

BLACK SUBURBANIZATION AND RACIAL CHANGE, 1970-1980

Elaine L. Fielding

CDE Working Paper 87-24

BLACK SUBURBANIZATION
AND
RACIAL CHANGE, 1970-1980

by

Elaine L. Fielding

A thesis submitted in partial fulfillment of the
requirements for the degree of

MASTER OF SCIENCE
(Sociology)

at the

UNIVERSITY OF WISCONSIN--MADISON

1987

TABLE OF CONTENTS

	Page
List of Tables and Figures	ii
Acknowledgements	iii
Abstract	iv
INTRODUCTION	1
LITERATURE REVIEW	2
STATEMENT OF PROBLEM	8
DATA AND METHODS	10
RESULTS	12
Aggregate Trends	12
Trends in Racial Composition	14
Typology Description	17
Typology Results	20
Distribution of Blacks and Whites	24
CONCLUSION.	27
Appendix A.	31
Tables	32
Figures	39
References	42

LIST OF TABLES AND FIGURES

Table	Page
1 Aggregate Characteristics of Suburban Places in Selected SMSAs	32
2 Distribution of Places by Racial Composition	33
3 Black Population Growth by Racial Composition of Place	34
4 Description of Racial Change Typology and Distribution of Suburban Places By Racial Change Category	35
5 Aggregate Characteristics of Suburban Places by Racial Change Category	36
6 Percent Distribution of Suburban Places across Racial Change Categories in SMSAs with more than 30 Places	37
7 Percent Distribution of Suburban Blacks and Whites across Racial Change Categories	38
Figure	
1 Percent Black 1970 by Percent Black 1980 for Suburban Places in Selected SMSAs	39
2 Distribution of Places by Percent Black (for Places than 10% Black)	40
3 Cumulative Distribution of Blacks and Whites by Racial Composition of Place	41

ACKNOWLEDGEMENTS

I would like to thank my advisor, Professor Karl Taeuber for all his advice and support on this thesis. Comments, both editorial and substantive, from Alma Taeuber were useful throughout the project. I also appreciate the input of the other members of my committee. Professors Glenn Fuguitt and Franklin Wilson. Valuable assistance in dealing with difficult data was provided by Anne Cooper and Franklin Monfort.

This research was carried out with a contribution from the William and Flora Hewlett Foundation. Computing resources were provided by grant number HD05876 of the National Institute for Child Health and Human Development to the Center for Demography and Ecology. The author would also like to acknowledge the support of National Institute of Child Health and Human Development, Training Grant (HD-7014).

ABSTRACT

This study examines the demographic consequences of the high rate of black suburbanization during the 1970s. Population data were obtained from the 1970 and 1980 Censuses on 1,358 suburbs in 30 U.S. Standard Metropolitan Statistical Areas. Percent black increased in the majority of suburbs over the decade, although most increases were modest. A substantial number of suburbs remained stably integrated (between 5% and 75% black). The applicability of the racial succession model developed for central city neighborhoods to suburban racial change is evaluated through a categorization of suburbs by the relationship of black and white population change. Almost half of the suburbs which were predominantly white in 1970 gained an appreciable number of blacks by 1980. Cases in which the black population grew and the white population declined were relatively more prevalent in the 1970-80 decade than in previous decades. The proportion of suburban whites living in suburbs with a measurable number of blacks increased significantly between 1970 and 1980. Over one third of the suburban blacks in these SMSAs were concentrated in majority-black suburbs, and this concentration increased during the seventies. Although the predominant pattern was the dispersal of blacks into all-white suburbs, most suburban blacks lived in suburbs which underwent racial succession over the decade.

INTRODUCTION

The primary aspect of black population redistribution between World War II and 1970 was movement into the central cities of large metropolitan areas, mostly from rural areas in the South. During the same period, many whites were leaving those cities for the suburbs surrounding them. For many city neighborhoods, this process resulted in rapid increases in racial composition. By 1970, metropolitan areas were highly polarized by race, with most blacks living in heavily black central city neighborhoods and the majority of whites living in predominantly white suburbs. In 1968, the Kerner Commission concluded that racial conflicts in urban areas were exacerbated by this residential separation of blacks and whites (U.S. National Advisory Commission on Civil Disorders).

Since 1970, the pattern of black population redistribution has changed, and black growth is greatest in suburban areas. Between 1970 and 1980, the black population in central cities grew by 1.6 million while the suburban black population grew by 1.8 million (Long and DeAre, 1981, Table 1). As a result, there was a net redistribution of blacks out of cities and into suburbs. The proportion of all blacks living in central cities dropped from 58% in 1970 to 56% in 1980 while the proportion in suburban rings rose from 16% to 21%. The growth

rate of the suburban black population (49%) was more than three times that of the white population (16%) during the seventies. Consequently, the percent black in suburban areas, which had been stable between 1950 and 1970 (Connolly, 1973), increased from 4.8% in 1970 to 6.1% in 1980 (Long and DeAre). This surge in black suburbanization has been related to the more general population and employment redistribution patterns which characterized the 1970s (Frey, 1985; Pettigrew, 1980). Other features of these patterns include slower overall metropolitan growth, the renewal of nonmetropolitan growth, and the relocation of employment opportunities from cities to suburbs and from the North to the South and West.

LITERATURE REVIEW

Researchers first noted a trend toward increased black suburbanization during the 1960s, when some suburbs had rapid black growth (Connolly, 1973). Recent black movement to suburban areas was encouraged by rising incomes (Hermalin and Farley, 1973; Frey 1984, 1985; Lake, 1981), civil rights gains of the sixties such as the 1968 Fair Housing Act (Clark, 1979; Pettigrew, 1980) and changing attitudes among whites (Farley, et al., 1978). Farley (1970) hypothesized that blacks would decentralize out of central cities as their economic status improved just as European ethnic groups had before them. Research on the socio-economic characteristics of people moving to suburbs confirms this hypothesis by showing that the most recent black

in-migrants (in the 1970s) are similar in status to previous white in-migrants (Frey, 1985; Goodman and Streitwieser, 1983; Spain and Long, 1981).

Frey (1978, 1984) evaluated the potential of black suburbanization for achieving racial residential integration. Although the propensity of blacks who moved to choose a suburban residence was much higher during the 1970s than in previous decades, it was still lower than the propensity of whites to choose a suburban destination. Therefore, he estimated that if the trends of the seventies continued, it still would be many decades before the racial polarization of metropolitan areas was significantly reduced. Other authors have noted that even within the suburban landscape, blacks are segregated from whites. High levels of between-suburb segregation indicate that suburban blacks tend to be concentrated in a small number of cities and towns (Hermalin and Farley, 1973; Logan and Schneider, 1984). Within individual suburbs, there is also an uneven distribution of blacks relative to whites (Farley, J., 1983; Farley, R., 1977; Guest, 1978).

The great increase in the black suburban population in the last two decades led many researchers to examine the nature of demographic changes occurring in individual suburbs. Authors concerned with understanding changes in racial composition and patterns of black growth have used the ecological succession model as a framework for their analyses. This model was developed in the Chicago school of

urban research to describe the process by which one racial or ethnic group replaces another within a particular geographic area. In general, ecological theory employs a community life-cycle approach to predict which areas are likely to gain blacks initially (invasion) and then undergo "succession" towards a majority black composition. This process is expected to occur as an area ages, its housing deteriorates, population density increases, and average socio-economic status drops (Logan and Stearns, 1981).

The specific reference in this context is to the work done by Taeuber and Taeuber (1965, Chapter 5) on processes of racial change in central city neighborhoods between 1940 and 1960. Neighborhoods (i.e. census tracts) were found to have experienced a variety of types of racial change, ranging from rapid succession to decreases in percent black. Instances of succession were more prevalent in cities which had high levels of black in-migration and low or negative white population change. They emphasize that it is the relationship between black and white population change which determines the rate and direction of changes in racial composition.

In applying this model to suburban racial change, most researchers have used individual suburbs (that is, incorporated cities or towns) as their unit of analysis. These distinct places form only part of the entire suburban ring which is defined as that portion of a Standard Metropolitan Statistical Area (SMSA) outside its central city. They ask whether blacks tend to move to suburbs which are in

the later stages of the life-cycle or which already contain blacks and whether these places subsequently undergo racial succession. There are a number of reasons to expect less dramatic racial change in suburbs than happened previously in central city neighborhoods: the unit of analysis is larger, the magnitude and concentration of black in-migration is much lower, whites are not leaving suburban areas in great numbers, and there is an adequate supply of housing, much of it relatively new (Guest, 1978; Logan and Stearns, 1981).

In the analysis of racial change, one of the main variables of interest is the initial racial composition of areas receiving blacks. Prior to 1960, most suburban blacks were concentrated in heavily black industrial or semi-rural enclaves (Farley, R., 1970; Rose, 1976). Data on more recent trends suggest that during the 1960s and 1970s, blacks began to disperse into predominantly white areas in the suburbs (Clay, 1979, Grier and Grier, 1978). For instance, Spain and Long (1981) found that 40% of blacks moving to suburbs in the mid-70s entered census tracts that were less than 10% black. However, another significant pattern was the movement of blacks, especially those of lower socio-economic status, into suburbs over 50% black in the 1960s (Clay, 1979) and in the 1970s in the Washington, D.C. area (Grier and Grier, 1978). This trend of continued concentration is supported by findings that increases in racial composition tended to be greater in suburbs with higher initial percentages black during the 1960-70 decade (Marshall and Stahura, 1979b; Logan and Stearns, 1981) and

during the 1970-80 decade (Farley, J., 1983; Logan and Schneider, 1984).

Differential rates of black growth have been found to be associated with other ecological variables such as age and size of suburb, population density and turnover, and distance from central city. For example, black population growth during the sixties tended to be highest in large, older suburbs that specialized in manufacturing as opposed to white collar employment (Marshall and Stahura, 1979b). Proximity to the central city was consistently found to be a significant predictor of black suburban growth. Many researchers have noted the tendency of central city black concentrations to "spill over" into adjacent suburbs (Clark, 1979; Clay, 1977, 1979; Connolly, 1973; Farley, J., 1983; Farley, R., 1970; Logan and Schneider, 1984; Long and DeAre, 1981; Rose, 1976; Sutker and Sutker, 1974). Clay (1977) hypothesized that these inner-ring suburbs might be in the later stages of the community life-cycle, making them susceptible to economic disinvestment and white flight as well as black in-movement. Consequently, racial change in this restricted group of suburbs could come to resemble that in declining city neighborhoods.

Some authors suggested that inclusion of variables other than the traditional ecological ones may be appropriate for understanding patterns of racial change in suburbs. Among the alternative frameworks considered are the collective action model (Logan and

Stearns, 1981) and the political economy model (Logan and Schneider, 1984; Schneider and Logan, 1982). Logan and Stearns found that percent foreign stock was negatively associated with changes in racial composition between 1960 and 1970 in Long Island suburbs. They posited that collective action in ethnic suburbs may have discouraged black in-movement. Logan and Schneider hypothesized that fiscal differences between suburbs could affect the locational decisions of blacks (and whites). Their findings showed a negative association between strength of the local tax base in the early seventies and racial composition in 1980.

Two studies explicitly addressed the relationship between black and white population change in suburbs. Marshall and Stahura (1979a) observe that even suburbs with large and rapidly growing black populations during the 1960s did not tend to have declining white populations. They concluded that black suburbanization did not result in racial succession, but instead in parallel development, i.e. suburbs gaining both blacks and whites simultaneously. Guest's 1978 study of suburban racial change between 1950 and 1970 yielded similar results. As Taeuber and Taeuber found for central city neighborhoods, Guest found that suburbs exhibited a variety of types of racial change. Among suburbs containing some blacks, the predominant pattern was parallel growth, and cases of black growth accompanied by white decline (succession) were relatively infrequent. The authors of both studies felt that patterns of suburban population change during this

period were mostly a result of the explosive growth of suburban areas following World War II.

What happened during the 1970-80 decade when many more blacks moved into suburban areas and overall suburban growth was slower? The two relevant studies (Farley, J., 1983; Logan and Schneider, 1984) provide indirect evidence that cases of succession were more prevalent in the most recent decade. In metropolitan areas of the Northeast and North Central regions (Logan and Schneider) and in the St. Louis area (Farley), much of black suburban population growth between 1970 and 1980 was concentrated in suburbs with a high initial proportion black. Logan and Schneider also observed that the suburbs experiencing the greatest increases in percent black tended to have negative white growth.

STATEMENT OF PROBLEM

The current study addresses the issue of suburban racial change in the 1970s through an examination of the changing racial compositions of suburbs. For the country as a whole, suburban rings had an increase in average proportion black between 1970 and 1980 (Long and DeAre, 1981). We would therefore expect to find more suburbs in which racial composition increased and fewer in which it decreased than in previous decades. How was the overall distribution of suburbs by proportion black affected by the rapid growth of the suburban black population? Was the growth concentrated in suburbs

which already had significant black populations or was dispersal into predominantly white suburbs common? The results of previous research suggest that both trends are likely to have occurred. Whereas the long history of racial segregation in this country supports the concentration hypothesis, changing attitudes and rising black middle-class incomes support the dispersal hypothesis.

How well does the ecological succession model fit the patterns of population change in suburbs during the 1970s? Did communities which gained many blacks tend to lose whites? Or is there evidence of stable integrated suburban communities? These questions will be examined through an analysis similar to that of Guest which delineates the direction of black and white population change underlying compositional changes in suburban places. Authors studying earlier periods concluded that traditional theories of succession were not applicable to suburbs since the predominant pattern was parallel growth. There are several reasons to expect the most recent decade to exhibit different patterns of racial change. The overall growth rate in suburban areas was slower than in previous decades, and the black suburban population grew at three times the rate of the white population during the seventies (Long and DeAre). The movement of suburban whites into outer-ring suburbs (exurbia) and nonmetropolitan areas may have left inner-ring suburbs susceptible to racial change. Consequently, we would expect to find relatively fewer cases in which both black and white populations grew and more cases in which black

growth was accompanied by white decline.

DATA AND METHODS

Data were obtained from the 1970 and 1980 Censuses for a national sample of suburban places (U.S., Bureau of the Census, 1977, 1983). Demographic processes occurring within an individual suburb are intimately related to larger processes occurring in the surrounding metropolitan area. Therefore, the primary sampling unit is the metropolitan area. In order to ensure a sufficient pool of potential black suburban residents, the universe was restricted to those SMSAs with more than 50,000 blacks in 1980. Thirty of the seventy-nine metropolitan areas with over 50,000 blacks were selected for the sample (see Appendix A for a full description of the sampling procedure and the list of SMSAs). These 30 SMSAs contained 58 percent of all metropolitan blacks in 1980.

Within each SMSA, all suburban places (whether incorporated or census-defined) with at least 2,500 residents in both 1970 and 1980 are included in the sample. Previous research focussed on incorporated places. Unincorporated places are included here to increase the degree of coverage of the total suburban ring population. Still, persons residing in the suburban ring but not in places of 2,500 or more are not represented in the data. The omitted population is mostly rural, although it could include people living inside the urbanized area and not in places. The 1,358 places contain 68% of the

black population in the suburban rings of the 30 sampled metropolitan areas. The average coverage of the white ring population is somewhat lower.

As constructed, the sample is not representative of all U.S. suburbs. Rather, it provides pictures of sets of suburbs in metropolitan areas with large black populations. These suburbs are more exposed to the possibility of black in-migration originating from their corresponding central cities. They could also be seen as being particularly susceptible to the type of racial succession that has occurred in central-city neighborhoods since World War II. Because of the sampling design, trends can be examined for this set of "exposed" suburbs at the aggregate and at the local (SMSA) level.

The bulk of the following analysis is based on two measures, racial composition and growth rates of white and black populations by place. Racial composition is measured as percent black of the total population. Growth rates are measured as the change in the white (black) population 1970-80 as a percent of the white (black) population in 1970. Since the data were obtained from computer tapes and not from published tables, they are affected by suppression. Suppression refers to the procedure by which certain data items are excluded to maintain confidentiality. In this analysis, the only data suppressed are the 1970 black population figures for places which had between one and thirty blacks. The result is that 1970 black population estimates for affected places (and aggregations thereof)

are biased downward. It is estimated that the error in the estimate for the total 1970 black suburban population is less than one percent. Specific figures affected are identified in footnotes to tables in the results section.

RESULTS

AGGREGATE TRENDS

In the aggregate, the sampled suburbs had a higher percentage black than the total suburban rings of all SMSAs. For the sample, the figures are 6.2% black in 1970 and 9.3% in 1980 (bottom, Table 1), whereas for the total rings, they are 4.8% and 6.1%, respectively (Long and DeAre). Higher values were expected in the sample given the sample design and the higher average coverage of the total ring population for blacks than for whites. The sample places also experienced a large increase in average percent black over the decade, 3.1 percentage points. The high growth rate of the black population in these suburbs (62%) combined with the small negative rate for whites (-2%) contributed to this rise in the average proportion black.

The figures in Table 1 refer to the suburban population of each SMSA as an aggregate of all the places covered by the sample. For example, the percentage black values for the suburbs of a given SMSA represent the proportion black of the total, which is a weighted average of the proportions black of the individual places within that ring. As can be seen by comparing the rows in Table 1, the trends in

percent black and in growth rates varied substantially among the SMSAs. For instance, the suburbs of several southern SMSAs (Birmingham, Memphis, Nashville, and Wilmington) had decreases or negligible increases in average proportion black, while other southern SMSAs had increases of more than 10 percentage points (Mobile and Washington, DC). In the majority of the other metropolitan areas, increases in proportion black ranged between one and five percentage points.

Black suburban growth rates were positive in all thirty SMSAs, with only two having rates lower than 15% (Birmingham and Columbus, Georgia). Especially high rates of black growth (over 150%) occurred in the suburbs of six SMSAs, of which three had few blacks in 1970 (Milwaukee, Minneapolis, and Seattle) and three had large initial black populations (Richmond, Dayton, and Washington). Most of the smaller southern and western SMSAs had significant white suburban growth (e.g. Greenville and Sacramento). Thirteen of the metropolitan areas actually had decreases in their suburban white populations. However, of these 13, only 8 (seven in the Northeast or North Central regions) had a declining total suburban population.

TRENDS IN RACIAL COMPOSITION

How did the racial composition of individual suburbs change between 1970 and 1980? Suburbs' values for percent black in 1970 by percent black in 1980 are presented graphically in Figure 1. The points in the lower left corner each represent a large number of suburbs. For instance, there were 96 suburbs with no blacks in either year. The predominant trend was increasing percent black as indicated by the fact that the majority of suburbs fell above the diagonal line of no change. More than a thousand suburbs (74%) had increases in percent black, while 260 (19%) had decreases. The remaining 7% had no blacks in either year. Changes in percentage black tended to be small, as can be seen in the clustering of values close to the diagonal in Figure 1. Ninety-one percent of the places stayed within 10 percentage points of their 1970 values. That the great majority of places had relatively small changes in their proportion black suggests that racial change is proceeding slowly in most suburbs.

Does slow racial change constitute evidence of stable integration in this set of suburbs? There were 948 suburbs (70%) which had changes in percent black of less than two percentage points during the 1970-80 decade. The majority of these places had a very low percentage black in 1980, indicating that they were essentially uniraical. However, among the places with less than a two point change, 93 were between five and seventy-five percent black in 1980. These 93 suburbs (7% of the total) represent inter-racial communities

which underwent little racial change during the seventies.

What about the points in Figure 1 which lie far above the diagonal? Increases of ten or more percentage points in percent black occurred in 112 (8%) of the suburbs, and of these, 34 had dramatic increases (30 or more points). The rapid changes in proportion black in these suburbs suggest that they may have had declining white populations and thus experienced racial succession. Places with the greatest increases in percent black were concentrated in a few SMSAs: Washington, St. Louis, Los Angeles-Long Beach, and to a lesser extent, Newark, Cleveland, Miami, Atlanta, and Chicago. Therefore, rapid racial change may be limited to a small number of places in those metropolitan areas with the largest black populations.

The compositional changes in individual suburbs resulted in a different overall distribution of suburbs by percent black in 1980 as compared to 1970 (see Table 2). The category labelled 0% black in the first row of Table 2 contains those places which had zero blacks. The 325 suburbs for which 1970 black population values were suppressed were placed into the 0-10% black category for 1970 since it is known that they each contained at least one black person. The number of places with no blacks dropped by 50% (from 281 to 141), and the proportion of all suburbs falling into this category decreased from 21% in 1970 to 10% in 1980. This substantial drop in the number of exclusively white suburbs is evidence of a dispersive trend in black suburbanization. At the upper end of the distribution, the number of

suburbs over 70% black doubled from 18 in 1970 to 36 in 1980. All but one of these suburbs were more than 20% black in 1970 (Figure 1), indicating an increased concentration of blacks in suburbs which already had a higher than average percentage black.

Since over three-quarters of the suburbs were less than ten percent black in both years, the distribution of these places by percent black is presented in finer detail in Figure 2. The heights of the bars represent the number of places falling into each percentage black category. The total number of places represented in this figure is lower in 1980 (1065) than in 1970 (1143). The trend towards the "opening up" of predominantly white suburbs is emphasized by this graph. In addition to the previously noted decrease in suburbs which had zero blacks, there were 82 fewer suburbs (a 15% drop) between zero and one percent black in 1980 than in 1970. Significant increases occurred in the 1-2% category which jumped from 102 in 1970 to 147 in 1980, and in the categories from 7-10% black, where the number of suburbs more than doubled from 34 to 72.

How much of the total growth of the black suburban population is accounted for by growth in the different percentage black categories? Black population figures for both years are displayed in Table 3. The percentage black categories are as of 1970; that is, the 1980 figures represent the number of blacks who lived in places which were a particular percent black in 1970. The suburbs with the lowest proportions black in 1970 experienced the fastest black growth. The

black population in places less than ten percent black in 1970 had more than tripled by 1980 (column 3). In addition, these 862 places accounted for over half (52%) of the total black suburban growth in the 1970-80 decade (column 4). These trends provide further support for the dispersal hypothesis by showing that the majority of the black suburban growth occurred in areas with a low initial proportion black. This finding is not surprising given that 84% of all places were less than ten percent black in 1970.

The low or negative black growth rates in the higher percent black categories were not expected (bottom half of Table 3). The black population in the 18 places over 70% black in 1970 grew by less than one percent over the decade, thereby contributing a negligible proportion to the total black suburban growth. However, these facts do not contradict the observation that most of these suburbs had increases in their racial composition between 1970 and 1980 (Figure 1). Such increases could have resulted from a decreasing white population in those places.

TYOLOGY DESCRIPTION

How were black and white population change related in suburban places? This issue can be addressed by classifying suburbs into a typology based on direction of change in racial composition and the differential rates of growth of the black and white populations. Similar classifications were made by Guest and Taeuber and Taeuber.

The idea behind such a scheme is to identify the relative prevalence of different types of shifts in composition. An increase in proportion black can come about in several ways: through black population growth and white decline, through increases in both the black and white populations with the black growing faster or through decreases in both populations with the white declining faster. The distribution of places across types permits an evaluation of what degree of racial succession is occurring in suburban areas.

The initial step in making the typology is to classify places that were essentially uniraical at both time points, regardless of type of compositional change or growth, into the Predominantly White or Predominantly Black categories. The cutoff point for the Predominantly Black category is 90% black, while the cutoff for the Predominantly White category is 0.5% black. A strict cutoff for the White category was chosen in order to distinguish those communities which were almost exclusively white. Suppression in the 1970 data made computation of proportion black less than one-half of one percent impossible. The remaining places are divided by whether they had increases or decreases in percent black. Within these two types of compositional change, categories are distinguished by the relative growth rates of the white and black populations. Growth rates are divided into three categories: populations which grew by more than 10 percent are defined to have a positive rate, those which decreased by more than 10 percent have a negative rate and those which had less

than (or equal to) a 10 percent change in either direction are stable. Nine possible combinations of black and white rates result. These nine are then collapsed into the final categories of the typology as described in Table 4.

There are four categories (two for each direction of change in percentage black) in which black and white population change were parallel--either both positive (termed Growing) or both negative or stable (Declining-Stable). The direction of change in proportion black occurring in these places is determined by which population grew (or declined) at a faster rate. For example, a place in which the both the black and whites rates were negative with blacks declining faster would be a Decreasing Percent Black, Declining-Stable type. The remaining categories in which percent black increased are: Invasion--places which were predominantly white initially and had black growth over the decade and Succession--places with positive black and negative white growth. Finally, the Displacement category contains those places in which negative black and positive white growth, resulted in a decreasing percentage black.

The typology developed here is slightly different from that used by Guest. Because of the widely varying sizes of sample places (from 2,500 to over 200,000), a percentage-based cutoff (0.5% black) was used for the Predominantly White category rather than the numerical criterion (400 blacks) used by Guest. In addition, the Invasion category is defined as those places having fewer than 0.5% black in

1970 and more than 0.5% black in 1980. In Guest, this category was constrained to have negative white growth. This change was made in order to identify the extent to which blacks dispersed into exclusively white areas. As a result of these two changes, we would expect relatively fewer places to fall into the Predominantly White category and more to fall into the Invasion category (other things equal) than in Guest's analysis.

TYOLOGY RESULTS

The modal category is Predominantly White with 417 suburbs (31%) containing very few blacks in either year. However, almost half (324) of the 741 places which were less than 0.5% black in 1970 had crossed that threshold by 1980; the Invasion category captured 24% of the sample. This finding confirms the previously mentioned trend of the dispersal of blacks into predominantly white suburbs. Predominantly Black suburbs were rare, there being only eight in this sample. Succession toward a higher percentage black characterized 185 suburbs (14%), while only 2% of the suburbs (25) experienced Displacement toward a lower percent black. The two Growing types resulted in 172 cases of increasing percent black and 52 cases in which percent black decreased. Among the Declining-Stable types, decreases in proportion black were more common than increases.

Further understanding of the nature of suburban racial change can be acquired through an examination of the average characteristics of suburbs falling into the various racial change categories (see Table 5). As for Table 1, the figures in Table 5 refer to averages for the aggregated population within each category. Of all the people in Succession places in 1970, 13% were black. Succession places were larger than any of the other types (column 6) and tended to have declining total populations (column 3). Suburbs with high percentages black (other than those in the Predominantly Black category) tended to fall into the Succession category, which averaged 25% black in 1980 or into the Increasing Percent Black, Declining-Stable category, which averaged 24% black in 1980. These findings are consistent with the hypotheses of other researchers (Clay and Marshall and Stahura) that racial succession was most likely to occur in the larger, older suburbs which were losing population overall.

Suburbs in which black growth was accompanied by rapid white out-movement appear to have been rare; yet, it is noteworthy that 28 of the Succession suburbs had white populations which declined by more than 50% between 1970 and 1980 (data not shown). It seems likely that few of the Invasion communities identified here will undergo succession in the next decade. Their average proportion black in 1980 (2.5%) is much lower than the 1970 average for Succession places (13%), and they have a positive white growth rate (Column 4, Table 5). It could be that in suburbs, the Invasion-Succession process takes

considerably more time than it did in many central city neighborhoods or goes through more stages (e.g. Invasion-Growing-Succession). While there is no reason to believe that the entrance of a few blacks into a white suburban community will lead to massive white flight, it is clear that racial succession did occur in some suburban communities during the 1970s. The pattern of suburban racial change could also differ by metropolitan area, with Succession communities being expected to be more prevalent in those SMSAs with the largest and oldest black populations.

The distribution of places across racial change categories does indeed differ among metropolitan areas. Of the 15 SMSAs with more than 30 suburban places in the sample, several have clearly distinctive distributions across the nine categories (see Table 6). Almost half (48%) of the places in the Washington area underwent Succession during the decade. Other SMSAs in which more than 20% of the places fell into the Succession category are Baltimore, Newark, and St. Louis. All four of these metropolitan areas have large (greater than 400,000) and established black populations. Within this group, Predominantly White suburbs were relatively more common (more than 25%) in the two non-Southern SMSAs, Newark and St. Louis, whereas in Washington and Baltimore less than three percent of the suburbs were in this category.

Among the other metropolitan areas with large black populations, four contained a disproportionate number of Invasion communities: San Francisco, Los Angeles, Chicago and Cleveland. Metropolitan areas in which the majority of suburbs fell into the Predominantly White category include two with fewer blacks or to which blacks have come more recently (Milwaukee and Minneapolis), and one with a large black population (Detroit). Detroit stands out here since 71% of its suburbs were Predominantly White, yet it has the fourth largest black population (891,000) of all U.S. metropolitan areas. Most of the smaller southern metropolitan areas were characterized by relatively more Growing places (among those with an increasing percent black) and a greater incidence of declining racial compositions (Atlanta also exhibited this pattern). Northeastern metropolitan areas contained relatively more Declining-Stable suburbs and in New York and Philadelphia, particularly those in which percent black decreased.

These results indicate that a complex relationship exists between the size of a metropolitan area's black population and the types of racial change occurring in its suburbs. The Washington and Detroit SMSAs have similar numbers of blacks, yet the distributions of their suburban places across the racial change categories are very different. Clearly other factors which differ among SMSAs influenced suburban racial patterns during the seventies. For instance, only 135,000 blacks lived in the total suburban ring of the Detroit SMSA in 1980, while in the ring of the Washington SMSA there were 405,000

blacks in 1980. A full understanding of the reasons for the differences between SMSAs requires further research into the social context of racial change.

DISTRIBUTION OF BLACKS AND WHITES

Another way to view suburban racial patterns during the 1970s is to look at the distribution of blacks and whites across types of suburbs. Did most blacks live in suburbs with sizable black populations? To what degree were suburban whites exposed to blacks living in their community? What type of racial change characterized the places in which most suburban blacks (whites) lived? Asking this type of question could lead to different conclusions about the consequences of black suburbanization.

The distributions of suburban blacks and whites by racial composition of place are portrayed in Figure 3. Points on the lines represent the cumulative percent of blacks (whites) living in suburbs which were less than a particular percent black. For example, 16% of the blacks and 86% of the whites in the sample lived in suburbs less than 10% black in 1970. Several interesting patterns are evident in the figure. First, the distributions of blacks and whites are highly dissimilar as demonstrated by the distance between the two pairs of curves. Second, the white curves are consistent with the distribution of suburbs as shown in Table 2; 84% of the suburbs were less than 10% black in 1970. The black curves tell a different story. Thirty

percent of the blacks were concentrated in the 34 suburbs over 50% black in 1970. Third, the suburbanization of blacks between 1970 and 1980 resulted in changes in the distributions of both races. The percent of whites living in suburbs less than one percent black dropped from 61% in 1970 to 43% in 1980, paralleling the decline in the number of places with very few or no blacks. For blacks, though, the lower end of the distribution did not change much; changes occurred mainly in the middle range of the distribution. The proportion of blacks in suburbs over 60% black rose from 19% in 1970 to 25% in 1980.

Overall, this graph demonstrates that blacks are highly concentrated within the suburban landscape. In 1980, more than a third (35%) of the blacks in this sample lived in majority black communities (Figure 3). The majority of whites were in suburbs where percent black was much lower than the average for the total sample. Despite the fact that more than half of the black population growth during the seventies occurred in suburbs less than ten percent black, the proportion of blacks living in low percentage black areas did not increase. The lower curve for blacks in 1980 as compared to 1970 indicates that suburban blacks became more concentrated over the decade. However, the lower white curve in 1980 confirms that the trend for suburban whites was toward increased exposure to blacks.

As shown in Table 7, blacks and whites also have different distributions across the racial change categories. Unlike in Figure 3, the categories here are constant; they contain the same numbers of suburban places in 1980 as in 1970. The majority of whites (56% in 1980) lived in either Predominantly White or Invasion suburbs. Again, their distribution parallels that of the number of suburbs in each category; 55% of the suburbs fell into either the Predominantly White or the Invasion category. Conversely, more than half (52% in 1980) of the blacks resided in Succession suburbs. As a group, these 185 suburbs constitute only 14% of the sample. Therefore, the majority of blacks in this sample experienced the process of black population growth in their communities as being accompanied by white population decline. Changes in the distributions between 1970 and 1980 are consistent with the types of population and compositional changes represented by the various categories. For instance, the proportion of both blacks and whites went up in the Increasing Percent Black, Growing category, from 10% in 1970 to 15% in 1980 for blacks and from 12% to 15% for whites. The most notable change is the large increase in the proportion of blacks in Invasion suburbs, which contained less than one percent of the blacks in 1970 and over seven percent in 1980.

CONCLUSION

Several trends are evident in the suburban racial change of the 1970s. However, the implications of the results differ by whether the focus is on places or people. From the place perspective, the rapid growth of the black suburban population between 1970 and 1980 resulted in an increasing percent black for the majority of suburbs. There was a large reduction in the number of predominantly white suburbs, indicating that many of the barriers toward black entry into such places have lessened in recent years. Over half of the black suburban growth occurred in places with a low initial proportion black. These findings, when taken together, provide strong confirmation of the dispersal hypothesis. That is, the predominant pattern in terms of the place perspective was the "opening up" of exclusively white suburbs to blacks.

In general, racial change did not proceed as rapidly as it did in central city neighborhoods during previous decades. In most suburbs, changes in racial composition were modest. Unlike central city neighborhoods, many suburbs remained stably integrated over the decade. Nevertheless, instances of rapid racial change did exist in this sample, especially in those metropolitan areas with the largest black populations.

What does the preceding analysis tell us about the applicability of the ecological succession model to suburban racial change? A comparison with previous results suggests that the process of racial change in suburban areas was different in the 1970-80 decade than in previous decades. Suburbs which underwent racial succession are clearly more prevalent here than in Guest for the 1950-70 period or in Marshall and Stahura (1979a) for the 1960-70 period. Although not strictly comparable because of definitional differences, the Predominantly White category accounts for a much smaller proportion of this sample (31%) than of Guest's total sample (71%). Some patterns persisted across the decades. Cases of parallel growth are common in all three studies, and few suburbs are predominantly black here or in Guest.

How do the suburban patterns observed here compare to previous central city patterns? As the Taeubers found in central cities, a variety of types of racial change occurred in suburbs during the 1970-80 decade. Another similarity is that the distribution of places across racial change categories differs substantially between metropolitan areas. Suburban patterns differ from central city patterns mainly in the lower proportions of Succession and Predominantly Black areas.

If the focus is shifted to the distribution of people across suburbs, different conclusions emerge. About a third of the blacks were concentrated in majority-blacks suburbs, and this concentration increased between 1970 and 1980. In addition, a disproportionate number of blacks lived in suburbs which experienced racial succession over the decade. These findings are consistent with research done by Farley (1983) on racial patterns in the St. Louis metropolitan area as of 1980. He found that while many formerly white suburbs opened up to blacks, more than three-fourths of all suburban blacks lived in suburbs which were either over 80% black or highly segregated internally (having an index of dissimilarity greater than 75). In the present study, the opening up of suburbs led to an increase in the exposure of whites to blacks, but did not increase the proportion of blacks living in low percentage black suburbs. Thus, the results from the people perspective support the concentration hypothesis. Further insight into the conflict of the two perspectives could be gained through additional research on suburban residential patterns and racial segregation between and within suburbs.

What kind of racial change can we expect in suburbs in the future? The answer to such a question depends on whether the focus is on places or people. From the place perspective, a further drop in the number of exclusively white suburbs seems likely. In most of these places (and in those which currently have a low percentage black), racial composition will probably increase slowly, potentially

resulting in more cases of stable integration. Other suburbs are likely to undergo further succession toward a majority black composition. Patterns of racial change will certainly differ among metropolitan areas. In areas with large black populations and a history of black suburban concentration (such as Washington or St. Louis), continued racial succession could result in an increasing number of suburbs with a high proportion black. Other SMSAs may be characterized mostly by slow racial change in their suburbs, or more Growing and Invasion places.

The future looks somewhat different from the people perspective. If the patterns of racial change occurring in the 1970s continue, the proportion of suburban blacks residing in heavily black suburbs will increase. For many blacks then, suburban living could become almost a reproduction of central city living, especially if the suburbs in which they are concentrated are in the areas with aging housing, declining tax bases and low average socio-economic status. This hypothesis is supported by the finding that the majority of blacks lived in communities which lost whites and tended to have negative total population change between 1970 and 1980. However, the increasing number of whites living in suburbs with a measurable number of blacks could contribute to changes in attitudes toward residential integration. Over time, such a shift could prevent future racial succession and result in a more even distribution of blacks across suburbs.

APPENDIX A
SAMPLING METHODOLOGY

The universe was restricted to the 79 Standard Metropolitan Statistical Areas (SMSAs) having more than 50,000 blacks in 1980. All of the 19 SMSAs which had over 200,000 blacks were included. Then, one-quarter of the remaining SMSAs were chosen by means of a systematic sample. Four of the 34 sampled SMSAs had to be excluded from the final sample. Data for 1970 were not available for Dallas, Houston and New Orleans due to technical problems with the Census tapes. Changes in the way New England townships were coded between 1970 and 1980 prevented the inclusion of Boston. The 30 SMSAs which constitute the final sample are the following, in alphabetical order:

Atlanta, GA	Mobile, AL
Baltimore, MD	Nashville-Davidson, TN
Birmingham, AL	New York, NY,NJ
Chicago, IL	Newark, NJ
Cleveland, OH	Norfolk-Va. Beach-Portsmouth, VA,NC
Columbia, SC	Philadelphia, PA,NJ
Columbus, GA,AL	Richmond, VA
Dayton, OH	Riverside-San Bernadino-Ontario, CA
Detroit, MI	Rochester, NY
Greenville-Spartanburg, SC	Sacramento, CA
Los Angeles-Long Beach, CA	St. Louis, MO,IL
Memphis, TN,MS,AR	San Francisco-Oakland, CA
Miami, FL	Seattle-Everett, WA
Milwaukee, WI	Washington, DC,MD,VA
Minneapolis-St. Paul, MN,WI	Wilmington, DE,MD,NJ

Table 1. Aggregate Characteristics of Suburban Places
in Selected SMSAs

SMSA	Number of Places	Percent Black			Population Change, 1970-80 (%)		
		1970	1980	Change 1970-80	Total	White	Black
Atlanta	31	14.7%	20.8%	6.1%	14.1%	4.7%	61.0%
Baltimore	42	4.8	8.5	3.7	7.0	-1.3	88.6
Birmingham	26	19.2	17.0	-2.2	21.5	24.3	7.7
Chicago	184	4.0	6.3	2.3	12.1	5.7	78.9
Cleveland	58	3.6	8.1	4.5	-1.4	-6.6	117.9
Columbia	5	9.7	14.1	4.4	12.5	6.1	63.0
Columbus	2	26.1	34.9	8.8	-20.2	-31.4	6.7
Dayton	27	1.4	3.7	2.3	6.6	3.6	170.9
Detroit	80	4.0	5.4	1.4	-3.4	-6.0	30.7
Greenville	16	13.7	15.5	1.8	38.5	34.5	56.7
Los Angeles	102	6.5	10.1	3.6	8.1	-14.8	69.1
Memphis	7	20.3	18.2	-2.1	41.9	44.3	26.9
Miami	28	11.9	14.0	2.1	28.1	19.1	50.7
Milwaukee	37	0.2	0.6	0.4	5.3	4.1	196.1
Minneapolis	73	0.2	0.6	0.4	14.7	12.8	309.5
Mobile	6	32.6	43.6	11.0	2.6	-14.6	37.2
Nashville	9	16.4	16.7	0.3	25.4	23.8	28.0
New York	106	6.3	8.4	1.9	-3.3	-8.3	28.3
Newark	54	12.7	20.1	7.4	-4.7	-15.6	51.2
Norfolk	2	24.4	33.5	9.1	63.0	41.5	123.3
Philadelphia	99	12.1	15.2	3.1	-7.9	-13.7	15.6
Richmond	6	2.9	6.6	3.5	55.4	48.5	254.5
Riverside	50	2.8	4.1	1.3	37.0	19.9	97.1
Rochester	16	2.2	3.4	1.2	-2.2	-4.4	51.9
Sacramento	20	1.6	2.5	0.9	35.9	27.6	113.0
St. Louis	87	9.5	15.1	5.6	-6.2	-12.6	48.2
San Francisco	65	5.0	6.3	1.3	11.2	-0.6	39.9
Seattle	23	0.4	1.0	0.6	20.2	16.9	238.5
Washington	84	7.1	17.6	10.5	9.4	-7.8	172.2
Wilmington	13	9.6	10.0	0.4	15.9	13.1	32.7
Total (30 SMSAs)	1358	6.2%	9.3%	3.1%	7.4%	-2.0%	61.9%
Total Rings, All SMSAs (Long and DeAre)	-----	4.8	6.1	1.3	17.3	15.7#	49.4

#Non-black

Table 2. Distribution of Places by Racial Composition

Percent Black	1970		1980		Percent Change in No. of Places, 1970-80
	Number of Places	Percent of Total	Number of Places	Percent of Total	
0%	281	20.7%	141	10.4%	-49.8%
0-10	862	63.5	924	68.0	7.2
10-20	102	7.5	127	9.4	24.5
20-30	43	3.2	57	4.2	32.6
30-40	28	2.1	29	2.1	3.6
40-50	8	0.6	24	1.8	200.0
50-60	9	0.7	12	0.9	33.3
60-70	7	0.5	8	0.6	14.3
70-80	3	0.2	9	0.7	200.0
80-90	7	0.5	13	1.0	85.7
90-100	8	0.6	14	1.0	75.0
Total	1358	100.1	1358	100.1	----

Table 3. Black Population Growth by Racial Composition of Place

Percent Black, 1970	Number of Blacks		Black Pop. Change 1970-80 (%)	Percent of Total Black Growth	Number of Places
	1970 (1)	1980 (2)	(3)	(4)	(5)
0%	0	26,668	----	3.0%	281
0-10	226,698*	695,091	206.67%#	52.4#	862
10-20	318,315	524,139	64.7	23.0	102
20-30	176,419	224,275	27.1	5.4	43
30-40	216,664	295,674	36.5	8.8	28
40-50	70,326	83,088	18.1	1.4	8
50-60	162,610	210,423	29.4	5.4	9
60-70	72,301	77,748	7.5	0.6	7
70-80	69,782	74,344	6.5	0.0	3
80-90	72,000	71,504	-0.7		7
90-100	60,170	56,367	-6.3		8
Total	1,445,285*	2,339,321	61.9	100.0	1358

*These values are underestimated due to suppression of black population figures in 1970

#These values are overestimated due to suppression

Table 4. Description of Racial Change Typology and Distribution of Suburban Places by Racial Change Category

Category	Description	Number of Places	Percent of Total
Predominantly Black	Greater than 90% black in 1970 and 1980	8	0.6%

Increasing Percent Black:			
Invasion	Less than 0.5% black in 1970 and greater than 0.5% black in 1980: positive black growth	324	23.9
Succession.....	Greater than 0.5% black in 1970 and 1980: positive black and negative white growth	185	13.6
Growing	Positive black and positive or stable white growth: black increases faster	172	12.7
Declining- Stable.....	Negative black and negative white OR stable black and stable or negative white growth: black decreases slower	79	5.8

Decreasing Percent Black:			
Displacement..	Positive white and negative black growth	25	1.8
Growing	Positive white and positive or stable black growth: white increases faster	52	3.8
Declining- Stable	Negative white and negative black OR stable white and stable or negative black growth: white decreases slower	96	7.1

Predominantly White	Less than 0.5% black in 1970 and 1980	417	30.7

Total		1358	100.0

Table 5. Aggregate Characteristics of Suburban Places
by Racial Change Category

Racial Change Category	Average Percent Black		Population Change, 1970-80 (%)			Average Tot. Pop. Size
	1970	1980	Total	White	Black	1980
	(1)	(2)	(3)	(4)	(5)	(6)
Predominantly Black.....	94.5%	95.9%	-7.7%	-41.1%	-6.3%	7344

Increasing Percent Black:						
Invasion.....	0.2*	2.5	+15.7	+5.6	+1817.1#	20925
Succession...	13.1	25.1	-7.0	-26.7	+79.0	26362
Growing.....	5.3	9.5	+34.4	+22.2	+140.5	21189
Declining- Stable.....	20.9	23.6	-10.5	-17.3	+1.1	16717

Decreasing Percent Black:						
Displacement..	6.0	3.2	+35.4	+36.5	-27.8	10258
Growing.....	14.5	11.0	+57.8	+59.1	+19.7	11637
Declining- Stable.....	11.4	9.9	-4.4	-12.3	-16.8	14795

Predominantly White	0.1*	0.2	+2.8	-0.6	+335.9#	14572

Total	6.2	9.3	+7.4	-2.0	+61.9	18438

*These values are underestimated due to suppression
of black population figures in 1970

#Small bases

Table 6. Percent Distribution of Places across Racial Change Categories for SMSAs with more than 30 Suburban Places

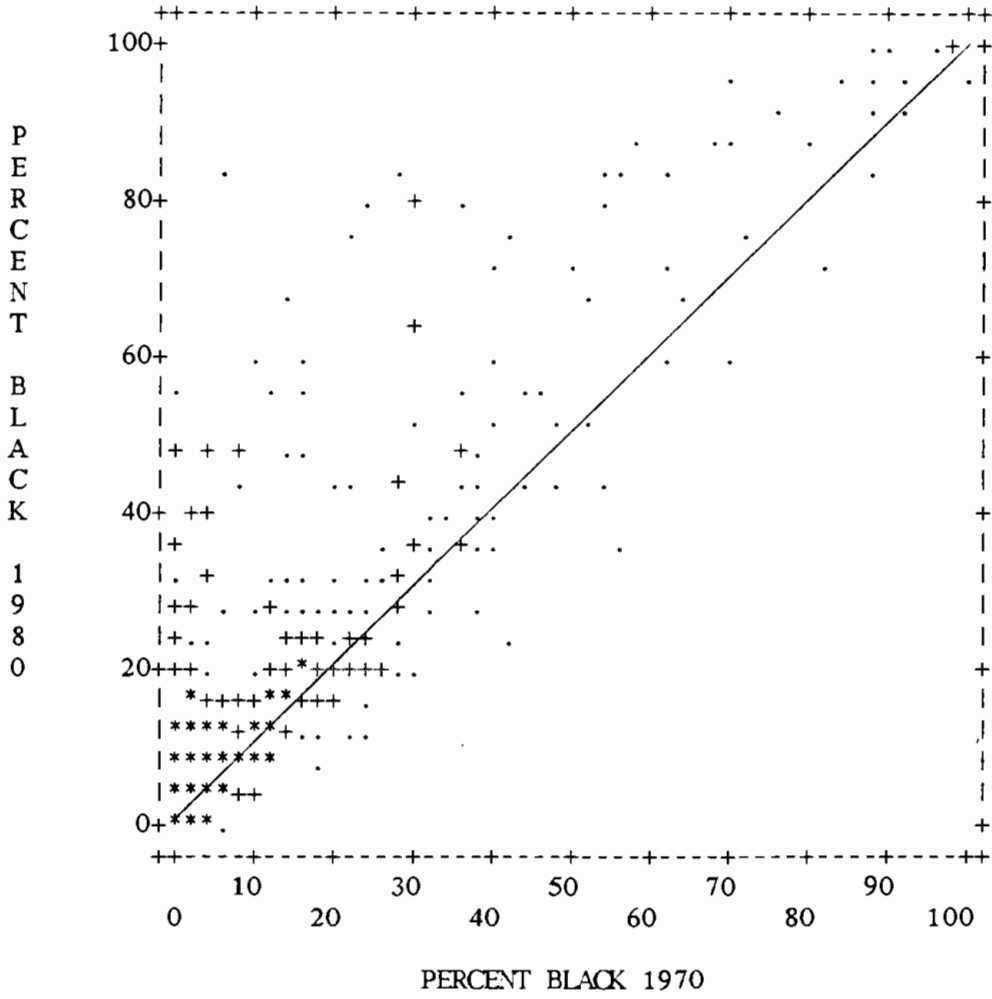
	Racial Change Category										No. of Blacks, Total SMSA, 1980 (000s)
	Pred. Blk.	Inc. Percent Black			Dec. Per. Black			No. of Sub. Places	Pred. Wht.	No. of Blacks, Total SMSA, 1980 (000s)	
		Inv.	Succ.	Grow.	Decl. Stab.	Disp.	Grow.				
Atlanta	—	9.7%	16.1%	12.9%	9.7%	6.5%	29.0%	13.0%	3.2%	31	499
Baltimore	—	16.7	21.4	33.3	11.9	2.4	2.4	9.5	2.4	42	557
Chicago	1.1%	30.4	7.1	4.3	1.6	1.1	2.2	5.4	46.7	184	1,425
Cleveland	—	29.3	13.8	3.4	1.7	1.7	1.7	3.4	44.8	58	346
Detroit	—	11.3	3.8	1.3	7.5	2.5	—	2.5	71.3	80	891
Los Ang.	—	38.2	17.6	9.8	2.9	2.0	—	5.9	23.5	102	949
Milwaukee	—	16.2	—	5.4	—	2.7	2.7	2.7	70.3	37	151
Minneapolis	—	32.9	1.4	5.5	—	1.4	—	—	58.9	73	54
New York	—	17.9	9.4	13.2	11.3	0.9	—	17.9	29.2	106	1,941
Newark	—	11.1	24.1	5.6	18.5	1.9	—	9.3	29.6	54	418
Phila.	1.0	17.2	14.1	13.1	11.1	—	1.0	19.2	23.2	99	884
Riverside	—	30.0	10.0	18.0	6.0	—	6.0	10.0	20.0	50	79
St. Louis	1.1	19.5	26.4	8.0	10.3	2.3	2.3	3.4	26.4	87	408
San Fran.	—	44.6	15.4	13.8	3.1	3.1	4.6	6.2	9.2	65	391
Washing.	—	17.9	47.6	25.0	3.6	—	2.4	2.4	1.2	84	854
Total (30 SMSAs)	0.6	23.9	13.6	12.7	5.8	1.8	3.8	7.1	30.7	1,358	3,458

Table 7. Percent Distribution of Suburban Blacks and Whites Across Racial Change Categories

Racial Change Category	Percent of Blacks		Percent of Whites		Number of Places
	1970	1980	1970	1980	
Predominantly Black.....	4.2%	2.4%	0.0%	0.0%	8
Increasing Percent Black:					
Invasion.....	0.6*	7.3	26.7	28.8	324
Succession...	47.4	52.4	20.7	15.5	185
Growing.....	10.0	14.9	11.8	14.7	172
Declining-Stable.....	21.3	13.3	5.3	4.5	79
Decreasing Percent Black:					
Displacement..	0.8	0.4	0.8	1.1	25
Growing.....	3.8	2.8	1.5	2.4	52
Declining-Stable.....	11.7	6.0	6.0	5.4	96
Predominantly White	0.2*	0.5	27.2	27.6	417
Total	100.0	100.0	100.0	100.0	1358

*These values are underestimated due to suppression of black population figures in 1970

Figure 1. Percent Black 1970 by Percent Black 1980 for Suburban Places in Selected SMSAs



Key:
 . 1 suburb
 + 2-4 suburbs
 * 5 or more suburbs

Total number plotted=1358

Figure 2. Distribution of Places by Percent Black
(for Places less than 10% Black)

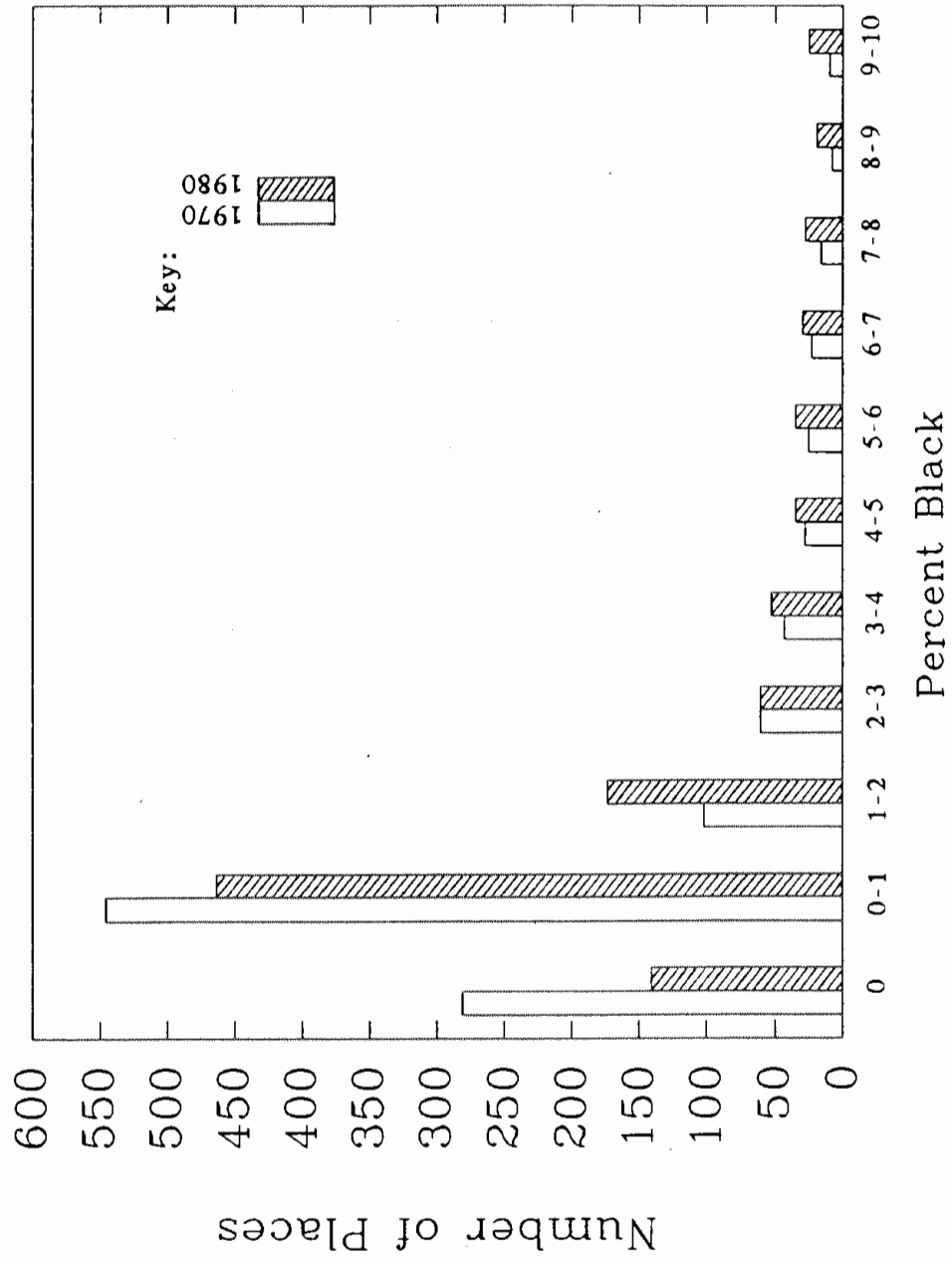
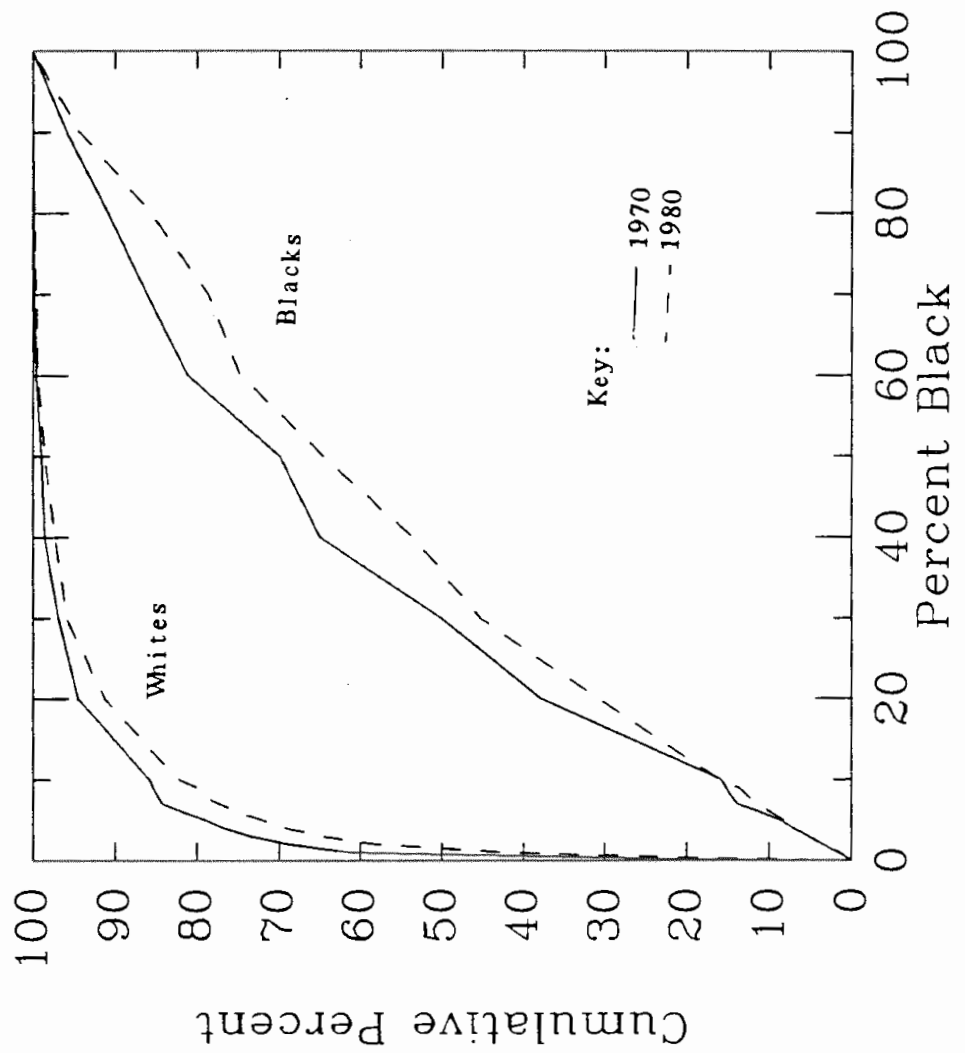


Figure 3. Cumulative Distribution of Blacks and Whites by Racial Composition of Place



REFERENCES

- Clark, Thomas A. (1979). *Blacks in Suburbs: A National Perspective*. New Brunswick, N.J.: Rutgers University Center for Urban Policy Research.
- Clay, Phillip L. (1977). "The Future of Suburban Cities and their Black Populations." Pp. 301-312 in Herrington J. Bryce, ed. *Small Cities in Transition: The Dynamics of Growth and Decline*. Cambridge, Mass.: Ballinger Publishing Company.
- Clay, Phillip L. (1979). "The Process of Black Suburbanization." *Urban Affairs Quarterly*, 14 (4): 405-424.
- Connolly, Harold X. (1973). "Black Movement to the Suburbs: Suburbs Doubling Their Black Populations During the 1960's." *Urban Affairs Quarterly*, 9 (1): 91-111.
- Farley, John E. (1983). "Metropolitan Housing Segregation in 1980: The St. Louis Case." *Urban Affairs Quarterly*, 18 (3): 347-359.
- Farley, Reynolds. (1970). "The Changing Distribution of Negroes Within Metropolitan Areas: The Emergence of Black Suburbs." *American Journal of Sociology*, 75: 512-529.
- Farley, Reynolds. (1977). "Residential Segregation in Urbanized Areas of the U.S. in 1970: An Analysis of Social Class and Racial Differences." *Demography*, 14: 497-518.
- Farley, Reynolds, Howard Schuman, Suzanne Bianchi, Diane Colasanto and Shirley Hatchett. (1978). "Chocolate City, Vanilla Suburbs: Will the Trend Toward Racially Separate Communities Continue?" *Social Science Research*, 7: 319-344.
- Frey, William H. (1978). "Black Movement to the Suburbs: Potentials and Prospects for Metropolitan-Wide Integration." Pp. 79-118 in Frank K. Bean and W. Parker Frisbie, eds. *The Demography of Racial and Ethnic Groups*. New York: Academic Press.

- Frey, William H. (1984). "Lifecourse Migration of Metropolitan Whites and Blacks and the Structure of Demographic Change in Large Central Cities." *American Sociological Review*, 49 (6): 803-827.
- Frey, William H. (1985). "Mover Destination Selectivity and the Changing Suburbanization of Metropolitan Whites and Blacks." *Demography*, 22 (2): 223-243.
- Goodman, John L., Jr. and Mary L. Streitwieser. (1983). "Explaining Racial Differences: A Study of City-to-Suburb Residential Mobility." *Urban Affairs Quarterly*, 18 (3): 301-325.
- Grier, Eunice and George Grier. (1978). *Black Suburbanization at the Mid-1970's*. Washington, D.C.: Washington Center for Metropolitan Studies.
- Guest, Avery M. (1978). "The Changing Racial Composition of Suburbs: 1950-1970." *Urban Affairs Quarterly*, 14 (2): 195-206.
- Hermalin, A. and R. Farley. (1973). "The Potential for Residential Integration in Cities and Suburbs: Implications for the Busing Controversy." *American Sociological Review*, 38 (Oct): 595-610.
- Lake, Robert W. (1981). *The New Suburbanites: Race and Housing in the Suburbs*. New Brunswick, N.J.: Center for Urban Policy Research.
- Logan, John R. and Mark Schneider. (1984). "Racial Segregation and Racial Change in American Suburbs, 1970-1980." *American Journal of Sociology*, 89 (4): 874-888.
- Logan, John R. and Linda Brewster Stearns. (1981). "Suburban Racial Segregation as a Nonecological Process." *Social Forces*, 60 (1): 61-73.
- Long, Larry H. and Diana DeAre. (1981). "The Suburbanization of Blacks." *American Demographics*, 3 (8): 16-21,44.

- Marshall, Harvey and John Stahura. (1979a). "Black and White Population Growth in American Suburbs: Transition or Parallel Development?" *Social Forces*, 58 (1): 305-328.
- Marshall, Harvey and John Stahura. (1979b). "Determinants of Black Suburbanization: Regional and Suburban Size Category Patterns." *Sociological Quarterly*, 20 (2): 237-253.
- Pettigrew, Thomas F. (1980). "Racial Change and the Intrametropolitan Distribution of Black Americans." Pp. 52-79 in Arthur P. Solomon, ed. *The Prospective City: Economic, Population, Energy and Environmental Developments*. Cambridge, Mass: The MIT Press.
- Rose, Harold M. (1976). *Black Suburbanization: Access to Improved Quality of Life or Maintenance of Status Quo?* Cambridge, Mass: Ballinger Publishing Company.
- Schneider, Mark and John R. Logan. (1982). "Suburban Racial Segregation and Black Access to Local Public Resources." *Social Science Quarterly*, 63 (Dec): 762-770.
- Spain, Daphne and Larry H. Long. (1981). *Black Movers to the Suburbs: Are They Moving to Predominately White Neighborhoods?* U.S. Bureau of the Census, Special Demographic Analyses, CDS80-4. Washington, D.C.: Government Printing Office.
- Sutker, Solomon and Sara Smith Sutker, eds. (1974). *Racial Transition in the Inner Suburb: Studies of the St. Louis Area*. New York: Praeger.
- Taeuber, Karl E. and Alma F. Taeuber. (1965). *Negroes in Cities: Residential Segregation and Neighborhood Change*. Chicago: Aldine Publishing Company.
- U.S., Bureau of the Census. (1972). *Census of Population and Housing, 1970: Fourth Count Population Summary Tape Files*. Washington: The Bureau of the Census.

U.S., Bureau of the Census. (1983). Census of Population and Housing, 1980: Population Summary Tape File 4. Washington: The Bureau of the Census.

U.S., National Advisory Commission on Civil Disorders. (1968). Report of the National Advisory Commission on Civil Disorders.

Mailing Address:

Center for Demography and Ecology
University of Wisconsin
1180 Observatory Drive
Madison, Wisconsin 53706-1393
U.S.A.