough and Virginia G. "An Official, Jr. Determinants and Social Psychological Factors of Residential Satisfaction." *Ecology and Social Research*, 1:1-2, July, 1964.
5. Gilliam, Vincent W. *A Future for the City*. *Journal of Applied Social Psychology*, 1964.
6. Gilliam, Vincent W. "Housing Characteristics of Work Related Satisfaction with Income Less Than \$1,000." Unpublished Doctor's thesis, University of North Carolina at Greensboro, 1964.
7. Gilliam, Vincent W. "Housing Characteristics and Psychological Satisfaction with Housing Satisfaction and Satisfaction as Related to a Group of Public Housing Units." Unpublished Doctor's thesis, Wayne State University, 1964.
8. Gilliam, Vincent. "Housing for a Just City." *The Urban Researcher*, 1:1-2, New York, 1964, July, 1964.
9. Gilliam, Vincent. *The City of Tomorrow*. New York: Macmillan, 1964.

## BIBLIOGRAPHY

1. Allen, (Lady), as referred to by Bernice Borgman in the unpublished "Housing and Children" (paper presented at the biennial conference of the National Association for the Education of Young Children, 1964, Miami Beach, Florida).
2. Back, Kurt W. Slums, Projects, and People. Durham: Duke University Press, 1962.
3. Bellen, Seymour and Louis Kriesberg. "Relationships Among Attitudes, Circumstances, and Behavior: The Case of Applying for Public Housing," Sociology and Social Research, 151: 453-469, July, 1967.
4. Beyer, Glenn H. Housing and Society. New York: MacMillan Company, 1965.
5. Boulding, Kenneth E. Economic Analysis. Vol. I: Microeconomics. 4th ed. New York: Harper and Row, 1966.
6. Butler, Edgar W., George Sabagh and Maurice D. Van Arsdol, Jr. "Demographic and Social Psychological Factors in Residential Mobility," Sociology and Social Research, 48: 139-154, January, 1964.
7. Carp, Francis M. A Future for the Aged. Austin: University of Texas, 1966.
8. Cook, Jean B. "Housing Characteristics of North Carolina Households with Income Less than \$5,000." Unpublished Master's thesis, University of North Carolina at Greensboro, 1966.
9. Evers, Norma Susan. "Housing Expenditures and Factors Associated with Housing Selection and Satisfaction as Stated by a Group of Single Catholic Adults." Unpublished Master's thesis, Oregon State University, 1969.
10. Fried, Marc. "Grieving for a Lost Home," The Urban Condition, Duhal (ed.), New York: Basic Books, Inc., 1963.
11. Fromm, Erich. The Art of Loving. New York: Bantam Books, 1963.

12. Glazer, Nathan. "Housing Policy and the Family," Journal of Marriage and the Family, 29: 140-163, February, 1967.
13. Goldstein, Margaret W. "Mental Health, Social Status, and Maslow's Need System." Unpublished Doctor's dissertation, Yeshiva University, 1967.
14. Hamilton, David. The Consumer in Our Economy. Boston: Houghton Mifflin Company, 1962.
15. Hartman, Chester W. "Social Values and Housing Orientations," Journal of Social Issues, 19: 113-131, April, 1963.
16. Hollingshead, A. B. and L. H. Rogler. "Attitudes Toward Slums and Public Housing in Puerto Rico," The Urban Condition, (Duhl, ed.), New York: Basic Books, Inc., 1963.
17. Icken, Helen Margaret. "From Shanty Town to Public Housing: A Comparison of Family Structure in Two Urban Neighborhoods in Puerto Rico." Unpublished Doctor's dissertation, Columbia University, 1962.
18. Lancaster, Kelvin J. "A New Approach to Consumer Theory," Journal of Political Economy, 74: 132-157, April, 1966.
19. Luker, Doris E. "Housing Conditions and Attitudes of Families in Camden County, Georgia." Unpublished Master's thesis, University of Georgia, 1969.
20. McConnell, Campbell R. Economics. 4th ed. New York: McGraw Hill Book Company, 1969.
21. McNeil, Charlotte Mathis. "Housing Meanings of Low-Income Area Families in Athens, Georgia, 1969." Unpublished Master's thesis, University of Georgia, 1969.
22. Miller, Delbert C. Handbook of Research Design and Social Measurement, New York: McKay, 1964.
23. Montgomery, James E. "Human Needs in Housing," Proceedings of the Economy Housing Seminar, Nebraska Center for Continuing Education, Lincoln, Nebraska: American Society of Agricultural Engineers, 1967.
24. Montgomery, James E. and Joseph E. Kivlin. "Place of Residence as a Factor in Housing Desires and Expectations," Rural Sociology, 27: 483-491, December, 1962.
25. Parr, A. E. "City and Psyche," Art and Architecture, February-March, 1965.

26. Peterson, Shirley Holwegner. "Factors Associated with Selection and Status of Non-University Rental Housing as Stated by the Wives of Undergraduate Students Attending Oregon State University." Unpublished Master's thesis, Oregon State University, 1968.
27. Poehlmann, Mary Magdalen. "Factors Contributing to Choice of Public Housing by a Selected Sample of Retired Couples in Columbus, Ohio." Unpublished Master's thesis, Ohio State University, 1967.
28. "Public Housing Uproar Grows," The Greensboro Daily News, February 15, 1971, pp. A-1 and A-11.
29. Schorr, Alvin L. "The Role of Housing Policies in Reducing Poverty." Paper read at the International Seminar on Poverty, April 3-6, 1967.
30. Smith, Ruth H. "Housing Choices as Evidenced by Residential Mobility," Journal of Home Economics, 57: 39-41, January, 1965.
31. Smith, Ruth H. et al. "Privacy and Interaction Within the Family as Related to Dwelling Space," Journal of Marriage and the Family, 31: 559-566, August, 1969.
32. Tucker, Mary E. "Selected Socio-Economic Characteristics Related to Housing Satisfaction of the Aged in the Model City Area." Unpublished Master's thesis, Iowa State University, 1969.
33. Vars, Freda Teitzel. "Factors Related to Housing Satisfaction," Journal of Home Economics, 61: 164-166, March, 1969.
34. Watts, H. L. "Living Patterns and Housing Preferences: Some neglected aspects of sociological research into housing needs," Journal of the National Institute of Personnel Research, 8: 71-, Johannesburg, 1960.
35. Wilner, Daniel M. "Effects of Housing on Health and Performance," The Urban Condition (Duhl ed.), New York: Basic Books, Inc., 1963.
36. Yaque, Juan Garcia. "Housing and Personality: Critical Inquiry into the Conditions Imposed by Housing and its Locations," Review of International Sociology, 617-634, October-December, 1968.

Interview no. \_\_\_\_\_  
 Project \_\_\_\_\_  
 Dwelling \_\_\_\_\_

### I. HOUSING DESCRIPTION QUESTIONNAIRE

1. When did you first move into public housing in High Point? \_\_\_\_\_
2. How many projects have you lived in here? \_\_\_\_\_ (If answer is more than one, go to questions 3 and 4. If only present dwelling, go to number 5).
3. How many years did you live in each one? \_\_\_\_\_
4. Why did you leave the last project to come to this one? \_\_\_\_\_
5. Which of the following explains the major reason for moving into public housing?
- \_\_\_\_\_ urban renewal
  - \_\_\_\_\_ wanted to be near friends
  - \_\_\_\_\_ only housing available at price we could afford
  - \_\_\_\_\_ physical disability
  - \_\_\_\_\_ dissatisfaction with previous housing
  - \_\_\_\_\_ other \_\_\_\_\_
6. In general, would you prefer to own or rent your residence?
- \_\_\_\_\_ own \_\_\_\_\_ rent
7. Do you know about Turnkey housing and would you be interested in this program of home ownership for your family?
- \_\_\_\_\_ yes \_\_\_\_\_ no \_\_\_\_\_ do not know
8. Which of the following best describes your degree of satisfaction with your present residence?
- \_\_\_\_\_ very satisfied
  - \_\_\_\_\_ satisfied
  - \_\_\_\_\_ barely satisfied
  - \_\_\_\_\_ dissatisfied
  - \_\_\_\_\_ very dissatisfied
9. Which of the following would you prefer to live in?
- \_\_\_\_\_ A one family house
  - \_\_\_\_\_ A duplex
  - \_\_\_\_\_ A building housing more than two families

APPENDIX



Interview no. \_\_\_\_\_  
 Project \_\_\_\_\_  
 Dwelling \_\_\_\_\_

### I. HOUSING DESCRIPTION QUESTIONNAIRE

1. When did you first move into public housing in High Point? \_\_\_\_\_
2. How many projects have you lived in here? \_\_\_\_\_. (If answer is more than one, go to questions 3 and 4. If only present dwelling, go to number 5).
3. How many years did you live in each one?
4. Why did you leave the last project to come to this one?
5. Which of the following explains the major reason for moving into public housing?
  - \_\_\_\_\_ urban renewal
  - \_\_\_\_\_ wanted to be near friends
  - \_\_\_\_\_ only housing available at price we could afford
  - \_\_\_\_\_ physical disability
  - \_\_\_\_\_ dissatisfaction with previous housing
  - \_\_\_\_\_ other
6. In general, would you prefer to own or rent your residence?
  - \_\_\_\_\_ own      \_\_\_\_\_ rent
7. Do you know about Turnkey housing and would you be interested in this program of home ownership for your family?
  - \_\_\_\_\_ yes      \_\_\_\_\_ no      \_\_\_\_\_ Do not know
8. Which of the following best describes your degree of satisfaction with your present residence?
  - \_\_\_\_\_ very satisfied
  - \_\_\_\_\_ satisfied
  - \_\_\_\_\_ barely satisfied
  - \_\_\_\_\_ dissatisfied
  - \_\_\_\_\_ very dissatisfied
9. Which of the following would you prefer to live in?
  - \_\_\_\_\_ A one family house
  - \_\_\_\_\_ A duplex
  - \_\_\_\_\_ A building housing more than two families

Interview no. \_\_\_\_\_  
 Project \_\_\_\_\_

## II. HOUSING PROJECT SOLIDARITY AND RATING SCALES

I am going to read you the following statements concerning the project in which you live. After I have read each statement, please tell me if you strongly agree with it, agree with it, are indifferent about it, disagree with it or strongly disagree with it.

- |   |             |
|---|-------------|
| 1. I feel very much that I belong in this housing project.  | sa a i d sd |
| 2. Real friends are hard to find in this housing project.   | sa a i d sd |
| 3. A lot of people here in this project think they are too nice for you.                                | sa a i d sd |
| 4. Families in this project keep their children under control.  | sa a i d sd |
| 5. Almost everyone in this project is polite and courteous to you.                                      | sa a i d sd |
| 6. Parents in this project teach their children to respect other people's rights and property.          | sa a i d sd |
| 7. People in this project will not work together to get things done for the project.                    | sa a i d sd |
| 8. People in this project give you a bad name if you insist on being different.                         | sa a i d sd |
| 9. The project tries hard to help its young people along.   | sa a i d sd |
| 10. Folks in this project are unconcerned about what their kids do so long as they keep out of trouble. | sa a i d sd |
| 11. The people in this project as a whole mind their own business.                                      | sa a i d sd |
| 12. Most people in this project get their families to Sunday School or church on Sunday.                | sa a i d sd |
| 13. People in this project are generally critical of others.  | sa a i d sd |

14. No one in the project cares about how the project looks. sa a i d sd
15. If their children keep out of the way, parents in this project are satisfied to let them do as they please. sa a i d sd
16. I am a proud member of this housing project. sa a i d sd
17. I feel that I should go to project meetings to help out where I can. sa a i d sd

Interview no. \_\_\_\_\_

Project \_\_\_\_\_

## HOUSING PROJECT SOLIDARITY AND RATING SCALES CONTINUED

Now I am going to read you descriptions of different areas of project life. After I have read each statement, please tell me whether you rate it as good, fair, or poor in relation to this project. (Give respondent card before each statement is read) I also will give you a card with each statement on it before I read the statement. If you like you may respond by pointing to your answer on the card.

Every family in this project is decently housed.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

There is continuous planning by the Housing Authority for improvement of housing, parks, streets, and other project essentials.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

There are enough supervised playgrounds and areas for outdoor activities in this project.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

I have an opportunity to take part in arts, crafts, and other hobbies in this project.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

This project has an organized group working for the advancement of all the residents.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

People who live in this project have an opportunity to learn about and take part in project affairs.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

There are regularly scheduled meetings where you can tell others how you feel about the project.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

There are special groups inside the project which give a lot of attention to each important project need.

\_\_\_\_\_ Good      \_\_\_\_\_ Fair      \_\_\_\_\_ Poor      \_\_\_\_\_ No opinion

Interview no. \_\_\_\_\_  
 Project \_\_\_\_\_

### III. HOUSING EXPECTATIONS QUESTIONNAIRE

I am going to read to you a number of questions about items that you may or may not have expected to be included in this home when you moved in. After I have read each question, please respond by answering yes or no. An example would go like this:

	<u>Yes</u>	<u>No</u>	<u>Indiff.</u>
Did you expect paved walks and driveways to be provided in this project? (and you would answer?)	___	___	___
<u>Now let's continue with the other questions.</u>			
Did you think a dining room would be included in your home here?	___	___	___
Did you expect there would be porch lights over your door in this house?	___	___	___
Were showers one of the things you expected would be included in this home?	___	___	___
Did you think there would be any shelter for automobiles here?	___	___	___
Did you think closet doors would be provided in this home?	___	___	___
Did you expect a family room to be included in this house?	___	___	___
Were you expecting a day care center to be provided for children in this project?	___	___	___
Did you feel outdoor play areas would be available for youngsters?	___	___	___
Did you feel outdoor play areas would be available for teenagers?	___	___	___
Did you think your yard would have trees in it to give some shade?	___	___	___
In your home, did you expect that adult areas of the house would be separated from those used by the children?	___	___	___
Did you expect there would be space for a washing machine in this house?	___	___	___

	<u>Yes</u>	<u>No</u>	<u>Indiff.</u>
Did you think a porch or other outdoor living area would be attached to your home?	---	---	---
Did you expect this home to be centrally heated?	---	---	---

Interview no. \_\_\_\_\_  
 Project \_\_\_\_\_

#### IV. FAMILY DESCRIPTION QUESTIONNAIRE

1. Which of the following describes your marital status?

\_\_\_\_\_ Married  
 \_\_\_\_\_ Widowed  
 \_\_\_\_\_ Divorced  
 \_\_\_\_\_ Separated  
 \_\_\_\_\_ Single

2. Sex of respondent

\_\_\_\_\_ Female                  \_\_\_\_\_ Male

3. What is the age of the head of the house?  
 If married, what is the age of the spouse?

<u>Head of house</u>		<u>Spouse</u>
_____	Over 65	_____
_____	45 - 65	_____
_____	30 - 44	_____
_____	25 - 29	_____
_____	20 - 24	_____
_____	Under 20	_____

4. How many people live in this house?

5. How many years of schooling has the head of the house completed?  
 How many years of schooling has the spouse completed?

<u>Head of house</u>		<u>Spouse</u>
_____	College	
_____	4 years or more	_____
_____	1 - 3 years	_____
_____	High School	
_____	4 years	_____
_____	1 - 3 years	_____
_____	Grammar School	
_____	8 years	_____
_____	5 - 7 years	_____
_____	3 - 5 years	_____
_____	1 - 3 years	_____

6. What is your occupation? \_\_\_\_\_

If married, what is your spouse's occupation? \_\_\_\_\_