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/SOCIAL CLASS AND HOUSING; HOUSING ACHIEVED, HOUSING PREFERRED,
AND INCOME ELASTICITY OF BLUE AND WHITE COLLAR
HOUSEHOLDS IN MONTGOMERY, ALABAMA

by

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TABLE OF CONTENTS

CHAPTER	PAGE
I	INTRODUCTION.....1
	Justification.....1
	Purpose.....2
II	REVIEW OF LITERATURE.....3
	Social Class.....3
	Hollingshead.....3
	Warner.....5
	Census.....7
	Duncan SEI.....7
	Coleman.....8
	Wasson.....9
	Blue Collar/White Collar Studies.....10
	Status as a Variable.....11
	Housing Norms.....11
	Discussion of Norms.....11
	Coleman/Morris and Winter Norm Research.....13
	Income Elasticity.....15
	Sampling Method.....15
	Measuring Home/Rent Value.....18
	Methods of Measuring Income.....20
	Socio-demographic Variables.....22
	Social Class and Income.....25
III	THEORETICAL FRAMEWORK.....28
	Theory.....28
	Hypotheses.....29
	Models of Analysis.....30
	Justification of Variables.....32

IV	METHODOLOGY.....	36
	The Sample.....	36
	Method of Data Collection.....	36
	Measurement of Variables.....	37
V	CHARACTERISTICS OF THE SAMPLE.....	42
	Socioeconomic Characteristics.....	42
	Housing Characteristics.....	45
	Preferred Housing.....	48
VI	PRESENTATION OF FINDINGS.....	50
	Achieved Housing.....	50
	Model 1 (Tenure).....	50
	Model 2 (Value of Home).....	53
	Model 3 (Quality).....	57
	Model 4 (Structure).....	61
	Housing Preferred.....	66
	Model 5 (Preferred Tenure).....	66
	Model 6 (Preference for Single Family).....	69
	Conclusions.....	69
	Income Elasticity.....	73
VII	SUMMARY AND CONCLUSIONS.....	80
	Purpose.....	80
	Procedure.....	80
	Method of Analysis.....	80
	Major Findings.....	81

Major Conclusions.....	82
Implications.....	85
BIBLIOGRAPHY.....	86
APPENDIX A (Interview Schedule).....	91
APPENDIX B (Photo Set).....	103
APPENDIX C (Occupational status rankings).....	107

LIST OF TABLES

TABLES	PAGE
1. Socioeconomic Characteristics.....	44
2. Housing Characteristics.....	45
3. Housing Preferences.....	49
4. Means and Correlation Matrix for Model 1.....	51
5. Regression on Model 1 (Tenure).....	52
6. Means and Correlation Matrix for Model 2.....	54
7. Regression on Model 2 (Value of Home).....	55
8. Means and Correlation Matrix for Model 3.....	58
9. Regression on Model 3 (Bed Deficit).....	59
10. Regression on Model 3 (Defect Index).....	60
11. Means and Correlation Matrix for Model 4.....	62
12. Regression on Model 4 (Single Family)....	63
13. Means and Correlation Matrix for Model 5.....	67
14. Regression on Model 5 (Tenure Preference).....	68
15. Means and Correlation Matrix for Model 6.....	71
16. Regression on Model 6 (Structure Preference).....	83
17. Means and Correlation Matrix for Model 7.....	74
18. Regression on Model 7 (Income Elasticity).....	76

CHAPTER I
INTRODUCTION

JUSTIFICATION

The impact of social class on housing has been largely overlooked in housing consumption studies. Most studies look at income as the primary predictor of housing consumption. However, studies of highly visible products that require moderate or substantial expenditure, such as automobiles and home furnishings, have shown social class to be a significant influence. (Schaninger, 1981.) It is thus possible that social class also influences housing consumption. Housing is a major expenditure and has traditionally served as a symbol of social position. Further, many social class indices lend indirect support to the hypothesis that status is related to housing by including residence and neighborhood as key determinants of social position. (Hollingshead, Warner, Coleman, Rossi et al, Lawman and Butman.)

Martineau (1958) indicates that social class has the greatest influence among middle class consumers, comprised of "traditional white collar workers and the unionized craftsmen and semi-skilled workers with their tremendous income gains of the past decade." While workers from different social classes may fall into the same income category, each may follow the buying behavior typical of their social position, rather than their income level. A comparison of housing will indicate whether the

social classes are blending together into a "middle mass", with housing a function primarily of income, or if they are following consumption patterns attributable to their social class characteristics.

While previous studies have compared preferences and expectations for white and blue collar households, achieved housing has been given little attention. Analysis of achieved housing should give more accurate information on the relationship of housing consumption patterns and social class.

PURPOSE

The purpose of this thesis is to examine the influence of social class on the consumption of housing. The following questions will help determine if housing consumption is based on distinct social class values and acts as a symbol of class membership.

1. Does social class have an influence on housing consumption that is independent of income? Is there a difference in ownership rates, structure type, age and quality of housing, or housing expenditure between social classes?
2. What is the relative importance of social class versus income in determining housing consumption?
3. Is there a relationship between social class and housing preferences?

CHAPTER II
REVIEW OF LITERATURE

SOCIAL CLASS

Social class is a generalized concept that attains meaning in research according to the method of measurement. Since the early 1950's, a number of indices have been developed to measure social class. There are fundamental differences between the indices, and all suffer from some basic weakness. Therefore the selection of the index is key to the validity of the research results.

Hollingshead

The Hollingshead index is the most commonly used index in social science research. Hollingshead and Myers defined five classes or social levels, with Class I being the highest status. Persons were assigned to one of these five classes according to their total Index of Social Position score. The score is based on points assigned in the following categories: 1.) residence and neighborhood 2.) occupation and 3.) taste, cultural orientation and leisure activities. The Index of Social Position is based on a weighted scale of residence, occupation, and education.

The residential score is calculated by rating the neighborhoods in the community on a scale from 1 through 6 on

their prestige. The individual's address must be known to determine neighborhood and appropriate rating.

The occupational scale is also based on prestige. Hollingshead breaks business owners and professionals into different classes according to the relative size of their business. The seven categories of occupation are:

- 1.) Executives and proprietors of large concerns and major professionals.
- 2.) Managers and proprietors of medium sized businesses and lesser professionals.
- 3.) Administrative personnel of large concerns, owners of small independent businesses.
- 4.) Owners of small businesses and semiprofessionals.
- 5.) Skilled workers.
- 6.) Semi-skilled workers.
- 7.) Unskilled workers.

The educational scale is also divided into seven categories, ranging from graduate training to less than seven years of school.

The points for each category are weighted according to the relative importance given to each. Residence was weighted by 6, occupation by 9, and education by 5 to arrive at the total ISP score and class ranking. Class I, indicating the highest social status, includes scores from 11 to 17. Class V, with the lowest social status, represents scores from 61 to 77.

The Hollingshead Index of Social Position has been criticized on a number of grounds. The major problem in

using the Hollingshead scale in housing research is the inclusion of neighborhood as a variable in the scale. To use a measure of housing choice behavior (neighborhood) to study housing choice results in a circular argument. Any study looking at neighborhood status would also include neighborhood status as an explanatory variable. Thus, neighborhood status would be used to explain current neighborhood status, which is clearly inappropriate. Another weakness is the list of 300 occupations ranked by Hollingshead is limited and outdated. Occupations such as wine bottler and railroad conductor are listed, but computer programmers and professional athletes have never been ranked. All major professionals are in Class I, since the scale was weighted before a college education was a standard requirement for a wider range of jobs. It does not allow for higher ratings for older, highly placed individuals who were able to rely on work experience for promotion rather than the less common college training.

Since the list of occupations is of limited use, it would be necessary to individually assign an ISP score to each member of the sample. A cumbersome amount of information is required, and computing the score is a time consuming requirement.

Warner

In 1960, Warner developed the Index of Social Characteristics, based on occupation, source of income, house type and dwelling area. Each characteristic was rated on a scale of 1 through 7, with 1 being very high status and 7 being very low status. Characteristics were weighted with occupation having

a weight of 4, source of income 3, house type 3, and dwelling area 2.

Warner used the amount of judgement required and individual control allowed on the job to arrive at the following occupational ranking.

- 1.) Professionals and proprietors of large businesses.
- 2.) Semi-professionals and lesser officials of large businesses.
- 3.) Clerks and kindred workers.
- 4.) Skilled workers.
- 5.) Proprietors of small businesses.
- 6.) Semi-skilled workers.
- 7.) Unskilled workers.

The ranking of source of income followed the theory that inherited wealth was higher status than to earned income, and profits as a self-employed professional ranked over an earned salary.

- 1.) Inherited wealth
- 2.) Earned wealth
- 3.) Profits and fees
- 4.) Salary
- 5.) Wages
- 6.) Private relief
- 7.) Public relief

Neighborhood was included as a characteristic since Warner felt that areas of town have unequal value, both socially and

economically. Dwelling areas were ranked according to societal prestige and occupational prestige of occupants.

Since the rankings are mainly reputational, in depth knowledge of neighborhoods would be necessary.

Education followed the traditional pattern:

- 1.) Professional or graduate school
- 2.) College
- 3.) High school
- 4.) 1-3 years high school
- 5.) grammar school
- 6.) 4-7 years
- 7.) 0-3 years

This scale is outdated, with the increasing frequency of higher education. It would be more helpful to break down the college and high school years, and include business and technical schools rather than break down the amount of elementary school attended.

Bureau of the Census

The Bureau of the Census provides an Alphabetical Index of Occupations and Industries. The 1982 index broke occupations into 82 major areas and listed a total of 620 categories. The main problem with this index is its extensiveness; it is too detailed and complicated to be used easily for research purposes.

Duncan SEI

The widely used Duncan SEI is an occupational prestige scale

based on the 1947 North & Hatt project, conducted by the National Opinion Research Center. 2920 people were asked to label 90 occupations as having excellent, good, average, somewhat below average, or poor social standing. Duncan estimated a percentage of excellent to good ratings for each occupation, developing a ranking system. Reiss (1961) concluded that raters were considering income, education, and skill more than prestige in their evaluation. Reiss divided the Duncan SEI scores into equal deciles, resulting in such diverse occupations as physician and plant foreman falling into the same decile.

There are several weaknesses to consider in the Duncan SEI. The list of occupations is limited, and raters did not necessarily have adequate background on all occupations. All "women's occupations" were eliminated, and raters were told to think in terms of men holding the jobs. Raters were less likely to give negative judgments about low-status occupations, causing occupations to be too closely clustered near the top of the scale.

Coleman

Coleman (1983) suggested a simplified proxy for social class standing. The scale equally weighted (for both husband and wife) an occupational prestige ranking, area of residence, and total family income. Rankings were given on a scale of one through nine with nine being the highest possible status.

The education ranking allows only one category for grammar school, and designates five categories for post high school training.

- 1.) grammar school (8 years or less)

- 2.) some high school
- 3.) graduated high school
- 4.) some post high school (business, nursing, technical)
- 5.) two, three years of college - or Associate of Arts
- 6.) graduated 4-year college
- 7.) master's or five year professional
- 8.) Ph.D or six/seven year professional degree

Area of residence is ranked primarily on the occupational prestige of the residents. Status rankings increase as the number of unemployed or blue collar workers decrease in the neighborhood.

The index suggested by Coleman has many advantages. It recognizes the need for breakdowns in post high school training and is the only scale that equally weights the occupational prestige of both husband and wife in a household.

WASSON

Wasson's study of social class and income used the two general categories of blue and white collar. Professionals, managers, officials, sales and clerical workers were designated white collar. Skilled, semi-skilled and unskilled laborers were designated blue collar. While some occupations in the middle class are difficult to clearly define as either white or blue collar, it proved to be a reasonably efficient method for gaging basic social standing. Using occupations as the single variable in determining social standing has several advantages. Occupation is usually the primary basis for social position, it is directly related to income and education, and is fairly

stable. (Wasson, p. 54.)

Blue Collar/White Collar Housing Studies

Feldman and Tilly (1960) looked at the factors that influenced residential distribution for blue and white collar workers. Occupational categories were analyzed using a ranking scale of professionals, managers, sales, clerical, craftsmen, operatives, service, and laborers. However, the study's findings are based on the differences between white and blue collar employees, with professionals through clerical being ranked as white collar.

Education was found to be the most important contributor to differences in residential distribution. Income was dominant in the craftsmen category, where incomes equalled the lesser white collar professionals and education was typical of blue collar workers. Craftsmen tended to use their higher income to move to higher ranking white collar areas. It was concluded that education serves as a determining factor in lower ranking white collar workers' residence in high status neighborhoods. Income was most important in explaining why high ranking blue collar workers move to these high status areas.

Tilly's (1961) comparison of achieved housing of blue and white collar workers found blue collar housing to be a lower quality, with income held constant.

Morris and Winter (1976) found no significant differences in achieved or preferred housing between blue and white collar workers when income, education, age and household size were controlled. In this study, blue collar was defined as any

service occupation. Owners of small businesses and large farms were included in the white collar grouping.

Status as a Variable

The inclusion of residence and location as major components of social class indices illustrates the strong relationship between status and housing. Consumers do not just purchase shelter when purchasing housing, they consume a bundle of goods and services, including architectural style, neighborhood, and location. The concept that consumers are not buying a good per se, but a group of characteristics was developed by Kelvin Lancaster. Lancaster's "goods are not goods" theory suggests that the good itself does not give utility, but utility is derived from the characteristics the good offers. Thus, a rational consumer may maximize utility by seeking a high status home, if status is a characteristic that is highly valued. Veblen refers to the purchasing of a good primarily for the status attached to it as "conspicuous consumption." The inclusion of residence and location on social status indices suggests housing may be used as a conspicuous consumption good.

Housing Norms

Morris and Winter use 5 major categories to discuss housing norms, and the impact of norms on desired housing for households and communities. These five categories are space, tenure, structure, quality, and neighborhood/location.

Space Households usually require a minimum of a kitchen, livingroom, a bathroom, and necessary bedrooms. The number of bedrooms needed to follow socio-cultural norms seems to be the

most important space consideration. The Morris and Gladhart scale is a good guideline in determining the number of bedrooms needed according to space norms:

Morris and Gladhart Standard of Noreative Need

No more than two people may share a bedroom, and a bedroom is needed for:

- the parental couple (or single parent)
- each child aged 18 or over
- each pair of same sex children (with at least 1 child between the ages of 9 and 17) whose ages differ by 4 years or less
- each pair of children of any sex, both under age 9, whose ages do not differ by more than 4 years
- each additional adult or couple

Tenure Whether the home is owned or rented is known as tenure. Homeownership is preferred in the United States, with approximately 65 percent of all households owning their own home. (Decennial Census of the United States)

Housing Quality According to the the President's Commission on housing, the quality of the housing stock has traditionally been measured by available space and physical dimensions. Overcrowding is measured as more than 1 person per room. Lack of complete plumbing served as a standard gage of quality, but now affects only approximately 4 percent of the population. Quality is also measured by the percentage of stock classified as dilapidated or in need of major repairs. (President's Commission

on Housing, 4-5.)

Structure The structure norm is a conventionally built single family detached dwelling. The norm is relaxed for household groups other than nuclear family.

Neighborhood and Location Morris and Winter discuss three factors in location norms. The first factor is a preference for access to community facilities and employment centers. The second factor is the physical qualities of the area, such as environmental quality and maintenance of surrounding buildings. The norm is a neighborhood of single family homes with spacious lawns. The third area is a desire for homogeneity in the socioeconomic characteristics of the area. "The neighborhood should be relatively homogeneous regarding social class, age, race, and sometimes ethnic group." (Morris and Winter, p. 140)

Coleman suggests that housing norms may differ across social classes. He states that in each social class "one finds a different set of expectations has been established about the kind of housing which provides a proper symbolic statement for life stage."

According to Coleman, the upper class and upper middle class expect a home of at least eight rooms, in good condition, and including up to date appliances and equipment. The home should be in a neighborhood where most of the houses are of equal status. Younger families may select an apartment in an "interesting neighborhood", such as a renovated apartment near the central city.

The middle class expects a home of at least seven

rooms, all in reasonably good condition, with new, modern appliances. "The location of the home is important - ideally it should be in a whole neighborhood of similar homes. And, for full satisfaction to be felt by a middle class white family, it must be in a school district where the overwhelming majority of the students are drawn from white families of similarly middle class status or higher."

Coleman asserts the working class expect a home of 6-8 rooms. The home will probably be older, but in reasonable condition. The neighborhood will be the stable central city, factory worker neighborhood, or industrial suburb. Coleman also states that one out of every three or four working class families achieves an annual earnings equal to the middle class average. They will tend to remain in working class neighborhoods and occupy the best or better houses.

Coleman's suggestions for varying norms across social classes are based on 900 extensive personal interviews conducted in metropolitan Houston, Dayton and Rochester. However, Coleman's work is greatly weakened by relying on observation rather than empirical analysis to verify his suggestions. General comments such as "one out of every three or four working class families achieves an annual earnings equal to the middle class average" fail to be convincing. It is difficult for the reader to determine whether Coleman's conclusions are valid, as he does not present any data in discussions of findings. Presentation of empirical analysis is necessary before Coleman's work can be viewed as a serious contribution to the analysis of social class

and housing.

Morris and Winter's (1976) study on achieved and preferred housing refutes the observations set out by Coleman. They found housing consumption and preferences to be similar across social classes, but only when income, education, age, and household size were controlled. This suggests that constraints may differ across social classes, but housing norms do not.

In a similar study, Guy and Pol compared tenure preferences for blacks and whites in a stratified cluster sample of Memphis, Tennessee. Current homeowners were omitted as current ownership would bias results. No difference was found between races in tenure preferences. Occupational prestige was also not significant at the .05 level in the regression analysis.

Income Elasticity of Housing Demand

The income elasticity of housing demand is used to measure the sensitivity of housing demand to changes in income. It is defined as the proportional change in the quantity purchased by the proportional change in income. (Hirschleifer, p.109.)

Despite extensive empirical studies, there remains considerable debate over the true value of the elasticity of demand. Estimates range from an inelastic .4 to a highly elastic 2.1. Empirical studies estimating income elasticity vary widely on the methods of drawing a representative sample, and calculating income, home value or rent. Studies will be discussed under these three major categories.

Sampling Method

Hanushek and Quigley (1980) used the participants in the

Experimental Housing Allowance Program as their sampling base. While eligibility requirements differed from city to city, the households could generally be classified as lower income. Since households could choose whether to participate in the allowance program or not, there is a distinct possibility of self-selection affecting elasticity estimations. Using the most reliable model, the estimates for renters were 0.15 to 0.22, and 0.40 to 0.51 for owners.

Reid (1962) used data from the Consumption Survey of 1950 and the 1950 Census of Housing to estimate income elasticities for both owners and renters. The consumption survey included persons in quasi-households, such as hotels and lodging houses, while the Census did not look at transient forms of housing. Both studies found the income elasticity of housing demand to be greater for owners than for renters. The consumption survey estimated the coefficients to be 0.431 for renters and 0.527 for owners. As expected, the census found lower coefficients of 0.261 and 0.314, respectively. Since the consumption survey included persons thought to be more transient, it seems to follow that their estimated elasticity would be higher, as they would be more likely to change housing as income fluctuated. Reid felt looking at grouped data allowed extreme values to cancel each other out, thus resulting in a good approximation of an average household.

de Leeuw also used Census Bureau data for 19 cities, thus taking into consideration all standard dwelling units. de Leeuw's methods are very similar to Reid's, but 1960 data

was used to avoid the problem of rent control biasing results that Reid encountered. de Leeuw's results show income elasticity for renters being estimated at .8 and owners at 1.1.

The specialization of Winger's sample, taken from the FHA Home Ownership Program, may have lead to biases in his estimated elasticity of 1.05. de Leeuw suggests that low-income households participating in the FHA program are usually induced to spend a higher than average percentage of their income on housing. The higher income families, close to the limit for eligibility, may reduce the housing they would usually buy to qualify for an FHA mortgage. It is not known if these phenomena will cancel each other out.

Kain and Quigley (1975) conducted a random sample of both owner-occupied and renter households in St. Louis. The estimated elasticity for renters was thought to be in the range of 0.08 to 0.20. Homeowners were estimated to be between 0.13 and 0.42.

Kain and Quigley's low estimations were not substantiated by Lee (1963) in a sample of homeowners and renters conducted by the Survey Research Center, University of Michigan. Lee's estimated elasticities were 0.65 for renters and 0.80 for homeowners. Lee and Kong updated Lee's original study from the Survey Research Center, with very similar results. Estimated income elasticity for renters was 0.695 and owners was 0.868.

In 1973, Carliner used a sample of 2,107 renting households and 2,458 owners, based on a study conducted by the Survey Research Center. Carliner felt that price elasticities based on a representative sample of individual households was far more accurate than looking at city averages. Carliner's sample

households were interviewed once a year over a four year period, and every attempt was made to follow up movers.

One study, conducted by Maisel, Burnham and Austin, focused on the estimated error in elasticity resulting from grouping data. They used Federal Housing Administration data, both grouped and ungrouped, to illustrate the differences. Data used was identical to de Leeuw's. Their calculations found that income elasticity derived from grouped data is 0.97. It is reduced to 0.62 when ungrouped data is examined. If similar corrections are applied to de Leeuw's results, his estimated elasticity of 1.1 for homeowners would be reduced to 0.75.

The major conclusion that can be drawn from these studies is that owners consistently have higher income elasticities than renters. Furthermore, nearly all studies shown income elasticities for both homeowners and renters fall in the inelastic category. The use of grouped data appears to result in higher elasticities than microdata.

Method of Measuring Value of Home/Rent

There is widespread variation in the studies on the method of projecting home or rental value.

Muth's measurement of home value was the average value of a single family home in each of the nineteen cities he sampled. Rental values were not considered.

Reid analyzed housing value a number of different ways. The primary variable was the market value of a one unit owner occupied structure. Rental value of the owned unit was included,

and estimated as 10 percent of the home value reported. For tenants, both contract and gross rent were considered. Reid defines gross rent as rent including expenditures for utilities such as water, electricity, gas and other fuels. An estimate of rent of furniture was subtracted from this amount. This seemed to be an excellent method of comparing the elasticity between rent and average monthly housing costs.

Both Carliner and Hanushek/Quigley used market home value and contract rent from samples of individual homeowners and renters. Hanushek and Quigley used these values with reservation, noting that direct observations of housing prices are never available.

The mortgage rate and length of the mortgage contract were used to estimate housing value by both Lee and Winger.

de Leeuw used the median rental value from the 1960 Census to estimate rental costs. The Census does not include all costs of homeownership, so de Leeuw looked at the median housing expense, an index of price of housing to homeowners, normal median income, and an index of the general price level.

Kain and Quigley arrived at a fairly complex means of determining home value, using both city and country samples. For city samples, they merged three measures of housing value. The first was the owner's estimate of value which was recorded for 114 households. The second was the assessment of the value of land and structure, which was considered for every unit in the city. The third was the appraised value of the land and structure. This was recorded for a random sample of 500 dwellings, including 132 single family detached units. The

country samples looked only at owner's estimates and assessed value of land and structure. Kain and Quigley seem to be compensating for the biases of either strictly individual or grouped data by using a measure including both.

Methods of Income Measurement

The method of measuring income is one of the most important factors considered in analyzing income elasticities. The primary difference in most studies was whether current or permanent income was used, and its method of calculation.

Richard Muth designed a model of weighted averages of past current income. This model is a weighted average of current disposable incomes of several recent time periods, with the most recent time period receiving the greatest weight. It differed from permanent income theory in that it gave greater weight to savings.

Carliner used definitions of permanent income very similar to Muth's. The first definition is the four year average of measured real family income, with each year's income receiving equal weight. The second definition has weights that decline arithmetically over time. Permanent income, including the imputed rent of the owner occupied dwelling, was analyzed. The rent was calculated as 6 percent of the owner's equity. Estimates from a regression indicated that the lowest estimate of income elasticity (approximately 0.42) was found in current year income. When the two definitions of permanent income were used, both had slightly larger estimates of about 0.6. The highest estimates were found in permanent income including imputed rent,

which increased to 0.75.

Both Reid and Lee looked at permanent and transitory income, and found elasticity to be greater when permanent income was used. Although permanent income has a greater impact on the housing decision, it still has a coefficient of elasticity less than unity.

Lee and Kong used permanent income with an instrumental variable model to help represent lagged income. One of the most interesting features of this study was their three definitions of income: regular money, regular money plus the rental value of the homeowner's equity, and full income, which further includes a number of other incomes, such as the amount saved on car and home repairs. Elasticities consistently increased as more expenditures were considered. This suggests that households look beyond basic rent and mortgage payments to at least the full housing expenditure when considering housing decisions.

Quigley and Hanushek looked at the effect of current income on the income elasticity of demand. Looking at current income for a single year showed very low elasticities for renters and homeowners, approximately 0.11 and 0.3 respectively. When the three year average income was considered, elasticities increased to 0.15 to 0.22 for renters and 0.40 to 0.51 for owners.

All studies found permanent income to be more elastic than current income. Several of the studies made a strong point that the housing market should be examined over an extended period. This allows for a lag or adjustment period and takes into account that moving costs (both in time and money) may prohibit

households from making frequent shifts in housing demand.

Socio-Demographic Variables

Margaret Reid appears to be the only researcher who gives significant attention to socio-demographic variables. A few researchers touch on them, and tend to dismiss them as unnecessary variables. It seems unusual that research that has been so thorough in examining different types of income and populations has never questioned the impact of age, race, life cycle state, number of children in the household, or social class. The findings of the minor studies will be addressed first, with Reid's study following.

Lee and Kong included a number of socio-demographic variables in their regression, such as race and age of household head. They concluded that they have no significant effect on estimating income elasticity.

Carliner included the variables age and race of household heads, along with grouping household heads into categories of 35 years of age and younger, those between 35 and 64 and those over 65 years of age. The results of the regression indicate a significantly positive coefficient for females, both in the renter and owners categories. The coefficient for nonwhites was significantly negative, and appeared to be more significant in the owner regression than the renter regression. Carliner suggests that this difference may be due to discrimination in single family home markets and by banks offering home mortgages.

In the owner's category, income elasticities were clearly different in all three age groups, young middle aged, and old.

It was shown that the oldest group demanded more housing, but the youngest group (those under 35) were most responsive to changes in income. None of the coefficients on age, race, and sex were significant for renters. The difference in income elasticities between blacks and whites was also not significant.

Reid's study provides a thorough discussion on a number of socio-demographic variables. The first variable addressed is tenure. Reid assumes that owner-occupancy becomes more important as normal income increases. If this is true, holding tenure constant should increase the income elasticity of housing expenditures. The results show that overall income elasticity of housing was 0.436. Reid then compared the overall income elasticity to four tenure subsets, which had elasticities as high as 0.619. The weighted mean for the four tenure subsets was 0.473, an 8 percent increase over the original estimation of 0.436.

The second variable considered was age of household head. Since housing needs are thought to fluctuate with age, holding age constant should decrease the income elasticity of housing. The average income elasticity of 0.436 decreased to 0.426 with age of household head held constant, a decrease of 2 percent. While age did have an effect, it certainly did not appear to be significant.

Type of occupation was broken into six categories: self-employed, salaried professional, clerks, skilled, semiskilled and unskilled. The salaried professional and semiskilled had the highest elasticities, but there was no particular pattern established between occupation and income elasticities.

When years of schooling was analyzed, income elasticity clearly increases as schooling increases. As predicted, holding schooling constant decreased income elasticity from 0.436 to 0.374.

Race was found to be a significant variable in estimating income elasticities. Blacks had higher income elasticities than any other group. The major reason for this was thought to be the heavy in-migration in larger cities, which drove up rents and rent-to-income ratios. Other reasons cited were the loosening of rent controls around this time, and the presence of discrimination that limits housing choices. Reid felt that if these differences were accounted for, the income elasticities between the groups would not be significantly different.

Reid found that income elasticity increased as the number of persons in the unit increased. The coefficients of income elasticity increased from 0.436 to 0.492 for the weighted mean of all size categories. This is a 13 percent increase, which indicates that this variable may merit more attention. It should also be realized, however, that the number of persons in a household is strongly related to the number of earners, average income, age of household head, and percentage of home owners. If these relationships are taken into account, income elasticity may drop.

One of the most informative sections of Reid's study is the breakdown of income elasticity by type of consumer unit. The base income elasticity for all types was 0.372. Husband-wife households with no children had an elasticity of 0.409. With the

oldest child under 6, the elasticity was 0.484. It increased to 0.619 when the oldest child was between 6 and 16, and fell to 0.349 with children between 16 and 18. When the oldest child was 18 or over, the income elasticity dropped to 0.304. One parent families had the highest increase, with an elasticity of 0.895.

Social Class and Income

The influence of social class in explaining consumption behavior has been a topic of interest in marketing and consumer research. (Schaninger 1981.) In an early study, Martineau (1958) suggested that social class may have a more significant impact than income in determining consumption. Martineau conducted a series of studies in the Chicago metropolitan area to determine if a social class system existed, and if there were differences in spending patterns, retail store loyalties, and taste in automobiles, apparel, and house types across social classes. Social class was measured using Warner's Index of Social Characteristics. Three basic premises on social class and income were suggested:

1. There is a social class system operating in metropolitan markets, which can be isolated and described.
2. There are far reaching psychological differences between the various classes.
3. Consumption patterns operate as prestige symbols to define class membership, which is a more significant determinant of economic behavior than mere income.

Unfortunately, little information is provided on the methods of conducting the studies and the statistical results on which

these conclusions are based.

Schaninger (1981) developed three general theories on the relative importance of social class and income in major product categories:

1. Social class has more influence than income when purchases do not involve high expenditure but do reflect underlying lifestyle value.
2. Income generally has more influence for goods requiring substantial expenditure, but no longer serve as symbols for status within class or as status symbols for the upper lower class.
3. The combination of social class and income generally has more influence for product classes that are highly visible, serve as symbols of social class or status within a class, and require either moderate or substantial expenditure.

Myers, Stanton, and Haug found income exerted more influence than social class in determining purchasing patterns of low-cost packaged goods. While their sampling method is superior to many of the social class and income studies, they have been criticized for looking at goods on hand, rather than frequency of usage.

Myers and Mount (1973) used the McCann social class distribution to compare expenditures on major appliances, clothing, and travel and found income to be a much greater determining factor than social class on these expenditure categories.

Peters (1970) used the 1967 Survey of Consumer Finances by

the Survey Research Center, University of Michigan, to study the influence of occupation and income on the size of automobile purchased. Peters compared the difference between families with incomes higher or lower than the median in their occupational class. He found that "overprivileged" blue collar workers bought automobiles more similar to white collar professionals than the blue collar workers earning below the median income. The conclusions are based only on comparisons of percentages between the classes, and significance levels are not presented.

Martineau found the comparison of social class and income is the most critical in the middle class, comprised of both the traditional white collar workers and the blue collar craftsmen and semi-skilled workers, who may have wages exceeding the lesser white collar professionals. While the two groups may fall into the same income category, their buying behavior, tastes, and spending patterns may reflect the differences in social class.

A major weakness in the literature is the lack of empirical analysis. While accurate and valid measurement of social class may be difficult, the conclusions drawn are much less convincing when they are being primarily based on observation of behavior and theory alone. Several variables must be controlled to have a more conclusive causal analysis of the impact of factors on consumption.

Chapter III

THEORETICAL FRAMEWORK:

The theoretical model of housing consumption, which this thesis tests, is based on housing norm theory developed by Morris and Winter (1976), and presented in the review of literature. Norm theory suggests that housing consumption is based on attitudes and behavior specified by societal guidelines, and that norms are relatively constant for all segments of the population.

The strength of the housing norms is reflected in achieved housing, with deviations from the norm explained by constraints. Lindamood and Hanna state "the fact that the housing of some persons differs from the dominant cultural norms is often because of various constraints which prevent people from attaining the norms, not because of differing desires for housing or different attitudes about what constitutes desirable housing." (1979, p.81) Thus, adherence to norms leads households to make sacrifices to obtain housing meeting societal guidelines.

Based on extensive research, Morris and Winter state norms govern housing decisions in the categories of space, quality level, structure type, tenure and neighborhood and location . They suggest the current norms indicate ownership of a conventional single family home in a neighborhood with homes of equal value and status. Quality may be sacrificed somewhat to obtain space necessary to follow cultural norms on number of bedrooms needed. In addition, norms are adhered to and expected to be adhered to most rigidly by families with children, and are

loosened for household types such as single persons or young couples.

HYPOTHESES

Based on Morris and Winter theory of housing norms, the following three hypotheses have been developed:

Hypothesis 1: Achieved Housing

When the constraints of age, education, family size, income, and race are controlled, tenure, structure type, housing value and quality levels should be similar for white and blue collar households. When constraints are not controlled, blue collar households are expected have a lower ownership rates, own fewer single family homes, and live in homes of lower value and quality levels.

Hypothesis 2: Housing Preferences

Housing norms suggest housing preference will be independent of social class. It is expected that both white and blue collar households will prefer a conventional single family home and ownership over renting as a tenure choice.

Hypothesis 3: Income Elasticity

Estimates of income elasticity are expected to be similar for blue and white collar households with other demographic characteristics controlled.

MODELS OF ANALYSIS

The three hypotheses will be tested through the use of seven structural models. Models are divided into the three categories of achieved housing, preferred housing, and income elasticity.

Achieved Housing

Four models are used to examine achieved housing. The dependent variables are tenure, value of the home, quality level, and single family home acquired.

1. Tenure = $f(\text{social class, age of head, income, education of head, family size, wife working, race, income squared, education of head squared, and age of head squared})$
2. Value of home = $f(\text{social class, age of head, income, education of head, family size, wife working, income squared, age of head squared, education of head squared, and race})$
3. Quality level = $f(\text{social class, age of head, income, education of head, family size, race, wife working, income squared, age of head squared, and education of head squared})$
4. Single family = $f(\text{social class, age of head, income, education of head, wife working, income squared, age of head squared, education of head squared, race, and family size})$

Preferred Housing

Two models are used to examine preferences in housing. Dependent variables are tenure preference and preference for a conventional single family home.

5. Tenure preference = f(social class, age of head, race, income, education of head, family size, wife working, income squared, age of head squared, education of head squared)
6. Preference for a Single Family Home = f(social class, age of head, income, education of head, family size, wife working, income squared, age of head squared, education of head squared)

Income Elasticity

Norm theory suggests housing consumption will be consistent across social class. The effect of a change in a constraint on consumption should also be independent of social class, all other factors controlled. Estimates of income elasticity will be used to compare the impact of changes in income on housing expenditure between blue and white collar households. The model should examine the relative significance of social class and income on housing consumption.

The following model is used to estimate income elasticity of housing demand:

$$7. \quad e = \frac{a + 2bI}{\frac{H}{I}}$$

where the two coefficients a and b are regression

coefficients of income and income squared, respectively, in a regression analysis with the value of the home as the dependent variable. The regression model is value of the home = f(age of head, education of head, number of dependent children, wife working, race, and the quadratic terms for income, age and education). Additional interaction variables are included to examine the relationship of social class, race and income. These variables are blue collar black households, blue collar income, black income, blue collar income squared, and black income squared. I represents the current mean income of the social class being tested, and H represents the mean value of the home for the same group.

JUSTIFICATION OF VARIABLES

Morris and Winter suggest differences in achieved and preferred housing are related to socioeconomic constraints, as well as demographic characteristics. Nine independent variables have been selected to control for differences in housing consumption based on socioeconomic constraints, thus allowing a more accurate analysis of the impact of social class. An explanation of the variables and their expected relationship with the dependent variables is included.

1. Income - Income will be used to assess the family financial resources available for housing consumption. According to demand theory, income should have a positive and significant relationship to housing consumption, as housing is considered a normal good.

Income is expected to be positive and significant in all achieved housing models, indicating an ability to follow norms increases as income increases. Income is not expected to be significant in any preference model. This variable is included to test for a linear relationship between income and housing consumption.

2. Income Squared - Income squared is expected to have the same relationships with the dependent variables as the linear income term, but is included to test for a nonlinear relationship between income and housing consumption.

3. Age of Head - The age of head variable is related to lifetime assets and family size. As age of head increases, ownership rates, quality levels, and the value of the home are expected to increase.

Age of head is expected to be positive and significant in achieved housing models. It is expected to be positive but not significant in preference models.

4. Age of Head Squared - Age of head squared is expected to follow the same relationships with the dependent variables as the age of head term, but will test for nonlinear relationships. Housing consumption is expected increase in younger years, peak in middle years, and begin to decrease for the elderly.

5. Education - As education increases, family resources increase, and their ability to manage them is also expected to increase. Higher education also leads to more stable employment, which positively affects permanent income.

Education is expected to have a positive and significant relationship with achieved housing models. It is expected to be

positive, but not significant in preference models.

6. Education of Head Squared - The squared term is included to test for a nonlinear relationship between education and housing consumption. Expected relationships are the same as the education of head term.

7. Wife Working - Wife working will be used to test the difference between one and two earner households. If income is not controlled, two earner families are expected to have higher incomes, and thus higher achieved housing. If income is controlled, the second income may be seen as a less stable source of income, thus lowering permanent income and housing consumption.

Wife working is expected to have a negative relationship with achieved housing models. It is expected to be negative, but not significant, in preference models.

8. Race - The literature suggests achieved housing will vary by race, while housing preferences will not. Blacks are expected to have lower ownership rates, and live in homes of lower value and quality.

Race is expected to be negative and significant in all achieved housing models. It is expected to be negative, but not significant, in all preference models.

9. Social class - Occupational status will be used to test for differences in housing consumption influenced by social class characteristics.

Social class is expected to have a positive, but not significant relationship, in all models.

Morris and Winter norm theory suggests preference to follow norms should not vary due to socio-economic constraints. Achieved housing is expected to vary by constraints.

The only exception to the above expected relationships is in the regression analysis with the defect index as the dependent variable. As the defect index increases, housing quality will decrease. Due to the inverse relationship, all expected relationships of the variables are also reversed.

Chapter IV

METHODOLOGY

Description of the Sample

Data were collected in Montgomery, Alabama in 1976 by researchers Suzanne Lindamood and Sherman Hanna for the Montgomery Office of Planning and Development under a grant from the National Science Foundation and Auburn University. A computerized listing of all dwelling units in the city, recently updated by the planning department, was the basis of the sampling. A stratified random sampling on the basis of high or low income census tract was conducted, resulting in a sample of 1010 household units. Twice as many homes in low income census tracts were sampled, but weighting was used during statistical analysis to maintain a representative sample of the population.

Method of Data Collection

Personal interviews, administered by trained interviewers, using an interview schedule of approximately 45 minutes in length were used to collect the data. Respondents were the head of the household or spouse of the head. The questionnaire consisted of 114 questions, gathering extensive information on previous housing, satisfaction with the current home, needed repairs and repair skills, financing, family demographics, and housing plans for the future. Occupational information included employment during the past year, number of hours worked per week, type of job and pay

schedule, and wage/salary for each person living in the dwelling unit.

For the purpose of this study, only households with a currently employed head were included. 547 had employed heads of household. The remaining 463 were retired, disabled, homemakers, or students.

MEASUREMENT OF VARIABLES

Social Class

The designation of white and blue collar was used to describe occupational status. Households were assigned to the categories of blue or white collar of the households head by the present researcher on the basis of the occupation being manual or nonmanual and form of pay being hourly wage or salary. If both the male and female were employed, the household was designated as male headed. (Appendix C).

Blue Collar: Blue collar workers were involved in manual labor or worked for an hourly wage. Types of workers included are unskilled laborers, skilled laborers, craftsmen, and retail sales clerks earning an hourly wage.

White Collar: White collar workers worked at nonmanual jobs for a salary. Professionals, managers, salaried salespeople, and owners of small businesses were designated white collar.

The Value of the Home

The dollar value of the home was used in the analysis. The value of the house was estimated by the following question:

"If you could sell your house today, how much do you think you would be paid for it?"

Tenure

Tenure was measured as owned (coded 1) or not owned (coded 0.) Current tenure was determined by the question:

"Do you own or rent this home?"

Bedroom Deficit

The bedroom deficit is the number of bedrooms available minus the number of bedrooms needed, as outlined by Morris and Winter's societal norms for bedroom need, as appears in the review of literature. This was determined by comparing the number of available bedrooms with the age and number of children and adults.

Defect Index

A defect index was developed to compare the quality of units. A weighted scale was used for a list of possible defects including lack of a bathroom, plumbing, hot water, stove or refrigerator, heat or air conditioning, tub or shower in bathroom, and insulation. Other problems included water in the basement, problems with sewage disposal, leaks in roofs or basement walls, cracks, sags, bulges or peeling paint in inside or outside walls and ceilings, decayed doors, windows, porch or steps, uneven floors, holes in floors, broken or missing windows, broken exterior walls, and rodent or insect damage. The defect

index is based on each major problem counting two points and each minor problem counting one. The possible range for the index is from 0 to 26.

Structure Type

Structure type was observed by the interviewer and assigned to one of the following categories:

- single family detached
- duplex
- townhouse
- mobile home - not on a permanent foundation
- mobile home - on a permanent foundation
- apartment - in house
- apartment in building of four stories or less
- apartment in building of five stories or more
- apartment in commercial building
- other, specify

For crosstabulation purposes, the two mobile home categories were collapsed, as well as apartment in a building of five stories or more, apartment in commercial building and other.

Single Family

Categories of structure type were collapsed into single family home (coded 1) and all other structure types (coded 0) for comparison of means and for the regression analysis.

Tenure Preferred

Desire to own or rent was determined by the question:

"If you were to move in order to change your housing, would you want to own or rent?" The item was coded 1 for wanting to own and 0 for wanting to rent.

Structure Preferred

Structure type preferred was assessed by asking respondents to rank photos representing types of structure in order of preference. Photographs were carefully selected to achieve similar backgrounds for all structure types, thus reducing the possibility that preferred settings were chosen rather than preferred structure. (Appendix B). The directions were:

1. "Here are some pictures of different types of housing. Would you rank them according to the type you would like most to through the type you would like least to live in."
2. "Are there any alternatives you would not even consider living in?"
 - A. Apartment in a multi-story building
 - B. Apartment in a two story building
 - C. Duplex
 - D. Townhouse
 - E. Mobile home with permanent foundation
 - F. Conventional home

Preference for Single Family Home

For the regression analysis, preference for a conventional single family home was coded 1 and preference for all other structure types was collapsed and coded 0.

Income

Income was measured by asking a series of questions on pay periods and amount of take home pay per period for all earners. Other sources of income including welfare, unemployment compensation, food stamps, relatives, retirement, disability, and child support were included.

Actual income was used in frequency distributions and comparison of means. In regression analysis, income was represented by 1000's.

Age

Actual age of household members was used in the present analysis. Age was grouped only for purposes of presenting frequency distributions.

Education

Respondents were asked what the last grade completed or degree was for each member of the household. Actual years of education were used throughout the analysis, and collapsed only for the purposes of presenting frequency distributions.

Chapter V

CHARACTERISTICS OF THE SAMPLE

This chapter presents the frequency distributions and cross tabulations discussed in this research. Frequencies for socioeconomic characteristics, preferred housing, and achieved housing are presented to gain a better understanding of the characteristics of the sample and to examine distribution of responses to determine suitability for other methods of analysis.

Socioeconomic Characteristics

The socioeconomic characteristics of the household are presented in Table 1.

Occupational Status

62 percent of the households were classified as blue collar, with the remaining 38 percent of the households being classified as white collar.

Household Type

Over 98 percent of all households had male heads. Wives were employed in 37.8 percent of the households. The percentage of households with working wives was very similar for white and blue collar households, with 37.6 percent of the white collar wives employed, and 38.1 percent of the blue collar wives employed.

Table 1: Socioeconomic Characteristics of Sample Households

	BLUE COLLAR	WHITE COLLAR
	(percent)	
Occupational Status	62	38
Wife Working	37.6	38.1
Black Household	47	11
Income (mean)	\$8488	\$24,822
Education, years		
1-8	18	2
9-11	24	4
12	33	18
12-15	17	18
16+	8	58
Age of Head		
<30	24	23
30 - 40	25	30
40 - 50	24	24
50 - 65	27	21
≥65	3	2

Race

Race was clearly associated with social class, as 47 percent of the blue collar group was black, as compared to only 11 percent of the white collar group. The relationship between race and social class was significant at the .001 level.

Income

Mean incomes varied significantly across social class. Blue collar households had a mean income of \$8488, as compared to a mean of \$24,822 for white collar households. This difference was significant at the .01 level. Blacks had a mean home value of \$17,885 lower than white households, which was significant at the .01 level.

Education

White collar heads were better educated than blue collar households. 9 percent of the blue collar workers had only a grade school education, while only 1.9 percent of the white collar had only a grade school education. Of the blue collar heads, 43 percent had not graduated from high school, 32.7 percent had a 12th grade education, and 25 percent had some education beyond high school. For the white collar heads, 5.7 percent of the white collar heads did not complete high school, 18.35 percent completed high school, and 76 percent had education past the high school level.

Age of Head

Age of head is broken into 5 groups. Percentages in each group seem similar across blue and white collar categories.

Housing Characteristics

The housing characteristics of the households are presented in Table 2.

Tenure

The majority of both white and blue collar families own their home, with white collar households having 74 percent home ownership, and the blue collar households having an ownership rate of 60 percent.

Structure Type

The relationship between structure and social class was significant at the .05 level. Both categories have a high percentage of families living in single family homes, with 82 percent of the white collar and 72 percent of the blue collar families living in single family homes. Blue collar black families have a higher than average rate of single family home occupancy (80 percent), but white collar black families are sharply below average at 60 percent. The relationship between race and structure type was significant at the .001 level.

Blue collar families were more likely to live in duplexes than white collar, exceeding white collar 9 percent to 2 percent. Both classes have 13 percent living in apartment houses greater than five floors.

White collar families were more likely to live in units less than 20 years old, with 25 percent of white collar families living in homes less than five years old. Of blue collar

Table 2. Housing Characteristics of Sample Households

	BLUE COLLAR	WHITE COLLAR
	(percent)	
Owners	60	74
Structure		
Single Family Home	72	82
Duplex	9	2
Townhouse	2	1
Mobile Home	2	1
Apartment	15	14
Age of Unit		
0 - 5	10.3	25.3
6 - 10	12.2	16.7
11 - 20	16.4	23.7
21 - 30	27.7	14.6
31 - 40	13.2	8.6
41 - 60	17.7	8.6
60+	2.5	2.6
Value of Home (mean)	\$24,282	\$42,325
Bedroom Deficit		
one bedroom	13	6.2
more than 1	7	1.5
Quality Index (mean)	1.9	.8
Made Home Improvements in Last 5 Years	58	66
Structure Type for Black and Non-Black Households	BLACK	NONBLACK
Single Family	66.0	80.0
Duplex	11.4	3.5
Townhouse	1.1	1.6
Mobile Home	1.1	1.9
Apartment	20.2	13.4

households, only 10 percent lived in units less than five years old.

Value

Housing values varied significantly across social class. White collar households owned homes with a mean value of \$42,325, while blue collar households owned homes with a mean value of \$24,282.

Bedroom Deficit

The bedroom deficit is the number of bedrooms present minus the number of bedrooms needed according to societal norms. While 20 percent of the blue collar families had a bedroom deficit, 13 percent was a deficit of one bedroom. 7.7 percent of the white collar families had a bedroom deficit, with 6.2 percent lacking one bedroom.

Quality

Housing quality was higher for white collar than blue collar households. Blue collar households had a mean defect index score of 1.89, meaning they averaged nearly 2 defects per unit. White collar households had a significantly lower mean value of .797, or less than one defect per unit.

58 percent of the blue collar families had made improvements on their home in the last 5 years. 66 percent of the white collar families had made improvements.

Housing Preferred

Both white and blue collar families strongly prefer a conventional single family home. Housing preferences are presented in Table 3. When shown pictures of 5 types of housing structures (apartment in a multistory building, apartment in a 2 story building, duplex, townhouse, mobile home, and single family home) 92 percent of the blue collar and 95 percent of the white collar families ranked the single family home as their first choice in types of home.

The only difference in the two classes appeared to be the greater preference for duplexes among blue collar families, with 4 percent of the blue collar families naming it as their first choice, as compared to only 1 percent of the white collar respondents.

When asked to list which of the above housing types they would least like to live in, mobile homes were the most frequently mentioned for both blue and white collar households. The acceptance of other housing types was fairly similar for the two groups.

Ownership was the clearly preferred tenure form for both groups, with over 85% of both groups preferring to own rather than rent.

Table 3: Housing Preferences of Sample Households

	BLUE COLLAR	WHITE COLLAR
	(percent)	
<u>Structure Preferred</u>		
Single Family Home	92	95
Mobile Home	0	0
Townhouse	3	1
Duplex	4	1
Apartment	1	3
<u>Least Preferred Structure</u>		
Single Family Home	.4	1.3
Mobile Home	76.0	84.0
Townhouse	6.5	1.9
Duplex	.8	1.2
Apartment	16.2	12.4
<u>Tenure Preferred</u>		
Ownership	86	89

Chapter VI
PRESENTATION OF FINDINGS

The results of the statistical analysis of the theoretical models will be presented under the three categories of achieved housing, preferred housing, and income elasticity.

ACHIEVED HOUSING

Hypothesis 1 predicts that the housing characteristics of blue and white collar households will be similar when age, income, education, race, and family size are controlled. The housing characteristics tenure, value of the home, quality of the structure, and structure type will be examined using regression analysis.

Tenure

Table 4 presents the correlation matrix of the variables and Table 5 presents the findings on the analysis of the regression model:

tenure = f(social class, age of head, income, education of head, family size, wife working, income squared, education of head squared, and age of head squared.)

The model explains approximately 20 percent of the variation in tenure choice. The linear age of head variable was positively and significantly ($p=.001$) related to current ownership, with the sample having a trend of increasing home ownership to age 75. The quadratic age of head term was negative and significant at

Table 4. Means and Correlation Matrix
with Tenure as the Dependent Variable

VARIABLE	MEAN	STD DEV
Tenure	.925	.263
Income Squared	230.418	332.215
Income	11.722	9.654
Race	.333	.472
Wife works	.389	.488
Education	12.705	3.562
Education squared	17.408	8.833
Number children	1.312	1.567
Age of head	41.109	13.159
Age squared	18.628	11.636
Social class	.381	.486

n = 522

	CORRELATION				
	INCSQ	INC	RACE	WIFE	EDUC
TENURE	.226	.242	-.201	.095	.055
INCSQ	1.000	.931	-.159	.098	.425
INC	.931	1.000	-.321	.169	.457
RACE	-.321	-.366	1.000	.078	-.407
WIFE	.098	.169	.078	1.000	.013
EDUC	.425	.457	-.407	.013	1.000
EDUCSQ	.450	.471	-.387	.001	.977
CHILD	.018	-.004	.222	-.054	-.060
AGE	.083	.055	-.039	-.090	-.164
AGESQ	.057	.028	-.047	-.105	-.170
SOC CL	.401	.416	-.371	-.003	.566

	EDUCSQ	CHILD	AGE	AGESQ	SOCCL
	TENURE	.066	-.024	.358	.334
INCSQ	.450	.018	.083	.057	.401
INC	.471	-.004	.055	.028	.416
RACE	-.387	.222	-.039	-.047	-.371
WIFE	.001	-.054	-.090	-.105	-.003
EDUC	.977	-.060	-.164	-.170	.566
EDUCSQ	1.000	-.061	-.121	-.127	.590
CHILD	-.061	1.000	-.133	-.178	-.043
AGE	-.121	-.133	1.000	.988	-.004
AGESQ	-.127	-.178	.988	1.000	-.007
SOCCL	.590	-.043	-.004	-.007	1.000

Table 5. Regression Analysis with Tenure
as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Social Class	.046	.944
Wife works (1=wife works, other)	.106	2.620 ***
Number of dependent children	.012	.919
Age of head	.032	3.357 ****
Income by 1000's squared/100	-2.707E-05	-.170
Race	-.161	-3.398 ****
Education of head	4.337E-03	.165
Income by 1000's	7.466E-03	1.316
Education of head squared	-4.152E-03	-.389
Age of head squared	-.022	-2.02 **
[Constant]	-.353	-1.37

Adjusted R² = .1987
F = 13.926****

*p ≤ .1
**p ≤ .05
***p ≤ .01
****p ≤ .001

the .05 level. This suggests a nonlinear relationship between age of head and ownership, with ownership decreasing after age 75. The same nonlinear relationship appears in the education and income terms, but these variables were not significant at the ten percent level.

Race was significant and negatively related to ownership, with blacks less likely to own. The variable wife working was positive and significant. The correlation between wife working and income was low, indicating wife working was not acting as a proxy for income. This suggests two earner families are more likely to own than one earner families of the same income level.

Social class, income, and education have the expected relationships with tenure, but were not significant at the ten percent level. Number of children was also positive, which follows norm theory that households with children present are more likely to own.

Value of the Home

The correlation matrix is presented in Table 6, and the results of the analysis are presented in Table 7. The following model for the value of the home was tested:

value of the home: $f(\text{social class, age of head, income education of head, family size, wife working, income squared, education of head squared, and age of head head squared})$.

The model tested accounted for .3730 of the variance. The correlation matrix is presented in Table 13. There was a significant relationship ($p=.001$) between social class and estimated home value. When constraints were controlled, the difference in home values between white and blue collar homes was

Table 6. Means and Correlation with Estimated Value of the Home as the Dependent Variable

VARIABLE	MEAN	STD DEV
Home Value	32596.573	20051.224
Social Class	.464	.499
Age of head	43.726	12.906
Age squared	20.780	11.860
Income	14.138	10.168
Income squared	302.964	372.426
Race	.224	.418
Wife works	.414	.493
Education	13.137	3.593
Education sq.	18.545	9.030
Number children	1.361	1.473

n=321

CORRELATION

	VALUE	SOCCL	AGE	AGESQ	INC
VALUE	1.000	.451	.096	.068	.425
SOC CL	.451	1.000	-.037	-.038	.400
AGE	.096	-.037	1.000	.988	-.028
AGE SQ	.068	-.038	.988	1.000	-.057
INC	.425	.400	-.028	-.057	1.000
INCSQ	.450	.385	.017	-.010	.934
RACE	-.360	-.321	-.009	-.005	-.296
WIFE	-.074	-.060	-.125	-.135	.145
EDUC	.446	.536	-.221	-.229	.457
EDUCSQ	.468	.554	-.179	-.189	.463
CHILD	-.086	-.021	-.292	-.322	.045

	INCSQ	RACE	WIFE	EDUC	EDUCSQ	CHILD
VALUE	.450	-.360	-.074	.446	.468	-.086
SOCCL	.400	-.321	-.060	.536	.554	-.021
AGE	-.028	-.009	-.125	-.221	-.179	-.292
AGE SQ	-.057	-.005	-.136	-.229	-.189	-.322
INC	1.000	1.000	.145	.457	.463	.045
INC SQ	.934	-.296	.073	.416	.433	.024
RACE	-.296	-.268	.124	-.331	-.295	.244
WIFE	.145	.073	1.000	-.020	-.035	.013
EDUC	.457	.416	-.020	1.000	.974	-.022
EDUC SQ	.463	.433	.035	.974	1.000	-.024
CHILD	.045	.024	.013	-.022	-.024	1.000

Table 7. Regression Analysis with Estimated Value
of the Home as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Number of dependent children	-436.83	-.641
Wife work (1=wife works, 0=other)	-1235.70	-.644
Education of head	-797.34	-.695
Age of head	1532.35	3.232 ****
Black (1=black 0=other)	-8167.35	-3.292 ****
Income by 1000's squared	18.68	2.724
Social class	7679.89	3.451 **
Income by 1000's	-304.83	-1.168
Education of head squared/100	845.52	1.857
Age of head squared/100	-1489.85	-2.851 **
[Constant]	-10628.70	-.824

Adjusted R2 = .37304
F = 20.04****

*p ≤ .1
**p ≤ .05
***p ≤ .01
****p ≤ .001

\$7679. The mean home value for the sample was \$32,596, thus social class alone may account for a 23 percent difference in mean home value between white and blue collar households. When income was held constant, the value of the home varies by social class. For both white and blue collar households earning under \$60,000 annually, white collar households own homes of higher value. Blue collar families earning more than \$60,000 have a higher value of home than do white collar families earning more than \$60,000.

Race was inversely related to home value ($p=.001$), with blacks having homes with a mean value \$8167 less than whites when other variables were controlled.

The age of head and quadratic age of head terms were key variables in explaining the value of the home. There was a trend of increasing home values with increasing age in the sample, with this effect peaking at age 51.

The coefficients on the income terms may be due to a decreasing expenditure on housing consumption as incomes increase for households with very low income levels. These households may be spending a high percentage of their income on shelter, and increases in income would be for consumption of other goods, thus reducing the percentage of their income spent on shelter. Those households which did not have a very low income would follow the expected positive relationship between income and value of the home. The same explanation may also apply to the education terms, although they were not significant at the ten percent level.

Bedroom Deficit

The correlation matrix for the bedroom deficit is presented in Table 8 and the regression results appear in Table 9. The model tested to explain variation in the bedroom deficit was:

bedroom deficit = f(social class, age of head, income, education of head, family size, wife working, income squared, and education of head squared.)

While only three variables were significant, the model explained 46 percent of the variation. The most significant variable in the model was the number of dependent children at home ($p=.001$). As the number of dependent children increased, the bedroom deficit in the sample tended to increase.

Income squared was positively and significantly related to the bedroom deficit at the ($p=.05$) level, indicating those with higher incomes were more likely to have housing of higher quality. The significance of the quadratic income terms indicates a nonlinear relationship between income and bedroom deficits. Race also had inverse and significant ($p=.001$) coefficients, with blacks having a slightly higher bedroom deficit. All other variables had the predicted sign of coefficient, but were not significant the the .1 level.

Defect Index

The results of the correlation matrix for the model:

defect index = f(social class, age of head, income, education of head, family size, wife working, income squared, age of head squared, and education of head squared.)

appear in Table 8. Results of the regression analysis for the model are presented in Table 10. Although the same independent

Table B. Means and Correlation Matrix
for Quality Model

VARIABLE	MEAN	STD DEV
Bedroom deficit	.506	1.198
Defect index	1.407	3.216
Social class	.384	.487
Age of head	41.241	13.219
Age squared	18.752	11.715
Income	11.737	9.630
Race	.331	.471
Wife works	.388	.488
Education	12.718	3.564
Educ. sq.	17.442	8.850
Children	1.303	1.563
Income sq.	230.324	330.77
n=528		

CORRELATION

	BEDDEF	INDEX	SOCCL	AGE	AGESQ	INC
BEDDEF	1.000	-.272	.232	.183	.202	.279
INDEX	-.272	1.000	-.146	-.095	-.088	-.203
SOCCL	.232	-.146	1.000	.009	.008	.411
AGE	.183	-.095	.009	1.000	.988	.055
AGESQ	.202	-.088	.008	.988	1.000	.027
INC	.279	-.203	.411	.055	.027	1.000
RACE	-.355	.220	-.375	-.049	-.058	-.365
WIFE	.027	-.047	-.007	-.087	-.103	.173
EDUC	.230	-.224	.560	-.165	-.171	.457
EDUCSQ	.239	-.208	.584	-.121	-.128	.470
CHILD	-.600	.188	-.049	-.140	-.184	-.005
INCSQ	.275	-.173	.396	.082	.055	.931

	RACE	WIFE	EDUC	EDUCSQ	CHILD	INCSQ
BEDDEF	-.355	.027	.230	.239	-.600	.275
INDEX	.220	-.047	-.224	-.208	.188	-.173
SOCCL	-.375	-.007	.560	.584	-.049	.396
AGE	-.049	-.087	-.165	-.121	-.140	.082
AGESQ	-.058	-.103	-.171	-.128	-.184	.055
INC	-.365	.173	.457	.470	-.005	.931
RACE	1.000	.075	-.402	-.382	.227	-.321
WIFE	.075	1.000	.016	.005	-.053	.102
EDUC	-.402	.016	1.000	.978	-.058	.423
EDUCSQ	-.382	.005	.978	1.000	-.059	.447
CHILD	.227	-.053	-.058	-.059	1.000	.017
INCSQ	-.321	.102	.423	.447	.017	1.000

Table 9. Regression Analysis with Bedroom Deficit
as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Income by 1000' squared	6.925E-04	2.216 **
Number of dependent children	-.42	-15.947 ****
Wife work (1=wife works,0=other)	-.01	-.165
Age of head	7.256E-03	.370
Social class	.12	1.213
Black (1=black 0=other0	-.31	-3.158 ****
Education of head	3.605E-03	.067
Income by 1000's	5.428E-04	.047
Education of head squared/100	5.979E-03	.274
Age of head squared/100	9.747E-04	.044
[Constant]	.48	.929

Adjusted R2 = .46195

F = 46.24665 ****

*p < .1
**p < .05
***p < .01
****p < .001

Table 10. Regression Analysis with Defect Index
as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Income by 1000's squared	6.015E-04	.533
Number of dependent children	.33	3.566 ****
Wife work (1=wife works, 0=other)	-.14	-.496
Age of head	-.12	-1.759 ***
Social class	.04	.115
Black (1=black 0=other)	.57	1.714 *
Education of head	-.46	-2.443
Income by 1000's	-.04	-1.231
Education of head squared	.12	1.714 *
Age of head squared	.11	1.382
[Constant]	7.73	4.235

Adjusted R² = .10281
F = 7.03919****

*p ≤ .1
**p ≤ .05
***p ≤ .01
****p ≤ .001

variables are considered in this model as in the bedroom deficit model, the model with the defect index as the dependent variable only accounted for 10 percent of the variation. A high level of defects indicates a low level of quality, therefore the expected relationships between the dependent and independent variables are reversed for this model.

Education of the head, in both the quadratic and linear forms, appeared to be significant in explaining the variations in the defect index. Within this sample, there was a trend of households with higher education having a lower defect index. The number of dependent children at home was highly significant, with the defect index increasing as the number of children increased. Age of head was significantly and inversely related to defects, meaning that with the other variables controlled, older households had better housing. Blacks had a defect index higher than nonblacks. Income, social class, wife working, and age of head squared were not significant at the .1 level in this model.

Single Family Home

The impact of variables on whether the family lived in a single family home was measured by the regression model:

single family home = f(social class, age of head, race, income, education of head, family size, wife working, income squared, age of head squared, and education of head squared).

The means and correlation matrix is presented in Table 11, and the regression results are presented in Table 12. The age of head and quadratic age of head term were highly explanatory, with significance levels of .001 and .01, respectively. In this

Table 11. Means and Correlation Matrix with Single Family Home Residency as the Dependent Variable

VARIABLE	MEAN	STD DEV
Structure	.747	.435
Income Squared	230.418	332.215
Income	11.722	9.654
Race	.333	.472
Wife works	.389	.488
Education	12.705	3.562
Education squared	17.408	8.833
Number children	1.312	1.567
Age of head	41.109	13.159
Age squared	18.628	11.636
Social class	.381	.486

n=528

CORRELATION

	INCSQ	INC	RACE	WIFE	EDUC
STRUC	.198	.210	-.159	.039	.041
INCSQ	1.000	.931	-.159	.098	.425
INC	.931	1.000	-.321	.169	.457
RACE	-.321	-.366	1.000	.078	-.407
WIFE	.098	.169	.078	1.000	.013
EDUC	.425	.457	-.407	.013	1.000
EDUCSQ	.450	.471	-.387	.001	.977
CHILD	.018	-.004	.222	-.054	-.060
AGE	.083	.055	-.039	-.090	-.164
AGESQ	.057	.028	-.047	-.105	-.170
SOC CL	.401	.416	-.371	-.003	.566

	EDUCSQ	CHILD	AGE	AGESQ	SOCCL
STRUC	.051	.068	.338	.306	.112
INCSQ	.450	.018	.083	.057	.401
INC	.471	-.004	.055	.028	.416
RACE	-.387	.222	-.039	-.047	-.371
WIFE	.001	-.054	-.090	-.105	-.003
EDUC	.977	-.060	-.164	-.170	.566
EDUCSQ	1.000	-.061	-.121	-.127	.590
CHILD	-.061	1.000	-.133	-.178	-.043
AGE	-.121	-.133	1.000	.988	-.004
AGESQ	-.127	-.178	.988	1.000	-.007
SOCCL	.590	-.043	-.004	-.007	1.000

Table 12. Regression Analysis with Single Family Home Residency as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Social Class	.036	.800
Wife works (1=wife works, 0=other)	.046	1.275
Number of dependent children	.030	2.545 ***
Age of head	.038	4.297 ****
Income by 1000's squared/100	-4.6951E-05	-.320
Race	-.126	-2.888 ****
Education of head	7.8823E-03	.326
Income by 1000's	6.5257E-03	1.250
Education of head squared	-4.8956E-03	-.099
Age of head squared	-.305	-3.023 ***
[Constant]	-.361	1.520

Adjusted R² = .18043
F = 12.46026

*p ≤ .1
**p ≤ .05
***p ≤ .01
****p ≤ .001

sample, there was a trend toward increasing probability of living in a single family home as age increased. This trend peaks at age 62, and decreases after that point.

Race was significant at the .01 level, with blacks less likely to live a single family home.

The positive and significant coefficient for number of children at home follows Morris and Winter norm theory on the importance of families with children living in a single family home.

Wife working, income and education of head were not significant at the .1 level. Relationships were similar to those discussed in earlier achieved housing models.

Conclusions on the Impact of Social on Achieved Housing

The regression analyses suggest that social class is not significantly related to tenure, bedroom deficit or structural quality. Social class was highly significant in explaining the estimated value of the home. White collar households had mean values \$18,043 higher than blue collar households, 42,325 as compared to 24,282. Controlling for age of head, race, education of head and family size reduced the actual differences in the value of the home to \$7679, however.

Overall, blacks had a lower level of housing. Home values remained substantially lower, even with controls for age of head, education of head, income, and family size. Differences in home values between blacks and whites was reduced from \$17,855 to \$8167 by controlling for these variables. Ownership levels were lower, and bedroom deficits and defects

levels were higher. Since the lower achieved housing is not entirely related to constraints, other factors must be impacting black's housing decisions.

Age of head was positively related to achieved housing, ownership rates and quality.

The number of dependent children in the home was consistently a highly significant variable. Ownership was not affected by family size, while family size and quality levels were negatively related. This suggests that larger families are trading quality for additional space.

PREFERRED HOUSING

Morris and Winter norm theory predicts that preferences will be independent of social class and other demographic characteristics. Tenure preferences and preference for a single family home were tested using regression analysis for the following models:

Tenure Preferences

The model for tenure preference was:

tenure preferences = $f(\text{social class, age of head, income, race, education of head, family size, wife working, income squared, age of head squared, and education of head squared})$.

The correlation matrix is presented in Table 13 and the results of the regression analysis are presented in Table 14. Age of head was the only significant variable in the model, and was significant only at the ten percent level. This closely follows norm theory that preference to follow norms will not vary by demographic characteristics. The low R^2 is probably due to the homogeneity of the sample in preferring ownership as a tenure form, indicating that ownership preference does not vary according to social class.

Preference for Conventional Single Family Home

Norm theory predicts a conventional single family home is the preferred housing structure. Preference for this type of structure was used as the dependent variable in the regression model:

Table 13. Correlation Matrix with Tenure Preference as the Dependent Variable

VARIABLE	MEAN	STD DEV
Tenure pref.	.925	.263
Income sq.	230.418	332.215
Income	11.722	9.654
Race	.333	.452
Wife works	.389	.488
Education	12.705	3.562
Educ sq.	17.408	8.833
Children	1.312	1.567
Age of head	41.109	13.159
Age sq.	18.628	11.159
Social class	.381	.486

n=522

CORRELATION

	TENPREF	INCSQ	INC	RACE	WIFE
TEN PREF	1.000	.084	.094	-.045	.063
INCSQ	.084	.226	.931	-.321	.098
INC	.094	.931	1.000	-.366	.169
RACE	-.045	-.321	-.366	1.000	.078
WIFE	.063	.098	.169	.078	1.000
EDUC	.080	.425	.457	-.407	.013
EDUCSQ	.077	.450	.471	-.387	.001
CHILD	.059	.018	-.004	.222	-.054
AGE	.130	.083	.055	-.039	-.090
AGESQ	.114	.057	.028	-.047	-.105
SOCCL	.058	.401	.416	-.371	-.003

	EDUC	EDUCSQ	CHILD	AGE	AGESQ
TEN PREF	.080	.077	.059	.130	.114
INCSQ	.425	.450	.018	.083	.057
INC	.457	.471	-.004	.055	.028
RACE	-.407	-.387	.222	-.039	-.047
WIFE	.013	.001	-.054	-.090	-.105
EDUC	1.000	.977	-.060	-.164	-.170
EDUCSQ	.977	1.000	-.061	-.121	-.127
CHILD	-.060	-.061	1.000	-.133	-.178
AGE	-.164	-.121	-.133	1.000	.988
AGESQ	-.170	-1.27	-.178	.988	1.000
SOCCL	.566	.590	-.043	-.004	-.007

Table 14. Regression Analysis with Preferred Tenure
as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Social class	5.9258E-03	.019
Wife works (1=wife works, 0=other)	.0386	1.514
Number of dependent children	.0134	1.643
Age of head	.0111	1.833 **
Income by 1000's squared/100	-2.4514E-03	-.245
Race	-9.8507E-03	-.331
Education of head	.0192	1.168
Income by 1000's	1.2861E-03	.361
Education of head squared	-4.9995E-03	-.747
Age of head squared	-8.6994E-03	-1.263
[Constant]	.4298	2.657

Adjusted R² = .02809
F = 2.50599 ****

*p ≤ .1
**p ≤ .05
***p ≤ .01
****p ≤ .001

preference for a single family home = $f(\text{social class, age of head, race, income, education of head, family size, wife working, income squared, age of head squared, and education of head squared})$.

Table 15 presents the means and correlations, and Table 16 presents the regression analysis.

Age of head was the most significant variable, with significance at the .05 level. The quadratic age of head term and wife working were significant at the .1 level. Income, age and education appeared to have a nonlinear relationship with preference for a single family home. The negative income coefficient suggests that families with income levels prohibitive of purchasing a conventional single family home may adjust their preferences to a more financially accessible structure type. Other variables the predicted relationship with the dependent variable, but were not significant at the .1 level. The lack of highly significant variables and the low amount of variance in the model substantiate the strength of the preference to follow housing norms does not vary by social class.

Conclusions on the Impact of Social Class on Preferences

Social class was not significantly related to tenure preference and preference for a conventional single family home, supporting the hypothesis that housing preference is not influenced by social class. All models indicate that preferences are consistent with general housing norms. As housing norm theory predicts, housing norms may be so widely accepted that preference to follow these norms will not vary due to demographic or other characteristics. This is indirectly substantiated by

noting that education, race, income, family size, and social class did not add to the explanatory power of the preference models.

Table 15. Correlation Matrix with Structure Preference as the Dependent Variable

VARIABLE	MEAN	STD DEV
Struc. Pref.	.925	.263
Income sq.	230.418	332.215
Income	11.722	9.654
Race	.333	.452
Wife works	.389	.488
Education	12.705	3.562
Educ sq.	17.408	8.833
Children	1.312	1.567
Age of head	41.109	13.159
Age sq.	18.628	11.159
Social class	.381	.486

n=522

CORRELATION

	STRUCPREF	INCSQ	INC	RACE	WIFE
STRUCPREF	1.000	.051	.037	-.031	.062
INCSQ	.051	.226	.931	-.321	.098
INC	.037	.931	1.000	-.366	.169
RACE	-.031	-.321	-.366	1.000	.078
WIFE	.062	.098	.169	.078	1.000
EDUC	.052	.425	.457	-.407	.013
EDUCSQ	.049	.450	.471	-.387	.001
CHILD	.049	.018	-.004	.222	-.054
AGE	.047	.083	.055	-.039	-.090
AGESQ	.029	.057	.028	-.047	-.105
SOCCL	.058	.401	.416	-.371	-.003

	EDUC	EDUCSQ	CHILD	AGE	AGESQ
STRUCPREF	.052	.049	.047	.046	.029
INCSQ	.425	.450	.018	.083	.057
INC	.457	.471	-.004	.055	.028
RACE	-.407	-.387	.222	-.039	-.047
WIFE	.013	.001	-.054	-.090	-.105
EDUC	1.000	.977	-.060	-.164	-.170
EDUCSQ	.977	1.000	-.061	-.121	-.127
CHILD	-.060	-.061	1.000	-.133	-.178
AGE	-.164	-.121	-.133	1.000	.988
AGESQ	-.170	-.127	-.178	.988	1.000
SOCCL	.566	.590	-.043	-.004	-.007

Table 16. Regression Analysis with Preference for a Conventional Single Family Home as the Dependent Variable

INDEPENDENT VARIABLES (in order entered)	COEFF.	t
Social class	.0228	.751
Wife works (1=wife works, 0=other)	.0421	1.686 *
Number of dependent children	7.1594E-03	.893
Age of head	.0123	2.091 **
Income by 1000's squared/100	1.1869E-04	1.215
Education of head	.0116	-.628
Income by 1000's	-4.9123E-03	.725
Education of head squared	-3.5406E-03	-1.413
Age of head squared	-.0126	-1.87 *
[Constant]	.5679	3.593

Adjusted R² = .02593
F = 1.36

*p < .1
**p < .05
***p < .01
****p < .001

INCOME ELASTICITY

Income is a key variable in housing consumption, as indicated in the review of literature. It is thus important to determine the effect of changes in income have on housing expenditures. Estimates of income elasticity will be used to examine whether the impact of changes in income on housing consumption vary by social class.¹

The model used to estimate income elasticities is based on the regression model: value of the home = $f(\text{social class, age of head, education of head, income, black, wife working, number of dependent children, age of head squared, income squared, education of head squared, blue collar black households, blue collar income, black income, blue collar income squared, and black income squared})$. Blue collar black households, blue collar income, black income, blue collar income squared, and black income squared were interaction variables used to examine the relationship between income, social class, and race. The correlation matrix for the model is presented in Table 17 and the regression analysis is presented in Table 18.

¹ income elasticity is defined as the proportional change in the quantity purchased by the proportional change in income.

Table 17. Correlation Matrix of Income Elasticity Variables

VARIABLE	MEAN	STD DEV
Home value	32596.573	20051.224
Age of head	43.726	12.906
Age squared	302.964	372.426
Income 1000	14.138	10.168
Race	.224	.418
Wife works	.414	.493
Education	13.137	3.593
Education sq	18.545	9.030
Number children	1.361	1.473
(BLBC) Blue Collar * Black	.187	.390
(BINC) Black * Income	1.919	4.768
(BCINC) Blue Collar * Income	5.552	7.769
(BINCSQ) Black * Income sq.	26.343	91.868
(BCINCSQ) Blue Collar * Inc sq.	90.997	187.560
Social Class	.464	.499

n=321

CORRELATION

	VALUE	AGE	AGESQ	INCSQ	INC	RACE
VALUE	1.000	.096	.068	.450	.425	-.360
AGE	.096	1.000	.988	.017	-.028	-.009
AGE SQ	.068	.988	1.000	-.010	-.057	-.005
INC	.450	.017	-.010	1.000	.934	-.268
INC SQ	.425	-.028	-.057	.934	1.000	-.296
RACE	-.360	-.009	-.005	-.268	-.296	1.000
WIFE	-.074	-.125	-.136	.073	.145	.124
EDUC	.446	-.221	-.229	.416	.457	-.331
EDUC SQ	.468	-.179	-.189	.433	.463	-.295
CHILD	-.086	-.292	-.322	.024	.045	.244
BINC	-.232	-.058	-.059	-.072	-.016	.750
BLBC	-.366	.015	.021	-.276	-.311	.892
BCINC	-.153	.046	.030	.053	.159	.051
BINCSQ	-.132	-.036	-.041	.033	.088	.534
BCINCSQ	-.018	.051	.030	.227	.288	-.048
SOCCL	.451	-.037	-.038	.385	.400	-.321

TABLE 17, cont.

	WIFE	EDUC	EDUCSQ	CHILD	BINC
VALUE	-.074	.446	.468	-.086	-.232
AGE	-.125	-.221	-.179	-.292	-.058
AGE SQ	-.136	-.229	-.189	-.322	-.059
INC SQ	.073	.416	.433	.024	-.072
INC	.145	.457	.463	.045	-.016
RACE	.124	-.331	-.295	.244	.750
WIFE	1.000	-.020	-.035	.013	.199
EDUC	-.020	1.000	.974	-.022	-.070
EDUC SQ	-.035	.974	1.000	-.024	-.059
CHILD	.013	-.022	-.024	1.000	.155
BINC	.199	-.070	-.059	.155	1.000
BLBC	.083	-.422	-.391	.208	.567
BCINC	.230	-.222	-.268	.009	.163
BINC SQ	.194	.054	.065	.068	.924
BCINC SQ	.225	-.094	-.134	-.009	.078
SOCL	-.060	.536	.554	-.021	-.161

	BLBC	BCINC	BINC SQ	BCINC SQ	SOCL
VALUE	-.366	-.153	-.132	-.018	.451
AGE	.015	.046	-.036	.051	-.037
AGE SQ	.021	.030	-.041	.030	-.038
INC SQ	-.276	.053	.033	.227	.385
INC	-.311	.159	.088	.288	.400
RACE	.892	.051	.534	-.048	-.321
WIFE	.083	.230	.194	.225	-.060
EDUC	-.422	-.222	.054	-.094	.536
EDUC SQ	-.391	-.268	.065	-.134	.554
CHILD	.208	.009	.068	-.009	-.021
BINC	.567	.163	.924	.078	-.161
BLBC	1.000	.123	.329	-.005	-.446
BCINC	.123	1.000	.138	.915	-.666
BINC SQ	.329	.138	1.000	.106	-.056
BCINC SQ	-.005	.915	.106	1.000	-.452
SOCL	-.446	-.666	-.056	-.452	1.000

Table 18. Revised Regression with Estimated Value
of the Home as the Dependent Variable

Independent Variables (in order entered)	Coeff.	t
Social class	18529.53	3.959 ****
Number of dependent children	-539.54	-0.790
Wife work (1=wife employed, 0=other)	-1616.68	-0.836
Black * income squared	-7.57	-0.21
Age of head	1554.87	3.28 ****
Income by 1000's squared	29.09	3.32 ****
Blue collar * black	5962.88	1.09
Education of head squared/100	1092.12	2.33
Blue collar * income squared	-18.79	-1.09
Race	-9417.44	-1.31
Income by 1000's	-872.23	-2.36
Black * income by 1000's	-163.99	1.81
Education of head	-1284.79	-1.09
Blue collar * Income by 1000's	1124.19	1.96 **
Age of head squared/100	-1549.43	-2.97 **
[Constant]	-13267.00	-1.009
2		
Adjusted R = .38093	*p ≤ .1	
F = 14.12****	**p ≤ .05	
	***p ≤ .01	
	****p ≤ .001	

Income elasticity for blue collar households was .0197. White collar households had a slightly higher elasticity of .1647. This means that for every \$100 increase in income, blue collar households will spend \$1.97 more on housing and white collar households will spend an additional \$16.47. This seems to be a substantial difference between the two social classes.

Due to the significant impact of race in the estimated value of the home, separate estimates of income elasticities were completed for white collar white households, white collar black households, blue collar white households, and blue collar black households. The hypothesis that income elasticities vary by race was confirmed. White collar white households had the highest estimate of income elasticity, with an estimate of .33. White collar black households had a substantially lower estimate of 0.01805. Blue collar white households also had a higher estimate of .139, with blue collar blacks having the lowest estimate of 0.043. In both social classes, white households had higher estimate of income elasticity than black households. Thus, the differences in elasticities between the two social class may be partially explained by racial composition.

The apparent differences in income elasticities must be carefully analyzed. One explanation for the differences is a lower permanent income in the blue collar group. Blue collar laborers tend to have less stable employment, thus lowering permanent income. Since housing consumption is thought to be based on long term financial expectations, a lower permanent income would result in lower housing consumption for the group.

The same theory holds for the difference in estimates for black and white households. If blacks are experiencing discrimination in the labor market, their incomes would be lower and less stable. Also, housing consumption does not change rapidly. Therefore, income elasticities may be based on housing decisions made a number of years earlier, when racial differences in the labor market and housing market may have been more pronounced.

The social class variable was significant at the .001 level. Age of head and income squared were also significant at the .001 level. The interaction variable, blue collar income, and the quadratic terms for education of head and age of head were significant at the .05 level. Income was significant at the .01 level. The variable black was highly and negatively correlated with income.

The variables black blue collar, income, education of head and the quadratic term for age of head do not have expected signs. The blue collar black group had rates of ownership of a single family home exceeding the white collar black group.

Analysis of Low Estimates of Elasticity

There are several possible explanations for the low estimates of elasticity. The primary reason is the use of current income rather than permanent income. Current income does not represent the stability of the income for making long term housing consumption decisions. Fluctuations in income would lead to a lower permanent income and cause a reduction in income elasticities. Homogeneity of the sample may also have been a factor. All respondents live in the same metropolitan

area and have heads of household in the labor force. This is a desired control, as it allows for comparison of housing consumption in a consistent market situation. Thus, the measurement is of response to the same market, rather than measuring differences in housing markets. All major demographic variables have been controlled, thus all households are relatively similar, which is an additional control. Furthermore, the selection of homeowners only has made the sample size relatively small, and this has been shown to have a reducing effect on income elasticity.

Conclusions on Income Elasticity

The substantial difference in income elasticities does not support Hypothesis 3. White collar households are predicted to direct more of their increased income to housing expenditure than are blue collar households.

Chapter VII

SUMMARY AND CONCLUSIONS

Purpose

The purpose of this thesis was to examine the impact of social class on housing consumption. Social class has been shown to be a significant variable in consumption of visible goods requiring major expenditure. Therefore, this thesis was to test the hypothesis that social class may be an explanatory variable in achieved housing, preferred housing, and income elasticity.

Procedure

Data used in this thesis was based on personal interviews with 1010 randomly sampled Montgomery, Alabama households. Only households with the head of household employed were included, resulting in a sample size of 547 households.

Method of Analysis

General characteristics of the sample were examined using frequency distribution and cross tabulation analysis. Multiple regression and comparison of means were used to determine the explanatory power of social class in seven models. Dependent variables examined were tenure, value of home, bedroom deficit, defect index, structure type, tenure preference, and preference for a conventional single family home.

Major Findings

Findings will be presented under each of the three hypotheses.

Hypothesis 1: It is hypothesized that when constraints are controlled, ownership, structure type, value of the home and quality levels are expected to be similar across blue and white collar households. When constraints are not controlled, blue collar households are expected to have lower ownership rates, own fewer single family homes, and live in homes of lower value and quality than white collar households.

Achieved housing was represented by tenure status, quality level, home value and structure type. The bedroom deficit and defect index were used to assess quality levels.

The findings indicate that social class was not significant in predicting tenure when constraints are controlled. When constraints are not controlled, white collar households have a higher ownership rate.

Social class was significant in predicting the value of the home, with white collar households owning homes of substantially higher value than blue collar households, with constraints controlled. The difference in value was greater with constraints not controlled.

Social class was not significant in the two regression analyses of quality. However, when constraints were not controlled, blue collar households had higher bedroom deficits and a higher mean number of defects than did white collar households.

Race, age of household head, income and number of dependent children were significant variables in explaining achieved housing.

Hypothesis 2: It is expected that both blue and white collar households will prefer a conventional single family home and ownership over renting as a tenure choice.

Preference for a single family home and tenure preference were used to compare preferences between blue and white collar households.

Social class was not found to be a significant variable in any of the preference models, which suggests an acceptance of Hypothesis 2. Key variables in housing preferences were age of head, the income terms, and number of dependent children at home.

Hypothesis 3: It is hypothesized that income elasticities will be similar across social classes.

White collar households had estimated income elasticities substantially higher than blue collar households, thus hypothesis 3 is not supported. The difference may be due to different points on the income scale for the two social classes.

Major Conclusions

The basic purpose of this thesis was to examine the impact of social class on housing consumption. Results indicate that social class may be related to a limited number of housing characteristics. This research suggests that differences in housing consumption are primarily a function of socioeconomic constraints such as income, age, education and number of dependent children, rather than a function of social class characteristics. It is clear that socioeconomic constraints must

be controlled to achieve an accurate estimate of the significance of social class.

The research also adds to the continuing debate on the significance of social class as a housing consumption variable. Findings of this research substantiate the conclusions by Morris and Winter that housing norms and preferences do not vary as a result of social class characteristics. The conclusion that observed differences in housing consumption were a result of socioeconomic factors, rather than a function of social class characteristics concurs with earlier studies using empirical analysis and controlling for demographic variables. The findings of this research further question the validity of literature suggesting social class a significant variable. The present findings counter those studies that did not control for social and economic constraints and were lacking in empirical analysis. It also refutes Coleman's detailed description of the housing consumption typical of each social class, which was based on observation.

The research also contributed to the discussion of the relative significance of income and social class in the consumption of goods requiring high expenditure. The findings indicate that social class is significant only in influencing the dollar value of the home. Other characteristics are primarily influenced by income and other economic constraints. The differences in the dollar value of the home could further be explained by a lower permanent income for blue collar workers. Blue collar workers may have less stable employment, and less likely to anticipate a higher income as their age increases.

Their lower permanent income may also make them less likely candidates for obtaining loans for purchasing housing or making home improvements.

The research substantiates the theory that housing norms are consistent across a range of demographic characteristics. Preference to follow norms did not differ by race, income, or social class. Current housing characteristics followed norms in a high percentage of the sample, and were significantly influenced by age of head, income and number of dependent children. Thus, deviations from the norm were not a function of preferences, but of economic constraints.

Permanent Income Theory

It is suggested that differences in housing consumption for the two social class may be related to differences in permanent income. Permanent income theory suggests that decisions to purchase goods requiring major expenditure, such as housing, are based on long term financial expectations. It is suggested that the several variables be considered when comparing the financial expectations of households in this sample.

Permanent income is expected to vary by occupational status, with blue collar workers expecting a lower permanent income. Blue collar workers tend to have less stable employment, and wages do not increase greatly with age and work experience. White collar workers tend to have a more stable employment, and can expect long term income gains. Thus, young blue and white collar employees who currently have the same income would be expected to make different housing consumption decisions, based

on their expected permanent income. Households are also expected to take into consideration such variables as expected family size and expected number of earners as factors influencing long term financial ability. While it is difficult to test the permanent income theory, research results suggest these factors may have had an impact.

Implications

The findings of this research question the validity of previous studies on social class that did not control for social and economic constraints. Further research on the impact of social class on the consumption of goods requiring major expenditure is suggested. The study was limited by the strength of housing norms, which discourage diversity in housing consumption. It is suggested that the impact of social class be analyzed in products where there is not one standard, preferred product, and there is a greater diversity in consumption. This should allow for analysis of differences in consumption created by social class characteristics.

This research also substantiates the preference to follow norms for households with varying demographic characteristics. The consistent desire to follow norms should be taken into consideration in the implementation of government programs. It is clear that consumers seek housing meeting norms and are willing to make sacrifices to obtain such housing. Thus, government housing programs that enable households to meet these norms will be more successful than those providing units not in concurrent with norms.

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90

APPENDIX A
INTERVIEW SCHEDULE

AUBURN UNIVERSITY

CITY OF MONTGOMERY OFFICE OF PLANNING AND DEVELOPMENT

HOUSING SURVEY - 1976

<p>1. Was the place you spent most of your childhood in:</p> <p><input type="checkbox"/> large city</p> <p><input type="checkbox"/> suburb of a city</p> <p><input type="checkbox"/> small or medium sized city</p> <p><input type="checkbox"/> village or small town</p> <p><input type="checkbox"/> rural open country area</p> <p><input type="checkbox"/> OK</p> <p>(1)</p>	<p>2. Before you moved here, did you live in:</p> <p><input type="checkbox"/> large city</p> <p><input type="checkbox"/> suburb of a city</p> <p><input type="checkbox"/> small or medium sized city</p> <p><input type="checkbox"/> village or small town</p> <p><input type="checkbox"/> rural open country area</p> <p><input type="checkbox"/> OK</p> <p>(10)</p>	<p>3. Was there:</p> <p><input type="checkbox"/> in the city of Montgomery</p> <p><input type="checkbox"/> in the public jurisdiction of Montgomery</p> <p><input type="checkbox"/> in Montgomery County</p> <p><input type="checkbox"/> in Alabama but not in Montgomery</p> <p><input type="checkbox"/> OK</p> <p>(11)</p>	<p>4. How do you feel about this neighborhood as a place to live?</p> <p><input type="checkbox"/> I like it very much</p> <p><input type="checkbox"/> I like it but not too much</p> <p><input type="checkbox"/> I don't like it</p> <p><input type="checkbox"/> I dislike it a great deal</p> <p><input type="checkbox"/> OK</p> <p>(14)</p>	<p>5. What type of dwelling did you live in before you moved here?</p> <p><input type="checkbox"/> single family detached home</p> <p><input type="checkbox"/> duplex</p> <p><input type="checkbox"/> townhouse</p> <p><input type="checkbox"/> mobile home not on a permanent foundation</p> <p><input type="checkbox"/> apartment in a house</p> <p><input type="checkbox"/> apartment in a building of 4 stories or less</p> <p><input type="checkbox"/> apartment in a building of 5 stories or more</p> <p><input type="checkbox"/> other (describe) _____</p> <p><input type="checkbox"/> more than one type: _____</p> <p>(15)</p>	<p>6. Did your family own or rent the home?</p> <p><input type="checkbox"/> rent</p> <p><input type="checkbox"/> own</p> <p><input type="checkbox"/> rent-free</p> <p><input type="checkbox"/> OK</p> <p>(16)</p>	<p>7. How far as the contract and satisfaction of you and your family are concerned, how do you feel about things that you like BEST about living here?</p> <p><input type="checkbox"/> rent</p> <p><input type="checkbox"/> own</p> <p><input type="checkbox"/> rent-free</p> <p><input type="checkbox"/> have always lived here</p> <p><input type="checkbox"/> OK</p> <p>(18)</p>	<p>8. What are the things that you like LEAST about living here?</p> <p>1. _____</p> <p>2. _____</p> <p>3. _____</p> <p>(19)</p>
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(29-30) ;

(31-32) ;

<p>46. Are any of the following conditions present in your home? If yes, are they major or just minor?</p> <p>1 Yes 2 No 3 Partially</p> <p>a. Leaked in the roof b. Cracks in the foundation c. Cracks (other than hairline) in walls or ceilings d. Sags, bulges in walls or ceilings e. Peeling paint on outside walls f. Peeling paint on inside walls g. Bump of door end outside frame h. Bump of porch and outside steps i. Floor covering j. Broken or missing window glass k. Broken or missing window sill or exterior walls or foundation l. Badly or insect damage</p> <p>(30-33)</p>	<p>47. In your home:</p> <p>0 Not furnished at all 1 Partially furnished 2 Fully furnished 3 NK</p> <p>48. How much do you pay per month on the average for:</p> <p>a. Fuel b. Water c. Sewer d. Garbage removal</p> <p>(30-30)</p>	<p>49. What type of heating system do you have?</p> <p>0 No fuel used 1 Radiator 2 Hot water (boiler or LP) 3 Fuel oil, kerosene 4 Electricity 5 Gas or coke 6 Other 7 Combination 8 NK</p> <p>(30-35)</p>	<p>50. What type of heating system do you have?</p> <p>0 Space heater, electric 1 Space heater, gas 2 Radiator 3 Fireplace 4 Central heat, part of house 5 Central heat, coal house 6 Central heat, oil house 7 Combination, space, steam and/or fireplace 8 NK, etc</p> <p>(31)</p>	<p>51. In the past 3 years, have you tried to get help for a housing problem or information about housing from any of the following?</p> <p>0 1 2 3 4 5</p> <p>a. Cooperative Extension Service b. Federal Housing Administration c. For other U.S.C. Program d. U.S.C. Housing Institute e. (Specify) f. Public housing authority g. Other</p> <p>(30-37-40)</p>	<p>52. What kind of help did you get? (Enter the number in each column shown right.)</p> <p>1 No help received 2 Referred to another agency 3 Financial help 4 Did not ask this agency</p>
<p>53. The arrangement of rooms in your home:</p> <p>a. The number of rooms b. The amount of storage that you have for preparing food c. The type of house that you live in (single family, apt., etc.) d. The overall appearance of your home e. The amount of outdoor space that you have f. The amount that you pay for utilities (water, lighting, heat, etc.) g. Your water supply h. Your sewage disposal method i. Whether you have a swimming pool j. Whether you have an air-conditioner k. Whether you own a car l. Whether you own a truck m. Whether you own a boat n. Whether you own a motorcycle o. Whether you own a snowmobile p. Whether you own a motorhome q. Whether you own a trailer r. Whether you own a boat s. Whether you own a truck t. Whether you own a boat u. Whether you own a motorcycle v. Whether you own a snowmobile w. Whether you own a motorhome x. Whether you own a trailer</p>	<p>54. In terms of the way your family gets its living, please rate each of the following characteristics of your present home from 1 to 5. If the characteristic is not present here in just like your family needs it, you would rate it as 5. If the characteristic is not like your family needs it to be, but it is adequate, you would rate it as 4. If it is not like your family needs it to be, but it is adequate, you would rate it as 3. If it is not like your family needs it to be, but it is adequate, you would rate it as 2. If it is not like your family needs it to be, but it is adequate, you would rate it as 1. (GROSS RENT TO RECOMMEND.)</p>	<p>55. In the past 3 years, have you tried to get help for a housing problem or information about housing from any of the following?</p> <p>0 1 2 3 4 5</p> <p>a. Cooperative Extension Service b. Federal Housing Administration c. For other U.S.C. Program d. U.S.C. Housing Institute e. (Specify) f. Public housing authority g. Other</p> <p>(30-37-40)</p>	<p>56. What kind of help did you get? (Enter the number in each column shown right.)</p> <p>1 No help received 2 Referred to another agency 3 Financial help 4 Did not ask this agency</p>	<p>57. The arrangement of rooms in your home:</p> <p>a. The number of rooms b. The amount of storage that you have for preparing food c. The type of house that you live in (single family, apt., etc.) d. The overall appearance of your home e. The amount of outdoor space that you have f. The amount that you pay for utilities (water, lighting, heat, etc.) g. Your water supply h. Your sewage disposal method i. Whether you have a swimming pool j. Whether you have an air-conditioner k. Whether you own a car l. Whether you own a truck m. Whether you own a boat n. Whether you own a motorcycle o. Whether you own a snowmobile p. Whether you own a motorhome q. Whether you own a trailer</p>	<p>58. In terms of the way your family gets its living, please rate each of the following characteristics of your present home from 1 to 5. If the characteristic is not present here in just like your family needs it, you would rate it as 5. If the characteristic is not like your family needs it to be, but it is adequate, you would rate it as 4. If it is not like your family needs it to be, but it is adequate, you would rate it as 3. If it is not like your family needs it to be, but it is adequate, you would rate it as 2. If it is not like your family needs it to be, but it is adequate, you would rate it as 1. (GROSS RENT TO RECOMMEND.)</p>

<p>34. If it were available, would you like to have your own individual home? (33)</p> <p>0 No 1 Yes</p>	<p>35. In the past 3 years, have you tried to get a loan to make some home improvements?</p> <p>0 No 1 Yes</p>	<p>36. Do you think that you could get a loan during the next year to make a housing improvement costing as much as \$500?</p> <p>0 No 1 Yes</p>	<p>37. From whom did you apply for a loan?</p> <p>APPLIED TO</p> <p>RECEIVED</p> <p>1. Bank _____ 2. Contractor _____ 3. Federal Reserve Bank _____ 4. Friend/Whom _____ 5. Relative _____ 6. Landlord _____ 7. Insurance company _____ 8. Savings and loan _____ 9. Other (specify) _____ 10. No loan (22-45)</p>
<p>38. How, let's talk about some of the skills that members of your household have. How many of the following skills do you have? (43)</p> <p>0 No 1 Yes</p>	<p>39. If financing could be made available for the cost of materials, would you or some member of this household have the skills to do it fully or only partially? (43)</p> <p>0 No 1 Partially 2 Fully</p>	<p>40. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>41. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>
<p>42. If financing could be made available for the cost of materials, would you or some member of this household have the skills to do it fully or only partially? (43)</p> <p>0 No 1 Partially 2 Fully</p>	<p>43. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>44. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>45. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>
<p>46. How, let's talk about some of the skills that members of your household have. How many of the following skills do you have? (43)</p> <p>0 No 1 Yes</p>	<p>47. If financing could be made available for the cost of materials, would you or some member of this household have the skills to do it fully or only partially? (43)</p> <p>0 No 1 Partially 2 Fully</p>	<p>48. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>49. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>
<p>50. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>51. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>52. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>53. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>
<p>54. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>55. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>56. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>57. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>
<p>58. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>59. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>60. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>	<p>61. Would you or someone in this household be interested in attending group meetings (classes) at the neighborhood community center to learn any of the following? If so, please tell us why (one-by-one), the evening (left & right), frequency, or anytime. (43-45)</p> <p>NO YES ANYTIME</p>

Family Background

53. In order to group similar families together and to tell what their housing needs are, we would like to know something about the people in this house. (Circle only people currently living in the house or ever at college.)

How many people live in this house, including children away at school? _____

FIRST NAME	RELATION TO HEAD	SEX	AGE	EDUCATION COMPLETED OR BEING	EMPLOYMENT LAST YEAR	NO. OF HRS. USUALLY WORKED PER WEEK AT THIS EMPLOYMENT	DISABILITIES (SPECIFY TYPE) IF ANY	WORKING PRESENTLY AS A STUDENT
1. _____	1. HEAD	M	3	0-10	1. FULL 2. PART 3. SEASONAL 4. UNEMPLOYED 5. RETIRED 6. SICK 7. DISABLED 8. OTHER	7		9
2. _____	2. SPOUSE	F	4					
3. _____	3. SON	M						
4. _____	4. DAUGHTER	F						
5. _____	5. FATHER	M						
6. _____	6. MOTHER	F						
7. _____	7. OTHER							
HEAD								

Page 7
Card 6

54. How many times did you travel around the city? _____ (1-3)

55. How many times did you travel around the city? _____ (4-7)

56. How many times did you travel around the city? _____ (8-9)

57. How many people in your household over the age of 16 have a driver's license? _____ (10-11)

58. How many people in your household over the age of 16 have a driver's license? _____ (12-13)

59. How many people in your household get to work by _____ (14-15)

60. How many people in your household get to work by _____ (16-17)

61. How many people in your household get to work by _____ (18-19)

62. How many people in your household get to work by _____ (20-21)

63. How many people in your household get to work by _____ (22-23)

64. How many people in your household get to work by _____ (24-25)

65. How many people in your household get to work by _____ (26-27)

66. How many people in your household get to work by _____ (28-29)

67. How many people in your household get to work by _____ (30-31)

68. How many people in your household get to work by _____ (32-33)

69. How many people in your household get to work by _____ (34-35)

70. How many people in your household get to work by _____ (36-37)

71. How many people in your household get to work by _____ (38-39)

72. How many people in your household get to work by _____ (40-41)

73. How many people in your household get to work by _____ (42-43)

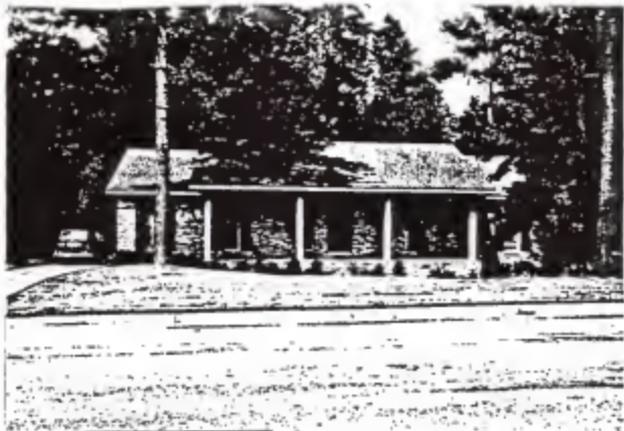
74. How many people in your household get to work by _____ (44-45)

75. How many people in your household get to work by _____ (46-47)

76. How many people in your household get to work by _____ (48-49)

APPENDIX B

PHOTO SET



CONVENTIONAL HOME



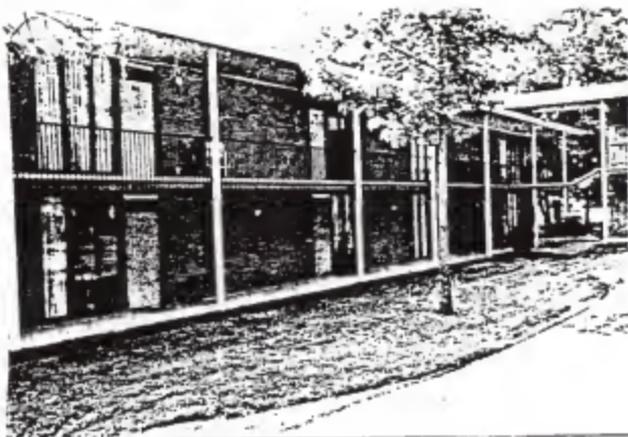
APT. IN A MULTISTORY BUILDING



MOBILE HOME



TOWNHOUSE



DUPLEX



APT. IN 2 STORY BUILDING

APPENDIX C

LISTING OF SOCIAL CLASS FOR SAMPLE OCCUPATIONS

The social class designation for occupations of heads of household in the sample was based on wage/salary and nonmanual/manual labor.

BLUE COLLAR

Maid
Waitress
Secretary
Truck driver
Babysitter
Machine operator
Welder
Taxi driver
Laundry
Sanitation dept.
Conductor
Mechanic
Domestic
Brakeman
Construction
Construction crew foreman
Shoe salesman
Barber
Yard work
Retail sales clerk
Nurse's aid
Fire fighter
Warehouse
Cook
Cabinetry
Counter clerk
Janitor
Beautician
Butcher
Electrician
Dry cleaning
Plumber
Grocery store clerk
City laborer
Painter
Service station attendant
Wood chopper
Mason
Clerk in florist
Street construction

Fork lift operator
Steel worker
Parking attendant
Mail man
Packer
Floor coverer
Sheet rock
Furniture coverer
Stenographer
Night watchman
Ticket agent
Messenger
Bartender
Paper carrier
Draftsman
Shoe repairman
Heating and air cond.
Switchman
Seamstress
Vending
Roofer
Boiler operator
Weaver

WHITE COLLAR

Accountant
Journalist
Advertising agent
Marketing rep
Purchasing agent
Educational consultant
Grocery store owner
Industrial relations
Counselor
Teacher
Chiropracter
Police detective
College professor
Appraiser
Executive secretary
X-Ray technician
Attorney
Clergy
Social Worker
Engineer
Optician
Hospital administration
Farmer
Realtor
Bank president

Medical lab technician
Insurance salesman
School principal
Pharmacist
Chemist
Pilot
Bank examiner
Professional golfer
Finance
Pediatrician
Office manager

SOCIAL CLASS AND HOUSING: HOUSING ACHIEVED, HOUSING PREFERRED,
AND INCOME ELASTICITY OF BLUE AND WHITE COLLAR
HOUSEHOLDS IN MONTGOMERY, ALABAMA

by

KIMBERLEY SUE HEFLEY

B.S., Kansas State University, 1983

AN ABSTRACT OF A MASTER'S THESIS

submitted in partial fulfillment of the
requirements for the degree

MASTER OF SCIENCE

Department of Family Economics

Kansas State University
Manhattan, Kansas

1986

The purpose of this thesis is to examine the influence of social class on housing consumption. Whether housing consumption reflects class values and acts as a symbol of class membership, or whether income alone influences choice, is examined. Housing consumption is compared across social classes in the three major categories achieved housing, preferred housing, and income elasticity.

The data used is based on 1010 households participating in personal interviews in a random sampling of Montgomery, Alabama. Information was gathered on past, current and expected housing. The present analysis households with the head of household employed were analyzed, resulting in a final subsample of 547.

The designation of blue and white collar households was used to define social class. Craftsmen, service, and wage earning employees were classified as blue collar. Professionals, managers, salaried personnel and owners of small businesses were classified as white collar.

Multiple regression, comparison of means, and frequency distributions were used to test the hypotheses.

Frequency distributions on achieved housing indicated that blue collar households had lower ownership rates, and lived in older, lower quality homes of less value than did white collar households. However, when other demographic variables were controlled, social class was not significant at the .05 level for achieved tenure or quality levels. Social class was significant

at the .001 level in the estimated value of the home. Key variables in achieved housing were age of household head, race, and number of dependent children at home.

As predicted by housing norm theory, preferences did not vary by social class or other demographic variables. Social class had a positive relationship with housing preferences variables, but was not significant at the .05 level in any housing preference model. The age of head and wife working were the only significant variables. Income elasticities did vary by social class, with blue collar households having an estimated elasticity of .0197 and white collar households having a higher estimate of .1647. The low estimates of elasticity are most likely due to the use of current income and the homogeneity of the sample.