

DEMOGRAPHIC COMPOSITION AND GROWTH COMPONENTS  
OF THE COASTAL REGION OF MISSISSIPPI: A STUDY OF  
ITS PERIPHERAL NONMETROPOLITAN AREAS

ANALYSIS AND MAPS

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## HIGHLIGHTS

Total population of the three Mississippi counties bordering on the Gulf of Mexico increased by almost 27 percent from 1960 to 1970. The second tier of three counties increased nearly 20 percent. For the state as a whole, the increase was 1.8 percent.

The number of workers crossing at least one county boundary in the six-county area to reach their places of employment almost doubled during the decade, from about 8,300 per day in 1960 to about 16,300 per day in 1970. This increase in worker commuting has a significant impact on transportation facilities (roads and streets) in the area.

Analysis of data describing small outlying, nonmetropolitan areas (Enumeration Districts or ED's) of these six counties indicate that:

- (1) Density of population varied from 4 persons to 7,000 persons per square mile and household units from 1.4 to 2,171 per square mile.
- (2) Neither trailers nor multiple unit structures contributed substantially to the housing needs of the area.
- (3) There was a greater range in the number of persons per occupied unit between the races than among areas for each race.
- (4) Age distributions varied significantly by area.
- (5) Largest concentrations of employment were usually found in the manufacturing, trade, and construction industries, although service industries also provided sizeable amounts of employment.
- (6) Farming occupations were relatively unimportant.
- (7) Per capita income and median family income were not impressively higher for the central city areas than for the peripheral areas which constitute the focus of this study. See Appendix Table 13.
- (8) Population heterogeneity, the extent to which the population of an area is composed of divergent types, was relatively low for all Enumeration Districts (ED's).

- ( 9) A Quality Potential Index, a rough measure of the extent to which an area can and is developing its population's quality through education, showed that metro core ED's ranked higher than nonmetro ED's.
- (10) Metro core ED's were significantly lower than nonmetro ED's in Dependency ratios.
- (11) A Social Disorganization Index, used as an indication of the extent to which social institutions seem to be adequate in meeting the needs of the population, showed that the greatest variation was in the metro core ED's.
- (12) A Labor Force Index with three measures of remunerative activity showed more than three times as many metro core ED's as nonmetro ED's in the high score group.
- (13) The Index of Industrial Lag, a measure of the extent to which the economy has not provided jobs and the extent to which agriculture and unskilled manual labor continue to be the source of livelihood, showed that conditions were better in the metro core ED's with only 6.4 percent rating a high Industrial Lag score. More than twice the proportion of nonmetro ED's (14.4 percent) rated a high score.
- (14) As expected, poverty was more extensive in the nonmetro ED's.
- (15) Data on housing were used to construct three indexes- Housing Affluence, Housing Inadequacy, and Incipient Housing Demand. Metro core and nonmetro ED's differed very little on the Housing Affluence Index, but about 70 percent of the nonmetro ED's had scores on the high side of the Housing Inadequacy Index while about the same proportion of metro core ED's had scores on the low side. Nonmetro ED's appeared to have greater Incipient Housing Demand than metro core ED's.



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INTRODUCTION

Underscoring the inevitability of change in human society is Robert Oppenheimer's assertion that "one thing that is new is the prevalence of newness, the changing scale and scope of change itself, so that the world alters as we walk in it."<sup>1</sup>

With reference to such change, two extreme and directly counterposed ideas about methods of change can be identified: the law of nonintervention and the law of radical intervention.<sup>2</sup> Those who subscribe to the law of nonintervention believe that the "ideal state" of human existence can be achieved only if the homeostatic forces of man's natural and social universe are allowed to function without interference. The other extreme, radical intervention, is the ideology and methodology of Marxists and others who believe that only conflict and class struggle can bring about a desired state of affairs for human societies.

As an alternative to these counterposed methods, the idea of social planning has emerged; and, while it holds much promise as a method which will blend the maximization of individual freedom and the achievement of desirable social goals into an acceptable combination, it suffers from two weaknesses. First, it is an idea that is relatively new. Second, it is a process which requires a great deal of patience and information gathering on the part of its users. Planned change should be based on large amounts of data, and it is this fact which provides the justification or rationale for the research effort resulting in this report.

The need for social planning is particularly crucial in highly developed societies in which social and economic structures and processes are complex, interdependent, and changing. In such societies, failure to anticipate and provide for future needs can very rapidly generate serious problems. The United States in general is subject to the need for careful social and economic planning, and certain areas of the nation -- those which continuously receive the influx of the highly mobile American populace --

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<sup>1</sup>Robert Oppenheimer, "Prospects in the Arts and Sciences," Perspectives USA, 11:10-11 (Spring, 1955).

<sup>2</sup>The Planning of Change, Edited by Warren G. Bennis, Kenneth D. Benne and Robert Chin (New York: Holt, Rinehart and Winston, 1962), p. 2.

are critically in need of systematic planning. In such areas, the impact of a population pile-up is seen in pressures exerted on housing, schools, transportation, and service facilities such as hospitals, water and waste-disposal systems, police and fire protection services, and other activities of living. Over the past several decades, receiving areas for the mobile American populace have been urban and metropolitan, located chiefly in the West or on the nations' peripheries -- that is, on its ocean and Great Lakes coastal boundaries.<sup>3</sup> One of the more impressive bands of recent coastal population growth in the nation is that found in the counties bordering on the Gulf of Mexico. These comprise an almost unbroken band of sustained growth which lies parallel to an interior band of counties experiencing population loss. Only one coastal county from the Texas-Louisiana border to the southern tip of Florida lost population in the 1960 to 1970 period. This was Orleans Parish which contains part of the city of New Orleans.

#### The Gulf Coast of Mississippi As An Area of Impacted Growth

Six Mississippi counties can be considered part of the Gulf Coast growth belt. Total population of the three Mississippi counties bordering on the Gulf of Mexico increased by almost 27 percent from 1960 to 1970. The three counties lying immediately north of the coastal counties experienced a population increase of almost 20 percent for the same period. The impacting pressure of population growth of this magnitude is better understood when compared with population change for the state as a whole. Total increase for the six-county area from 1960 to 1970 was 58,732 persons, but for the state as a whole the total increase was 38,709, or 1.8 percent. Table 1 shows population changes by counties and for the state as a whole.

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<sup>3</sup>Of the approximately 3,100 counties in the United States, 49.4% lost population between 1950 and 1960, and 44.3% lost between 1960 and 1970. These losing counties tended to be concentrated in the Midwest plains, Appalachia, and the rural South. In contrast to these loss rates, of 220 coastal counties in the 48 conterminous states, 25% lost population between 1950 and 1960 and 32% did so between 1960 and 1970. In both decades, losing coastal counties were largely located in older metropolitan or in isolated or swampy areas. See: U.S. Bureau of the Census, Census of the Population: 1960, Vol. 1, Part A (Washington, D.C.: USGPO), p. xx; 1970, PC(1)-A1, Tables 22 and 24; 1970 United States Maps, GE-50, No. 41 and No. 42.

TABLE 1. POPULATION CHANGES, 1960-1970, FOR MISSISSIPPI AND COASTAL COUNTIES

Area	Total Population		Change	
	1960	1970	N	%
The State	2,178,141	2,216,850	38,709	1.8
Counties				
George	11,098	12,459	1,361	12.3
Hancock	14,039	17,387	3,348	23.8
Harrison	119,489	134,582	15,013	12.6
Jackson	55,522	87,975	32,453	58.4
Pearl River	22,411	27,800	5,389	24.0
Stone	7,013	8,101	1,088	15.5
Total (Counties)	229,572	288,304	58,732	25.5

Source: U.S. Bureau of the Census, 1970 Census of Population, PC(1)-26A, (Washington, D.C.: USGPO) Table 9.

It is apparent that the Coastal region of Mississippi has absorbed more people than the state as a whole, and when it is pointed out that this increase of almost 60,000 persons occurred during the same decade which saw Hurricane Camille pour death and destruction upon much of the area, it becomes obvious that leaders in the area face both problems and opportunities.

Further assessment of the significance of growth on the Mississippi Gulf Coast can be obtained by a comparison of population densities within the six-county area with those of other areas of the nation. Table 2 demonstrates that while Mississippi's coast has not achieved the extreme densities of cities which experienced rapid growth during earlier periods of our nation's history, and indeed has extremely sparse settlement in several of the counties in the area, its core of density in Biloxi and Gulfport is comparable to that of the nation's newer cities which have grown into extensive areal sprawls during the period of the nation's history which has been dominated by automobile transportation.

TABLE 2. POPULATION DENSITY IN SELECTED AREAS  
OF THE UNITED STATES AND MISSISSIPPI, 1970

Area	Persons Per Square Mile
United States Average	58.0
Central Cities, United States	
New York	24,385.0
Chicago	12,385.0
New Orleans	6,846.0
Los Angeles	6,135.0
Memphis	3,513.0
Houston	3,102.0
Huntsville	1,263.0
Mississippi Average	46.9
Central Cities, Mississippi	
Jackson	3,067.0
Biloxi	4,368.0
Gulfport	1,581.0
Counties, Mississippi	
Hinds	245.4
George	25.9
Hancock	36.1
Harrison	230.1
Jackson	119.5
Pearl River	33.6
Stone	18.8

Source: U.S. Bureau of the Census, 1970 Census of Population, PC (1)-A1 (Washington, D.C.: USGPO), Table 20; 1970, PC (1)-A26, Table 9.

#### PURPOSE AND FOCUS

The purpose of this cooperative Universities Marine Center Sea Grant project is to provide leaders and planners with a detailed population and housing analysis of the Mississippi's Coastal region. Three levels of analysis are being presented. The first, focusing on the Coastal area as a unit, has been prepared by the University of Southern Mississippi; the second, focusing on the census tracts of the Biloxi-Gulfport SMSA has been prepared by the University of Mississippi; and the third, which focuses on small

areas (Enumeration Districts) surrounding the urbanized central core of the Biloxi-Gulfport SMSA<sup>4</sup> and is the subject of this report, has been prepared by Mississippi State University.

### Significance of Areas Outlying Urban Centers

Population growth in Mississippi and the nation has had an increasing tendency over the last two decades to be suburban in nature. For the nation as a whole, the total numbers increased by 13.3 percent. However, in central cities of SMSA's, growth was only 5.3 percent, while the surrounding county area population increased by 28.2 percent.<sup>5</sup> Similar trends have occurred in Mississippi. Of the state's 21 non-SMSA cities of 10,000 or more population in 1970, only ten grew within their 1960 city limits, and of these, only three experienced most of their growth within these boundaries. The others accumulated from 40 to 90 percent of their growth from annexations. Growth rates for Mississippi cities in general would probably have been significantly higher had annexation been more extensive.

Mississippi's SMSA's also added most of their growth in suburban areas. The Jackson SMSA grew by 28.9 percent. However, its central city increased by only 6.6 percent, while the surrounding county increased by more than 1,000 percent. Although Biloxi-Gulfport had not been designated an SMSA in 1960 its growth during the decade was also of a suburban nature. Biloxi's city population increased by 10.1 percent as the result of annexation and would have in fact decreased by 16.9 percent had not annexation occurred. Similarly, in Gulfport, nearly 90 percent of its 10,587 increase over the decade resulted from annexation.<sup>6</sup>

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<sup>4</sup>Enumeration Districts are the smallest areas for which census data are tabulated in non-tract areas. Therefore, they are the basic units for summarizing census data in rural areas and in non-SMSA cities. An SMSA is a Standard Metropolitan Statistical Area, so designated by the U.S. Bureau of the Census, because it has achieved a minimum level of metropolitan characteristics. An SMSA is a county or counties which contain a city nucleus of at least 50,000 persons and meets other minimal economic characteristics. Mississippi contains two SMSA's: Jackson SMSA, consisting of Hinds and Rankin Counties, and the Biloxi-Gulfport SMSA consisting in 1970 of Harrison County. SMSA's are divided into Census Tracts which are permanently defined areas made up of Enumeration Districts, which in turn (in the central city) are divided into Blocks, which in the urban core of the SMSA constitute the smallest areas for which data are tabulated.

<sup>5</sup>U.S. Bureau of the Census, 1970 Census of Population and Housing, PHC (2)-1 (Washington, D.C.: USGPO), Table 1.

<sup>6</sup>Loc. Cit., and PC(1)-A26, Tables 6 and 8.

Given the continuation of means for the development of modern types of transportation, future growth can be expected to occur in suburban and outlying regions of any metropolitan or urban area and the linkage of residence to place of work increasingly maintained by daily commuting of the work force. Therefore, development of an area is unavoidably tied to land and population resources of its surrounding areas. For this reason, planning for judicious development of the Mississippi Gulf coast must consider the status, the potential and the limitations of the population, housing, and economic resources in its peripheral small areas.

### Data and Units of Analysis

The smallest areas for which census data are available in non-tracted areas are the Enumeration Districts (or ED's). These areas are variable in size and consist of the area covered by one census taker. The boundaries are not permanent but vary from census to census. They are thus not amenable to trend analysis. Ideally, they are supposed to contain 1,000 persons each, but, in fact, they vary from zero population in a few cases, to a few hundred, to several thousand inhabitants. Data on 160 nonmetropolitan Enumeration Districts in the six-county area bordering on or adjacent to the Mississippi Gulf Coast constitute the basic informational input for this report. See Figure 5 for a map outlining the boundaries of these ED's. It should be noted that only a few ED's in Harrison County are included. These constitute the ED's which are peripheral to Harrison's urbanized central city core.

Originally, the only data which the Bureau of the Census made public for these small areas was that based on total population counts. This limited the type of data available to the very standard demographic characteristics such as age, race, and certain housing characteristics. These limited data were to be the bases for the study originally proposed by the Sea Grant project. However, since the approval of the project, the Bureau of the Census has made available on computer tape the results of a special project which retabulated zip code tapes containing sample-based socioeconomic data (income, occupation, education, industry, etc.) for Enumeration Districts. Project leaders decided to purchase and program these data tapes for Mississippi and use them as the basic inputs for this study of Mississippi's coastal area in spite of additional costs in material purchases, computer work, output analysis time and publication volume. Including socio-economic data as well as the more basic demographic variables should make this base report more useful to the local planner. It should be cautioned, however, that these sample-based data are not without limitation. There is always some likelihood that a population statistic, obtained by blowing up to total population size statistics taken on a sample basis, may not accurately reflect the situation in the total population -- that is, it may reflect sampling bias. This problem is especially critical where the population base is small, as in the case of Enumeration Districts. In spite of this limitation, it is strongly felt by the investigators that the data in this report are reasonably reliable and should prove very useful.

One other type of data has been used for this report. This is the intercounty commuting data for the six-county area for 1960 and 1970. See Figures 1 through 4 below for maps of commuter flow in the area. It was felt that assessing the relationship of outlying small areas to the metropolitan core of the area necessitated the inclusion of trends in commuting patterns.

## METHOD AND PRESENTATION OF THE DATA

### Maps and Indexes

This report is descriptive in nature. It does not attempt causal abstract variable analysis. Essentially, it is a catalogue of data which the planner can consult and use as a base for his planning work. Therefore, the techniques used in depicting the findings were selected to give understandable summaries of descriptive statistics. Extensive use has been made of computer mapping of summary population and housing indexes. A total of 13 statistical indexes are displayed on computer-produced maps of the nonmetropolitan Enumeration Districts in the six-county area. Separate maps of each index for each of the eight nonmetropolitan urban places, as well as for the six-county composites are included. Four categories depicting high to low rank are used to identify the ED standing on each index. These are Low, Low-Medium, High-Medium, and High.

For the first two computer-produced map indexes -- Population Stability and Population Heterogeneity -- categories were formed by dividing the total numerical span of scores for all of the 316 ED's in the area into four equal parts. For the remaining eleven indexes, categories were formed by examining the distribution and taking into consideration the distribution and clustering of the scores among the ED's so as to locate natural breaks in the data. Where reasonable, the categories used are the approximate boundaries of quartile distribution breaks. However, category limits were adjusted to prevent having breaks at fractional values. Also, when a high proportion of scores clustered very closely at the middle or at one of the extremes, adjustments in the category spans were made. For example, an examination of the distribution on the Quality Potential index revealed that nearly 67 percent of scores clustered in the middle between the values of 30 and 46 -- a span of only 16 units. This span was arbitrarily cut in half for the High-Medium and Low-Medium classes. The Low category was allowed to cover a span of 30 unit values and 14 percent of the cases; the High span was allowed to cover 28 units and 20 percent of the cases. It was felt that these categories gave an accurate description of the distributions of scores among the ED areas.

Table 3 compares the percent distributions of scores among the nonmetropolitan with those of the metropolitan core and all the ED's in the area. On Most of the indexes there is a noticeable difference between the peripheral and total areas indicating that a definite rural characteristic separates out-

TABLE 3. PERCENT DISTRIBUTION OF ENUMERATION DISTRICTS OF THE MISSISSIPPI GULF COAST, BY RANK, FOR TWELVE SUMMARY POPULATION AND HOUSING INDEXES

Index and Category	Category Spans	All ED's (N=316)	Metro Core ED's (N=156)	Nonmetro ED's (N=160)
<u>Stability</u>				
(App. Tab. 5 & Figs. 6)				
(Range: 0-70)				
Low	0-16.99	4.4	7.1	1.3
Low-Medium	17-33.99	11.7	16.7	8.1
High-Medium	34-50.99	59.4	58.3	60.0
High	51+	24.4	17.9	30.6
<u>Heterogeneity</u>				
(App. Tab. 6 & Figs. 7)				
(Range: 0-24)				
Low	0 -5.99	45.4	31.8	58.8
Low-Medium	6-11.99	38.8	44.6	33.1
High-Medium	12-17.99	10.1	14.6	5.6
High	18+	5.7	8.9	2.5
<u>Quality Potential</u>				
(App. Tab. 7 & Figs. 8)				
(Range: 0-68)				
Low	0-29.99	13.9	19.2	8.8
Low-Medium	30-37.99	28.5	20.5	36.3
High-Medium	38-45.99	38.0	34.0	41.9
High	46+	19.6	26.3	13.1
<u>Dependency</u>				
(App. Tab. 8 & Figs. 9)				
(Range: 0-41)				
Low	0-19.99	41.5	57.7	25.6
Low-Medium	20-24.99	27.2	14.7	39.4
High-Medium	25-29.99	20.9	16.0	25.6
High	30+	10.4	11.5	9.4
<u>Familism</u>				
(App. Tab. 9 & Figs. 10)				
Range: 0-80)				
Low	0-39.99	12.0	16.6	7.5
Low-Medium	40-47.99	41.1	42.7	39.6
High-Medium	48-54.99	36.1	27.4	46.5
High	55+	10.0	13.4	6.3



TABLE 3. (continued)

Index and Category	Category Spans	All ED's (N=316)	Metro Core ED's (N=156)	Nonmetro ED's (N=160)
<u>Social Disorganization</u>				
(App. Tab. 10 & Figs. 11)				
(Range: 0-45)				
Low	0- 9.99	19.0	26.5	11.8
Low-Medium	10-17.99	35.8	32.9	38.5
High-Medium	18-25.99	29.4	20.0	38.5
High	26+	15.8	20.6	11.2
<u>Labor Force</u>				
(App. Tab. 11 & Figs. 12)				
(Range: 5-1,000)				
Low	0-33.99	32.4	22.6	41.9
Low-Medium	34-39.99	20.6	17.4	23.8
High-Medium	40-47.99	25.1	25.8	24.4
High	48+	21.9	34.2	10.0
<u>Industrial Lag</u>				
(App. Tab. 12 & Figs. 13)				
(Range: 0-30)				
Low	0- 3.99	26.8	38.2	15.6
Low-Medium	4- 6.99	30.6	29.9	31.3
High-Medium	7-13.99	32.2	25.4	38.8
High	14+	10.4	6.4	14.4
<u>Poverty</u>				
(App. Tab. 14 & Figs. 14)				
(Range: 0-47)				
Low	0- 5.99	28.4	38.2	18.8
Low-Medium	6-14.99	26.2	22.2	30.0
High-Medium	15-24.99	23.7	21.7	25.6
High	25+	21.8	17.8	25.6
<u>Housing Affluence</u>				
(App. Tab. 15 & Figs. 15)				
(Range: 0-67)				
Low	0-14.99	28.5	32.1	25.0
Low-Medium	15-29.99	28.8	27.6	30.0
High-Medium	30-39.99	23.4	17.9	28.8
High	40+	19.3	22.4	16.3

TABLE 3. (continued)

Index and Category	Category Spans	All ED's (N=316)	Metro Core ED's (N=156)	Nonmetro ED's (N=160)
<u>Housing Inadequacy</u>				
(App. Tab. 16 & Figs. 16)				
(Range: 0-35)				
Low	0- 1.99	23.4	37.2	10.0
Low-Medium	2- 4.99	24.4	30.1	18.8
High-Medium	5- 9.99	26.3	19.9	32.5
High	10+	25.9	12.8	38.8
<u>Incipient Housing Demand</u>				
(App. Rab. 17 & Figs. 17)				
(Range: 0-80)				
Low	0-24.99	20.9	31.4	10.6
Low-Medium	25-39.99	27.2	32.7	21.9
High-Medium	40-54.99	34.5	29.5	39.4
High	55+	17.4	6.4	28.1

lying areas from the metropolitan core. These differences are discussed in the text explaining each index.

#### Tables of Index Components

The indexes which are displayed on the maps were constructed to act as summary measures and they consist of simple averages of their component percents. Their possible range is from zero to 100. Their designation as measurements of particular population or housing characteristics is arbitrary. The user can assess the validity of any particular index for his own purposes by examining the table giving the component statistics. Each computer-produced map is backed up by a computer-produced table which repeats the index, and, in addition, gives its measurement components. These back-up tables will be found in the Appendix. They were produced directly from the computer and give data for all ED's in the area, metropolitan as well as nonmetropolitan, even though this analysis is concerned only with the latter. Including them simplified the computer programming and gave a basis for rural-urban comparisons.

Five tables of data not depicted on maps are also included. These did not seem to lend themselves to the construction of meaningful summary indexes. They include population and housing densities; numerical counts of persons and types of housing units; age, industries, and employment distributions; and income statistics. These data will be found on Tables 1-4 and Table 13 of the Appendix.

FINDINGS OF THE STUDY:  
DESCRIPTION AND ANALYSIS OF THE PERIPHERAL  
AREAS OF MISSISSIPPI'S COASTAL METROPOLIS

Commuting

While the major portion of each county's labor force works within its own boundaries, increasing numbers of persons drive long distances to reach their places of employment. Thus, one of the most significant indicators of the interdependency found among the small surrounding areas and the metropolitan core of the region is the origin and destination patterns of the area's commuting labor force. Figures 1 through 4 depict the 1960 and 1970 inter-county commuting patterns in the area. By comparing the size of the base of the triangular arrows and the directions in which they point, the amount of change in the volume and pattern of commuting that occurred during the decade of the 1960's becomes apparent.<sup>7</sup>

In terms of total volume, the number of people crossing at least one county boundary within the area to reach their places of employment about doubled during the decade, from about 8,300 to about 16,300 per day. This number includes both in and out-commuting for the six-county area. The number of commuters reported in Table 4 includes only the number of each county's labor force which worked outside its own county of residence. In 1970 there were 13,049 cross-county commuters identified as living within the six-county area. They constituted more than 70 percent of the total volume and indicate that a relatively small proportion of the area's commuters originates from outside the six counties -- in Louisiana, Alabama, and South-Central Mississippi. However this percent was up since 1960 when only 15% of the area commuters originated from outside the area.

The significance of commuting for employment varies sizeably among the six counties. Table 5 gives 1970 ratios of commuters to the non-commuter work force for the urban and rural components of each county. In every county commuting was proportionately more significant to its rural than to its urban residents, and only in Harrison County did commuting seem to be an insignificant factor in the employment pattern. However, part of the reason for its low ratio can be attributed to the large number of military personnel who were stationed there. In George County which is entirely rural, six persons commuted for every ten who worked within the county; and in rural Hancock County there were nearly seven commuters

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<sup>7</sup>The counts of commuters given in this presentation understate the volume because they are based on incomplete responses to census questions about place and county of work. Excluded are those who did not respond at all and those whose responses were incomplete. In spite of this limitation, it is felt that these data are useful for planning purposes.

TABLE 4. RESIDENT WORKERS BY COMMUTER STATUS, MISSISSIPPI  
COASTAL COUNTIES, 1970 AND 1960

County	No. of Employed Persons*	Commuter Status		Unaccounted for or Not Reported	
		Noncommuters	Commuters Destination Given      Not Given		
<u>1970</u>					
George	3,827	2,184	1,191	109	343
Hancock	5,525	3,506	1,255	192	572
Harrison	53,357	45,620	2,209	658	4,870
Civilian	37,856				
Armed Forces	15,501				
Jackson	30,832	23,554	3,594	456	3,228
Civilian	29,230				
Armed	1,602				
Pearl River	9,015	5,754	2,519	198	544
Stone	2,832	1,815	653	15	349
TOTAL	105,388	82,433	11,421	1,628	9,906
<u>1960</u>					
George	3,192	2,141	793	21	237
Hancock	4,022	2,500	999	99	424
Harrison	45,443	41,376	1,024	372	2,671
Civilian	30,070				
Armed Forces	15,373				
Jackson	18,264	14,970	1,914	150	1,230
Civilian	17,735				
Armed Forces	529				
Pearl River	6,883	5,401	925	161	396
Stone	2,100	1,523	402	43	132
TOTAL	79,904	67,911	6,057	846	5,090

\*In 1970, refers to persons 16 years of age and over; in 1960, to persons 14 years and over. Difference is not significant.

SOURCES: U.S. Bureau of the Census, Summary Tapes of 1970, U.S. Census of Population (Mississippi State, Mississippi: Summary Tape Processing Center), Fourth Count, Tab 35; 1970 Census of Population, Report PC(1)-C26 (Washington, D.C.: USGPO), Table 123; 1960, Report PC(1)-26C, Table 83; Office of Business Economics, "Special Printout of 1960 Commuting Data: (Washington, D.C.: U.S. Department of Commerce).

TABLE 5. RATIOS OF COMMUTERS TO NON-COMMUTERS,  
MISSISSIPPI COASTAL COUNTIES BY RESIDENCE, FOR  
1970 AND FOR TOTAL POPULATION ONLY, FOR 1960

County	Commuter/Non-Commuter Ratios			
	Total	1970		1960
		Urban	Rural	Total
George	.595	--	.595	.380
Hancock	.413	.284	.685	.439
Harrison	.063	.059	.085	.034
Jackson	.172	.155	.221	.138
Pearl River	.368	.205	.492	.292

SOURCE: Computed from data in Table 3.

for every ten "at home" workers. Tables 4 and 5 also give data for 1960. A comparison of the two years shows that while the number leaving their home county for work increased in all counties during the decade, so did the size of the resident labor force, so that in Harrison, Jackson and Stone Counties increase in the significance of commuting was slight; in Hancock, it decreased; but for George and Pearl River Counties there were noteworthy increases in the ratio.

### Patterns

In terms of patterns of travel, most of the general configurations found in 1960 were also found in 1970, although a few significant flows developed and others subsided during the decade. Harrison County constitutes the hub of net commuter inflow for both census years. In 1970, it had major commuting corridors connecting it to Jackson, Hancock, and Stone Counties in Mississippi and Baldwin and Mobile Counties in Alabama. It drew its largest commuter flow from Jackson County, a flow which doubled in both directions during the 1960's. Its second most sizeable commuter exchange was with Hancock County, where the volume of flow tripled during the decade and moved very close to a equal interchange of workers. Its volume of travel with Stone County also doubled; but, in addition, the pattern changed from one which moved only into Harrison to one in which for every four going from Stone to Harrison, one went from Harrison to Stone. Commuter flow between George and Harrison was insignificant in both census years. However, that between Pearl River and Harrison increased from a very minimal 35 in 1960 to a noticeable 143 in 1970, with

Harrison County the destination for almost all commuters. Harrison County was also the destination for a sizeable number of commuters crossing two county boundaries in their journey to work. The inflow from Alabama, mentioned above, increased five-fold during the 1960's, while outflow to Alabama remained about the same. Similarly, in its commuter exchange with counties in Louisiana, inflow more than doubled, while out-commuters increased by about one-third. Long distance commuting in both 1960 and 1970 also linked Harrison with Forrest, Perry, and Lamar Counties in Mississippi, although only with Forrest was there a noteworthy amount of travel, and in this case, the pattern of exchange began to reverse itself during the decade. The number of people going from Forrest to Harrison remained unchanged, but the number going from Harrison to Forrest increased.

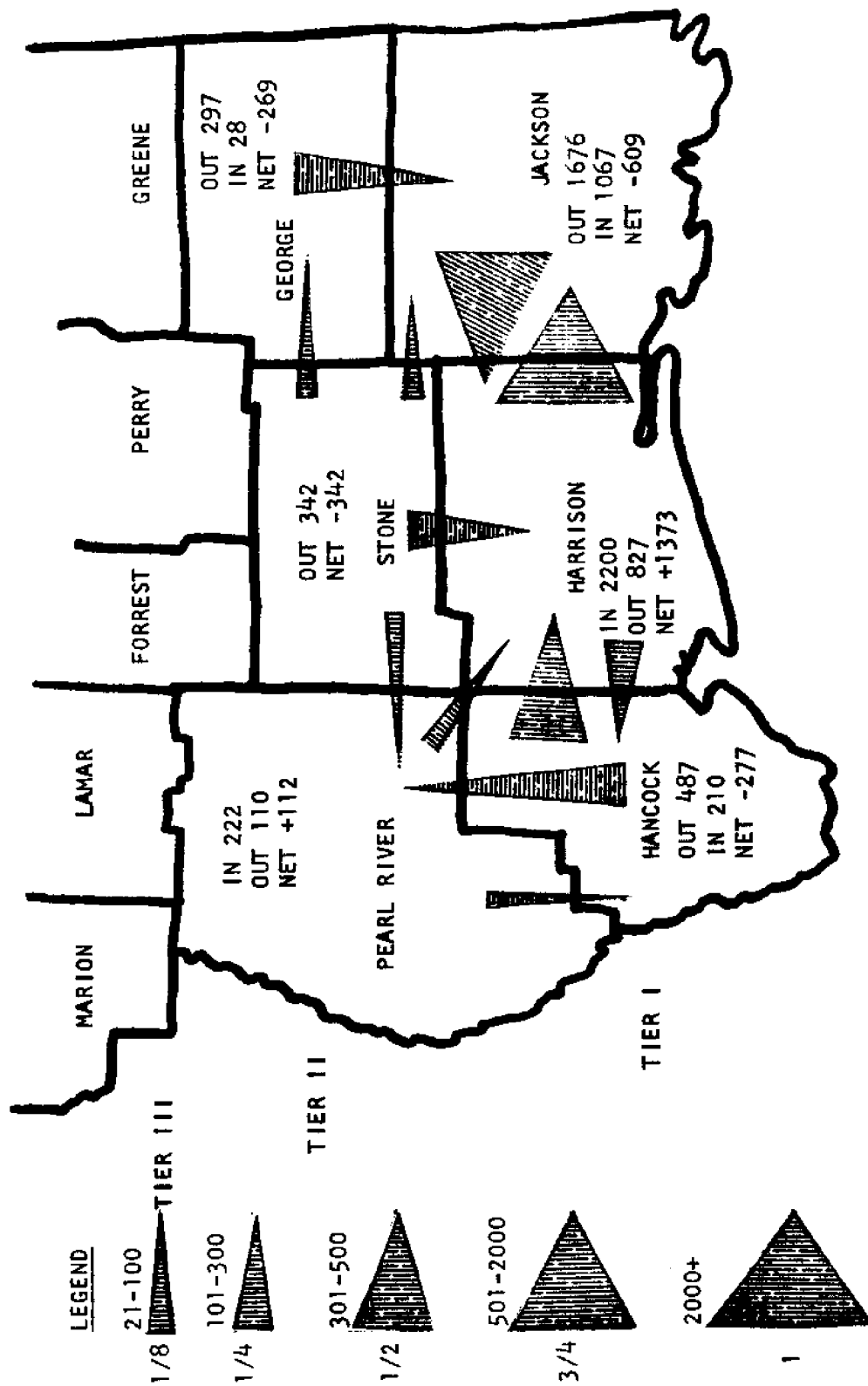
Jackson County seems to be a second nodal center for in-commuting, drawing an excess of commuters from George, Stone, Greene, Perry, and Forrest Counties in Mississippi and from Baldwin and Mobile Counties in Alabama. The basic pattern was the same for both census years, but the volume of net inflow increased four-fold from Greene and from Alabama, and two and one-half times from George County. The volume of out-commuting changed significantly only in the exchange with Harrison, as mentioned above.

Hancock, the third Mississippi County bordering on the Gulf, does not appear to be a nodal center for commuting. It had no net gain in workers from the commuting interchanges in 1960, and in 1970 it received a net excess only from Pearl River County.

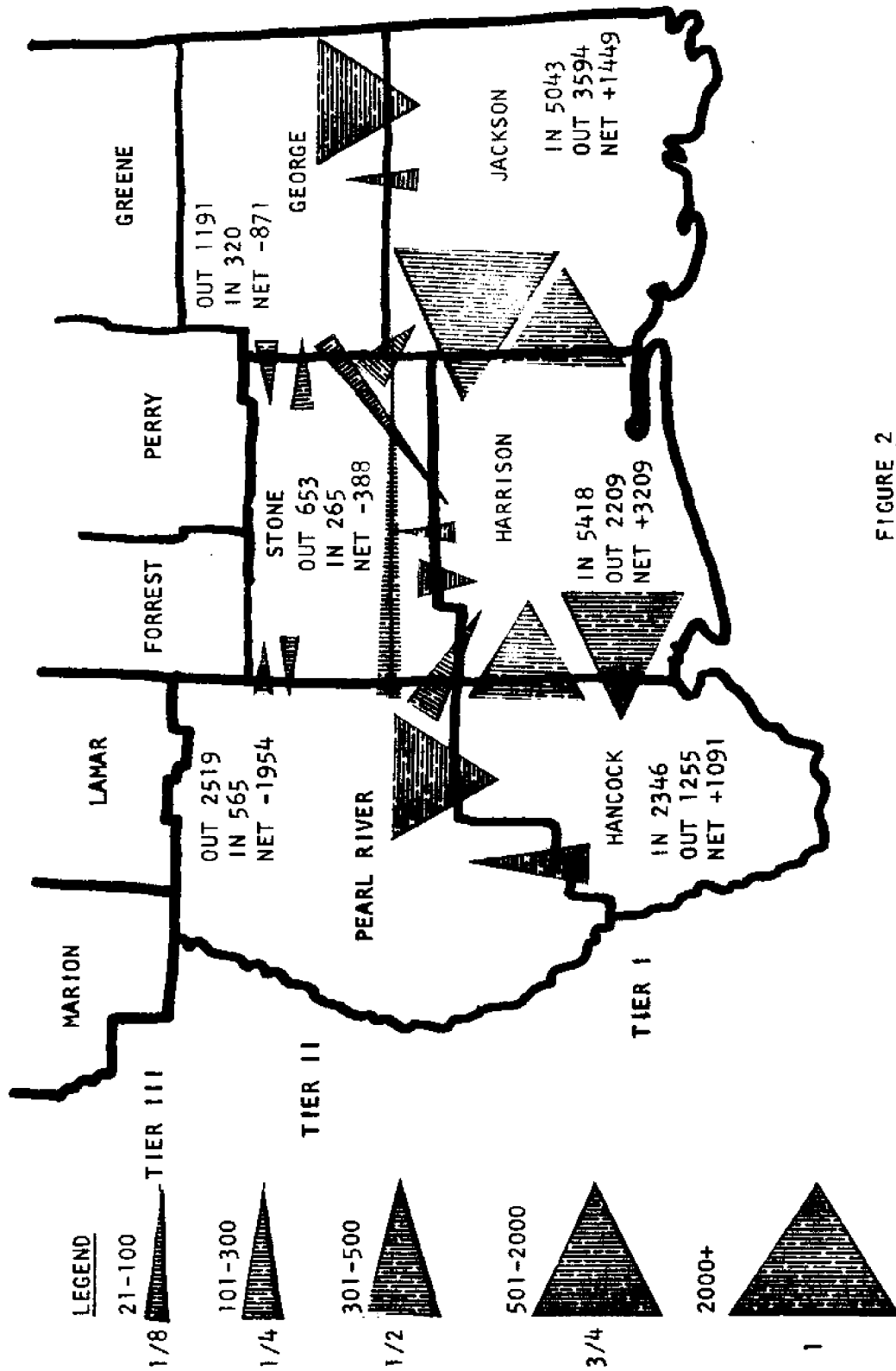
Pearl River County seems in both 1960 and 1970 to have been only loosely linked to the Biloxi-Gulfport metropolitan nucleus, although at the later date its outflow of commuters to Hancock County was just slightly above the number it sent to Louisiana. In 1960 this county sent 2 commuters into Louisiana for every one it sent to another Mississippi County. For both census years it sent more commuters to Lamar on its northern border than to the nucleus in Harrison.

One other corridor of commuting to places of work outside the state should be noted. George County sent a sizeable stream to Mobile County, Alabama, in 1960, but received none in return. This flow was larger than that going to Jackson County. By 1970, this volume into Alabama had been cut in half and the volume going to Jackson had grown by a factor of 2.6.

If the economic growth trend of the 60's persists through the decade of the 70's, planners can expect a proliferation and intensification of the commuter trends depicted above. The three coastal Mississippi counties can be expected to draw increasing numbers of commuters from an area reaching as far as two county boundaries into its hinterland. The flow of commuting seems to be very responsive to economic opportunities located at relatively long distances from home.

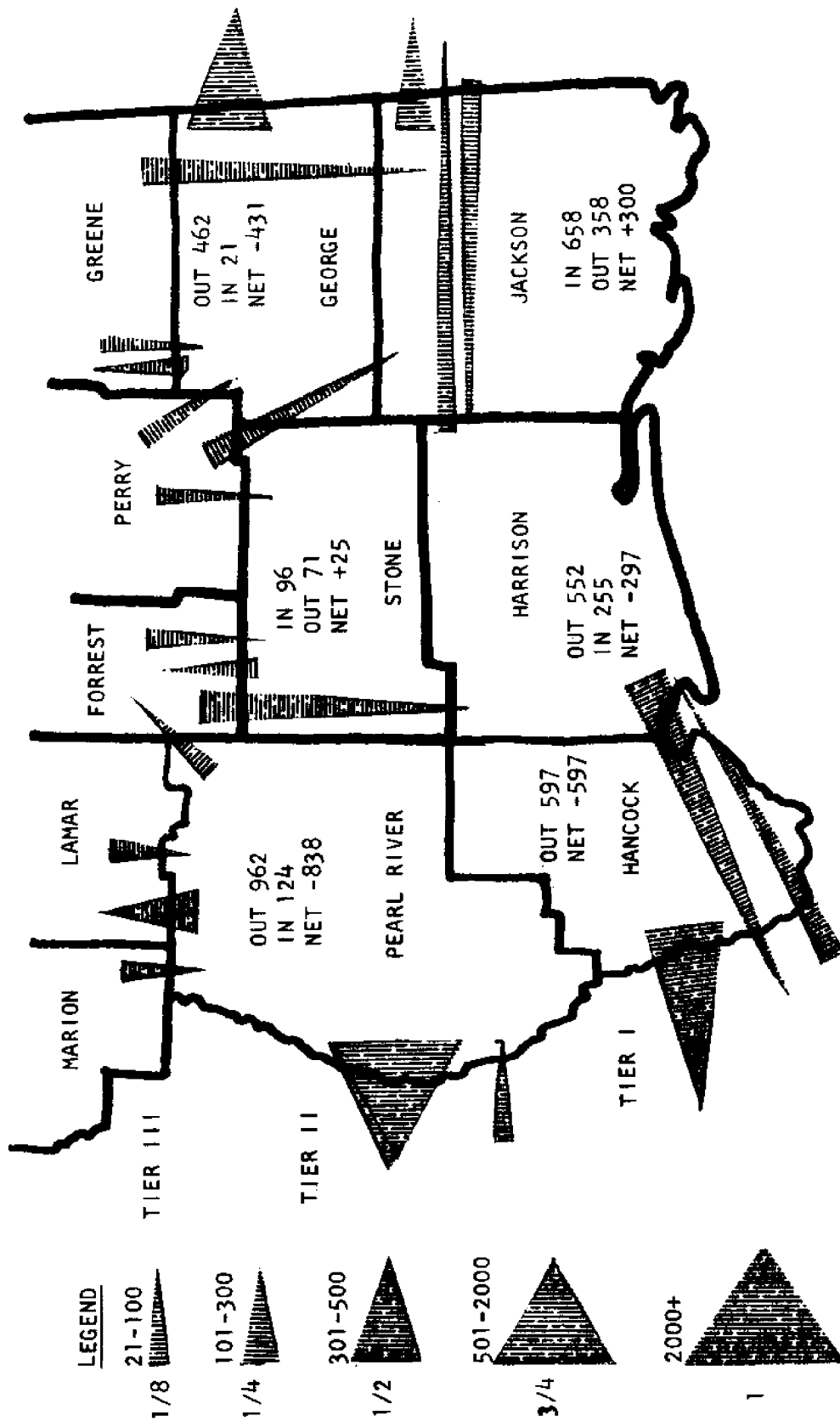


**FIGURE 1**  
 Total Commuting  
 Between Tier I &  
 Tier II Counties, 1960.

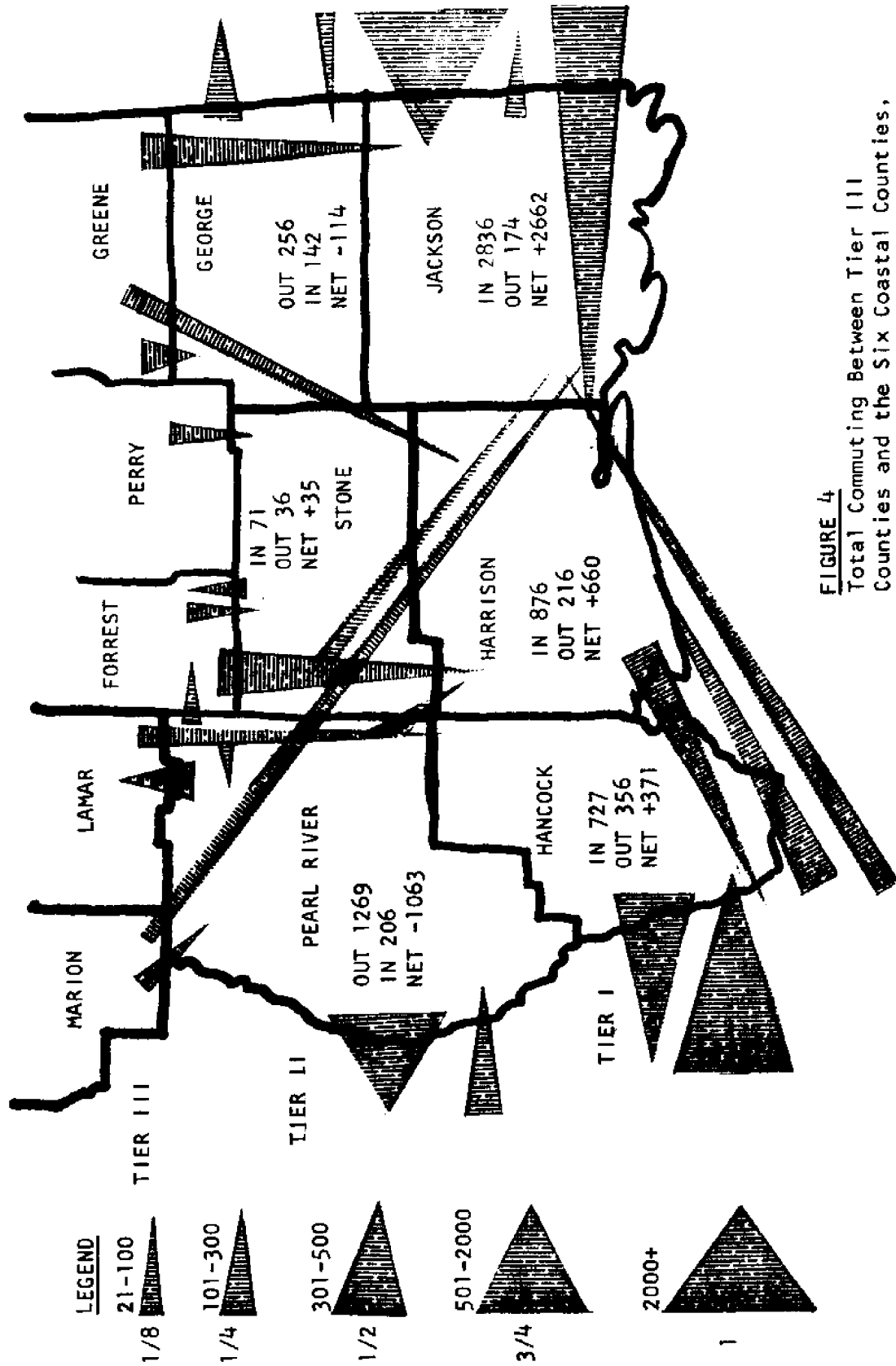


**FIGURE 2**  
 Total Commuting  
 Between Tier I &  
 Tier II Counties, 1970.





**FIGURE 3**  
 Total Commuting Between Tier III  
 Counties and the Six Coastal Counties,  
 and Between the Six Coastal Counties  
 and Louisiana and Alabama, 1960.



**FIGURE 4**  
 Total Commuting Between Tier III  
 Counties and the Six Coastal Counties,  
 and Between the Six Coastal Counties  
 and Louisiana and Alabama, 1970.

## Numerical Distributions of Demographic Data

Appendix Tables 1 through 4 give distributions of basic population and housing data which are not displayed on maps. Since these tables were not printed directly from the computer they give data for only those areas with which the analysis is concerned -- the nonmetropolitan Enumeration Districts. The ED and county outline map, Figure 5, can be used in geographically interpreting these figures.

It can be seen from Table 1 that Population and housing densities vary extensively among the areas studied, with lows of less than 10 persons per square mile in several of the more remote ED's and highs ranging over 6,000 in the urban centers. Similarly, housing units per square mile vary from under 5 to over 2,000 per square mile. Housing vacancy rates seem to be very high in some areas, undoubtedly reflecting the aftermath of Hurricane Camille. Only a few areas had sizeable concentrations of mobile homes or large apartments. The range in the average number of persons per occupied unit was rather narrow. There is, in fact, a greater difference between the races than among the various ED's or counties.

Table 2 distributes the population by age and sex. The last column gives median age and can be used to quickly identify areas with concentrations of either old or young persons. In one ED in Pearl River, the median age fell in the over 65 category and in several cases the average age was as low as 15.

Tables 3 and 4 give occupation and industry of employed persons and should be useful in assessing the types of skills and occupational interests of the labor force resident in each area.

### The Population and Housing Indexes -- The Mapped Data

The mapped indexes, each of which has a possible range of values from zero to 100, start with Table 5 in the Appendix and Figure 6 below. The first of these is the Population Stability Index. City maps for this index are in Figures 6A through 6H. Text Table 3 compares the percentage distributions among the four ranks for all ED's, metropolitan core ED's, and non-metropolitan ED's.

#### Population Stability Index

The labeling of this measure as a population stability index has only historical implications for the ED's, and it in no way indicates a future high stability status.

Three values are averaged for this index -- the percents of the total population which are white, resident on farms, and non-movers. The index indicates the extent to which an ED population has been unaffected by recent industrial changes and migratory trends. Historically, the Mississippi region has been predominantly populated by rural whites and it is

only since World War II that sizeable movement into the area has occurred. The map classification which simply divides the total range of index measurements into four equal parts indicates that a high degree of population stability exists in most of the outlying ED's of the region. An index of under 17 indicates Low stability; of 17 to 39.99, Low-Medium; of 34-50.99, High-Medium and one of 51 and over, High stability. Virtually all of the non-metropolitan ED's fell into the two top categories, with about one in three of these in the highest category. Only two nonmetropolitan ED's, one in Wiggins, and one in Picayune (both of which are areas of nonwhite residence), fell into the low category; six of the nonzero metropolitan areas did. Only 12 of the 160 mapped ED's had less than 50 percent white populations; and nearly two-thirds had at least half of their number consisting of non-movers. However, the proportions living on farms were mostly low and serve generally to lower the indexes. The highest proportion farming was found in ED 11 in Stone County where one-third of the population resided on farms. As text Table 3 shows, distribution for the metropolitan core on this index is not quite as highly skewed toward the high categories as is that for the nonmetropolitan areas.

#### Population Heterogeneity Index

Essentially a counterpart of the Population Stability Index, this index summarizes the extent to which the population in an area results from an influx of divergent types of population. Five percentages were averaged to obtain this index -- the proportions nonwhite, foreign born, of foreign stock, and immigrant from both other regions and other southern states. The values (0 to 23.15) in the ranked categories of this index are Low, 0-5.99; Low-Medium, 6-11.99; High-Medium, 12-17.99; and High, 18 or over. All of these values are relatively low, and even the areas falling into high rank on this index are more characteristically homogeneous than heterogeneous. Of the nonmetropolitan ED's, 92 percent are in the two lowest categories as compared to 75 percent of metropolitan ED's. See Figures 7, 7A to 7H and Appendix Table 6.

The component which has the most significant impact in nonmetropolitan ED's on this index is the percent nonwhite. Foreign born and foreign stock<sup>8</sup> populations were in such small proportions that foreign ethnicity cannot be considered a significant aspect of these ED populations. Furthermore, the foreign stock which was present in these ED's was chiefly of European origin. Of foreign stock originating in the Western Hemisphere, Canadians were most numerous. Very few Mexicans or Cubans made up the 1970 population of this coastal area's hinterland. The statistics on immigrants are derived from information on place of residence in 1965 and are a

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<sup>8</sup>Foreign stock includes persons who were foreign born plus those whose parents were foreign born.

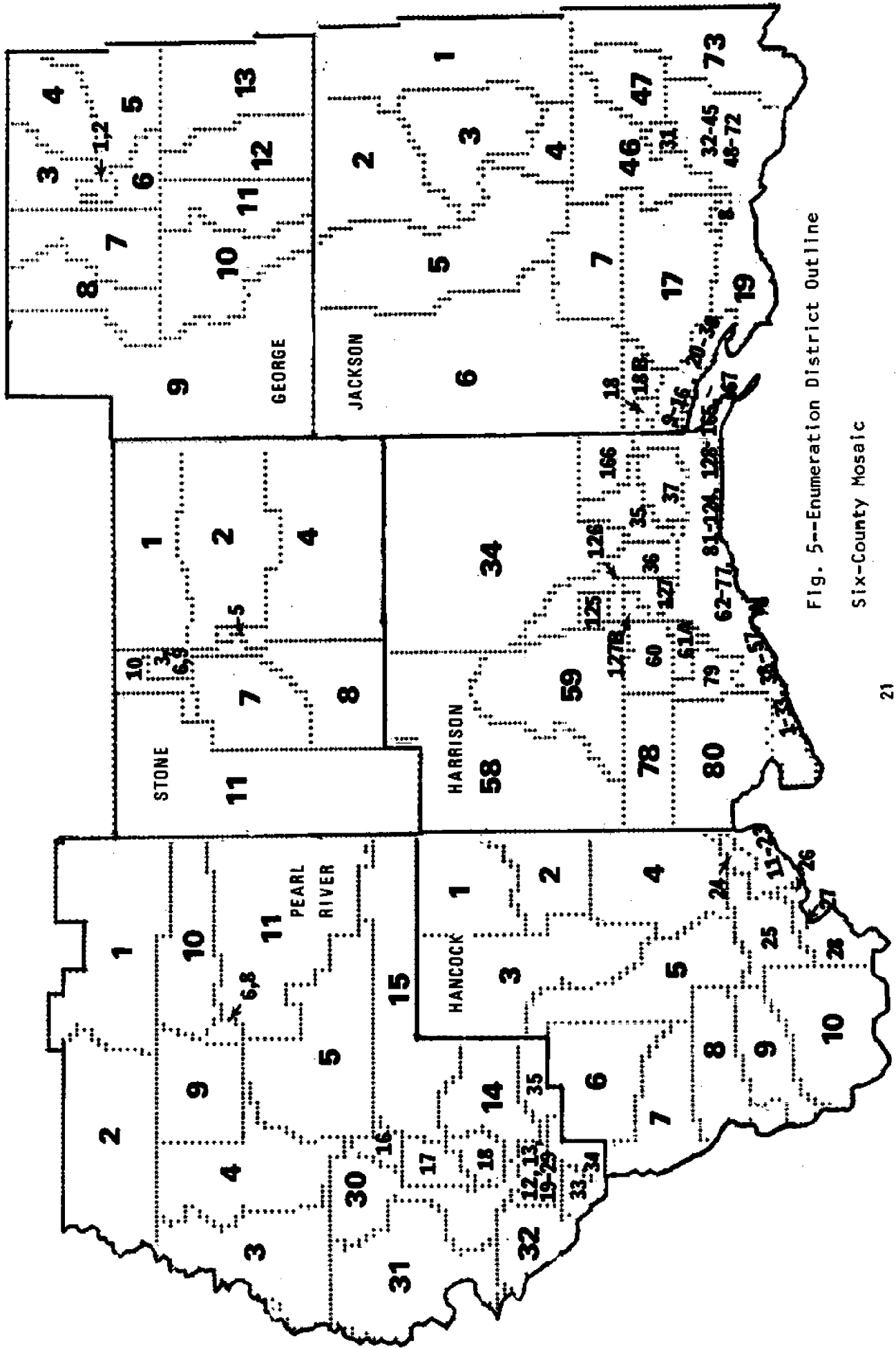


Fig. 5--Enumeration District Outline  
Six-County Mosaic

measure of net inmovement between 1965 and 1970. Table 6 indicates that inmovement from other southern states dominated the migratory streams. A few of the ED's studied contained no immigrants, and approximately half had less than 10 percent. However, the other half of the areas contained higher concentrations of in-movers, about one-fifth of them having better than 25 percent. In one ED in Picayune, more than half the 1970 inhabitants had moved in from other states between 1965 and 1970.

### Index of Quality Potential of the Population

This third index, displayed on the maps in Figures 8, 8A to 8H, and in Appendix Table 7, attempts to give a rough estimate of the extent to which each area can and is developing its population's quality through education. The most important resource of any society is its people, and when, for whatever reason, they do not receive training that equips them for successful competition at a national level, their quality potential, in terms of achieving high standards of living, is limited. Four variables were averaged for this index. The first is the percent of population in the economically productive or working ages. A low percent here would indicate high proportions of children or old people and a likelihood of a relatively heavy economic burden in supporting persons in dependency ages, while a high percent would indicate the existence of a broad economic base in the population for general development and for the support of training programs. Two of the variables measure the amounts of school enrollment at the lower and upper ends of the school enrollment ages. They indicate the extent of a community's efforts to train its youth beyond what has been normatively expected in the past. The fourth variable measures the percents of the post-school age population under age 45 which has had some college training.

The four categories covering the distribution range on the index are: Low, 0-29.99; Low-medium, 30-37.99; High-medium, 38-45.99; and High, 46 and over. For this index, the nonmetropolitan areas have values which cluster in the two middle categories, while ED's in the metropolitan core have higher concentrations at the extremes. More than 75 percent of nonmetropolitan ED's are rather evenly divided between the two middle categories. While the core area has a proportion in the High category which is twice that for the peripheral area, it has more than twice the nonmetropolitan proportion in the Low group.

The extent of variation on all of the component values is somewhat surprising as is the lack of any apparent correlation among the component values themselves. Some of the variation is undoubtedly derived from the sample basis of the data. In a few cases, sampling from a very small population base has resulted in a sample blow-up which gives percents in excess of 100. These cases are all found in the metropolitan areas where the population base was as small as five or six persons. Since these core areas are not the object of this analysis, no efforts were made to adjust these values.

## Dependency Index

Dependency was indexed by averaging the percents of the population under 18, over 65, and the percent of those over age 25 who had 8 years or less of schooling. The first two are measures of the proportion of the population in the dependency ages. The last is included because of the assumption that persons with low educational levels tend to compete less successfully for well paying jobs and, as a consequence, are more likely to require community assistance during periods of adversity. Value ranges selected for the four categories were: Low, 0-19.99; Low-Medium, 10-24.99; High-Medium, 25-29.99; and High, 30 and over. On this index two-thirds of all ED's, both metropolitan and nonmetropolitan, fall into the two lower categories, but the latter concentrated (39%) in Low-Medium while the former (58%) concentrated in the Low category. The data for this index will be found in Figures 9, 9A to 9H, and Appendix Table 8.

In most of the nonmetropolitan ED's, percent under age 15 ranges between 20 and 30. However, in a few cases this proportion is over 40 and approaches 50 percent. In these instances the percent over 65 is usually very low. The percent over 65 hovers close to 10 percent in most ED's. Only about 6 percent have percents of aged as high or higher than 15 percent. In the cases which do, there are also high proportions with low levels of schooling.

The percents of the population with low educational levels is surprisingly high in many of the ED's; nearly one-fourth had 40 percent or more of persons 25 and over who had had less than 8 years of education, and in one case the proportion was close to 75 percent. Every ED falling in the high category on this index had a high percent of its population with a low level of education.

## Index of Familism

The maps on Familism will be found in Figures 10, and 10A to 10H. The supporting table is Number 9 in the Appendix.

Scores on the Familism Index clustered so intensively in the middle range that division into uniformly sized category spans or percentile breaks was not logically reasonable. Values selected for the four categories are: Low, 0-39.99; Low-Medium, 40-47.99; High-Medium, 48-54.99; and High, 55 and over. The nonmetropolitan areas differ somewhat from the metropolitan ones, having (1) a distribution skewed toward High-Medium, while the latter are skewed toward Low-Medium, and (2) smaller proportions in both the top and bottom categories.

Five variables were averaged for this index: percent of all persons living in families of kin, percent married of those 14 and over; percent of families with own children under 18; percent with six or more members; and number of children per 10 married women, aged 35-44. On the first of these, the data show that in the great majority of ED's at least 90 percent of the population lived in families. Only three nonmetropolitan ED's

fell below 80 percent. In the nonmetropolitan ED's, the percent of families with 6 or more members varies between 0 and 40 percent; the proportion married ranges from 40 and 85 percent; and the number of children per 10 ever-married women 35-44 years of age between 0 and 88.

### Social Disorganization

This index is shown on the maps in Figures 11, 11A to 11H, and in Appendix Table 10. It is based on the averaged percents of six variables. Its category values are: Low, 0-9.99; Low-Medium, 10-17.99; High-Medium, 18-25.99; and High, 26 and over. The distribution is bell-shaped with about 80 percent of nonmetropolitan cases falling in the two medium categories. In the metropolitan counties, the spread into the extreme categories is somewhat greater -- that is, the metropolitan core has a slightly higher percent of cases in both the highest and lowest levels of this measure of social disorganization.

The component variables were selected to give an assessment of the extent to which the social institutions seem to be inadequate in meeting the needs of the population. Each variable measures the extent of existence of a situation likely to be stressful for the persons involved.

The first of the averaged variables -- percent of population aged 16-21, unemployed and not in school -- ranged from zero in several cases to over 50 percent in a few. Mostly, these proportions fell within the range of 20 and 30 percent.

The percents of persons over 14 who were divorced or separated were generally less than 10 percent. Only 6 ED's were above this level; the highest, having just over 17 percent, was an ED in Jackson County which ranked low on other component variables.

The percent of families receiving public assistance varied from zero to a high of 35 percent. However, only 23 ED's had more than 10 percent of their families on welfare.

Unrelated individuals are persons living alone or in household units composed of non-kin persons. High proportions of them are often aged and, according to this data, they tend to be characterized by high proportions of poverty. While several ED's had zero percent in this classification, the norm tends to be 50 percent or more, with at least two-thirds of the ED's falling in this range.

Children living in broken homes also, as a rule, suffer disadvantages in American society. While generally smaller proportions fell in this stressful category than for previous characteristics, percents reached into the 30's and 40's in several cases, and, in one instance, in Stone County, to 59 percent.

The percent of families with female heads is also a measure of broken homes, and, in general, areas ranking high on the preceding index should also rank high on this one, although being included in the one does not automatically locate a person in the other. That this is true is indicated



by divergence of the percents for this variable in both directions from those in the preceding variable. The majority of ED's had less than 15 percent of their families in this class but a few had percents in the 30's.

### Economic Data and Indexes

#### Labor Force Index

The labor force index is an average of three percents, each of which indicates the extent to which there is a high level of remunerative activity in the area. The input variables are percent of persons of labor force age who were in the labor force, the percent of these who had white collar jobs, and the percent employed in professional and related services and industries. Category breaks are: Low, 0-33.99; Low-medium, 34-39.99; High-medium, 40-47.99; and High, 48 and over. The percent distribution of ED's within these categories is more skewed to the lowest class for non-metropolitan ED's than for metropolitan ED's, with 43 percent falling within the bottom group and only 9 percent in the top. This, of course is to be expected when comparing the highly rural areas with metropolitan core areas. Figures 12, 12A to 12H, and Appendix Table 11 display these data.

Labor force participation rates vary from about 33 to 100 percent. This proportion can be expected to vary according to the number of females, retired persons, students, and nonemployed, as well as according to the number of persons unable to work. A low percent may in some cases be as indicative of affluence as a higher one.

High proportions of employment in white collar work and professional and specialized service industries are usually indicative of an educated and skilled labor force employed in jobs drawing better than average wages. There are, of course, exceptions to this tendency. Many blue collar jobs are highly skilled and pay wages which are substantially higher than many white collar ones. Nevertheless, high proportions of white collar workers are not usually achieved until after a community has moved a sizeable number of its workers out of low-skill manual jobs. The proportions in white collar work are generally somewhat higher than those in the specialized industries for most ED's, with two-thirds of the values for it falling between 30 and 60 percent, while for the industry variable, about seven-tenths fall between 10 and 30 percent.

#### Index of Industrial Lag

Values on this index, which is largely a counterpart of the labor force index, are generally low. They will be found in Figures 13, 13A to 13H, and Appendix Table 12. The category ranges are: Low, 0-3.99; Low-Medium, 4-6.99; High-medium, 7-13.99; and High, 14 and over. In the nonmetropolitan ED's the distribution among these categories is bell-shaped with 70 percent of the cases falling in the middle categories.

The metropolitan core ED's are skewed toward the lower values with approximately 40 percent falling in the first categories.

Three component variables are included in this index: percent of the male labor force which was unemployed; the percent of the labor force employed as laborers or farmers; and the percent of housing units unoccupied. The inclusion of the first two of these is self-explanatory. They encompass the extent to which the economy has not provided jobs and the extent to which agriculture and unskilled manual labor continue to be the source of livelihood. The third variable -- unoccupied housing units -- is an indirect measure of out-migration from the region, reflecting both the effects of the hurricane and the failure of the economy to provide employment for the area's population.

Unemployment rates vary from zero to 35 percent in nonmetropolitan ED's, but mostly fall in the neighborhood of 5 percent or less. The farm and manual labor force percents run from zero to 42 percent, but fall mostly between 5 and 20 percent. Empty housing also ranges from a low of zero to a high of over 60 percent. Nevertheless, again, most of the values are found well below the high mark and between 5 and 20 percent.

### Income

Appendix Table 13, giving total aggregate income, per capita income, and median family income for all ED's of the six-county area, is not displayed in a summary index form on a computer produced map. A meaningful display of this data would have required three separate mapping displays, and it was felt that the planner could just as easily use the summary table and the ED outline map (Figure 5) as compare symbols on three maps. The greatest variation among ED's on income is found in the aggregate income column. When multiplied by 1,000, these figures give the total number of dollars in income which the residents of each ED received during 1969 and reported in 1970 census returns. The user is cautioned that these data, as most of the data in this report, are based on information taken from a sample of persons and blown up to depict the whole population.

Per capita income figures in the nonmetropolitan ED's vary from \$875 in ED 29 in Pearl River County to \$4,852 in ED 68 in Jackson County. Median family income varies from a low of \$2,684, also in ED 29 in Pearl River County, to \$14,480 in ED 71 in Jackson County. An examination of the data in the metropolitan ED's will reveal greater proportions at both extremes of the income range than is to be found for the peripheral areas.

### Poverty Index

Four statistics on poverty make up this index -- the percent of families below poverty level, the percent of female-headed families below poverty, the percent of the population 65 and over below poverty level, and the percent of households with no television. These are not all mutually

exclusive variables. The first incorporates the second and to some extent the third. All three are included because together they document both general levels and critical classes of the poverty population. The television statistic is included because of the seeming universal popularity of the medium and the ease with which some type of unit can be bought and installed. The classes and their values are: Low, 0-5.99; Low-medium, 6-14.99; High-medium, 25-24.99; High, 25 and over. The ED's, both metropolitan and nonmetropolitan, are rather evenly divided among these classes, but with a tendency for the more urbanized areas to be skewed toward the low categories. These data are shown on the maps, Figures 14, 14A to 14H and Appendix Table 14.

The percent of families below poverty ranges from 0 to 66 in the nonmetropolitan ED's; however, only 14 percent of ED's exceeded 30 percent, while nearly 40 percent had less than 10 percent of families below poverty. The percents of female headed families in poverty are much higher, with percents as high as 50 or even 100 percent not unusual. The many ED's with zero percents results not only from families of this type not being in poverty but also from the absence of female headed families in many areas. See Appendix Table 10 on Social Disorganization.

The proportion of the population 65 and over which was below poverty level is generally low, ranging from a high of 39 percent in one ED to many instances of zero percent. Only seven of the nonmetropolitan ED's had percents of over ten on this variable. In most, the proportion was 5 percent or less. The modal proportion for households without television was zero; however the proportion of those without TV exceeded 30 percent in a few ED's.

### Housing Indexes

Three summary descriptions of 1970 housing data were prepared and displayed on maps. These were Housing Affluence, Housing Inadequacy and Housing Demand. The first two are based on value, condition, and available facilities; the last is based on the amount of income spent on housing.

#### Housing Affluence Index

Scores on this index are generally higher than on the Inadequacy Index, indicating a greater tendency toward having very favorable living conditions than toward inadequate ones. A total of ten variables were averaged for this index, and the category ranges selected were: Low, 0-14.99; Low-medium, 25-29.99; High-medium, 30-39.99; and High, 40 and over. There is very little difference in the distribution of values in these categories between nonmetropolitan and metropolitan ED's, although the latter have a few more percentage points in both the top and bottom categories. The data for this index are displayed in Figures 15, 15A to 15H, and Appendix Table 15.

The variables listed in the last three columns of Table 15 use either owner occupied or renter occupied units as their percentage base. One is a measure of the proportion of owners who moved into their homes since 1965, two are measures of the percent of relatively expensive units in the areas. Examination of these columns indicates that the six-county area in general has experienced relatively many recent owner moves but contains a rather limited number of expensive homes.

It is noteworthy that even in the most rural counties of the area, it is not unusual for as many as 50 percent of owner houses to have been first occupied by the owners within the five-year period preceding the census. In fact, several instances of 70 and 80 percent can be noted. The extent to which the homes were newly purchased or newly constructed at the time of first occupancy is, of course, not known. On the other hand, it should also be noted that nearly 30 percent of these nonmetropolitan ED's had none of their owner households in this recent mover class.

The percentage of housing values at \$25,000 or more or renting for \$150 or more a month in 1970 is relatively low. Nearly one-half of the ED's had no housing valued as high as \$25,000, and about three-quarters had no units renting for as much as \$150 a month. Of those which did, the majority had less than 20 percent. The high percent in the owner group was 49 percent in Jackson County and in the renter group, 69 percent, also in Jackson County.

One variable in the index measures the amount of space in housing -- the percent containing six or more rooms. All but five of the nonmetropolitan ED's had at least a portion of their housing units containing this much room, and very few of these percents were less than 25.

The remaining variables all measure possession of household equipment and facilities. In general, there is a wider distribution on the possession of these items than there was on possession of expensive housing. Having at least a portion of housing units with a telephone available characterized all but five of the nonmetropolitan ED's, and the possession rates were higher than for any other item, falling in most cases between 50 and 90 percent. High value was 100 percent; the non-zero low was 15 percent.

Air conditioning was the next most widely distributed household equipment, with about 70 percent of the ED's having at least a part of their housing units air conditioned. Percents of units which possessed it generally ranged between 40 and 80 with very few having as few as 20 percent of units air conditioned.

The identical ED's that had none of its households with air conditioning also scored zero on central or built-in heating, possession of two or more cars, and more than one bathroom. The percents possessing these items were in general somewhat lower than for air conditioning.

Fewer areas had units with dishwashers than with the other household conveniences and the ownership rate was also generally lower than for the other household conveniences. The top possession rate found is

61 percent in Jackson County; the low non-zero rate is 4 percent, also in Jackson County. A few ED's had homes with this convenience but lacked all of the other items, a statistic which suggests some sampling bias.

### Housing Inadequacy Index

Values for six variables were averaged for this index, and the category ranges set at: Low, 0-1.99; Low-medium, 2-4.99; High-medium, 5-9.99; and High, 10 and over. The distribution of scores for the non-metropolitan ED's was skewed toward the high values with 70 percent of the cases in the top two categories and more than half of these in the top group. For the areas in the metropolitan core, the skew was toward the two lowest categories which contained roughly 70 percent of the cases. These data can be found in Figures 16, 16A to 16H, and Appendix Table 16.

The component variable contributing most heavily to the inadequacy index was the percent of housing units lacking telephone service. In the nonmetropolitan ED's this proportion reached 84 percent in one case. The low end of the scale was zero percent; however, in most areas a surprisingly high proportion lacked telephone service.

Some lack of kitchen and/or plumbing facilities was also evident in most of these ED's. Kitchen facilities are considered incomplete if they are not located in the same structure, or do not include an installed sink with piped water, a range or cookstove, and a mechanical refrigerator. Complete plumbing facilities include hot and cold water, flush toilet, and shower or bath. Although percents exceeding 25 are relatively rare on these variables, one ED in George County reported 73 of its housing units lacking one or more plumbing facilities and 35 percent lacking one or more kitchen facilities. Virtually all of the housing units in the area had direct access, either from the outside or through a hall or lobby.

Very crowded housing conditions were evident to a minor degree in most of the nonmetropolitan ED's. While in most cases this value tends to hover in the neighborhood of 5 percent, a few exceed 10 percent, and one reaches 19 percent.

The percent of renters moving into their homes before 1960 contribute to this housing index in somewhat less than one-third of the ED's. The inclusion of this variable is based on the assumption that most renter families residing permanently in an area, would have moved to improve their housing situation within a period of ten years, and that those who did not were economically trapped in an unsatisfactory housing situation. This, of course, may be an incorrect assumption. Some undoubtedly stay in the same rented house because of its desirable factors. However, the assumption as made is substantiated by the fact that ED's scoring relatively high on this variable also score relatively high on the other inadequacy variables.

Two other characteristics are included in this index. These are the proportion of owner occupied housing having a very low valuation and the proportion of renter occupied housing with very low rents. Low owner

contributes to the score in about three-fourths of the cases. However, three-fourths of these are less than 20 percent. The high score on this variable is 70 percent for ED 10 in George County.

The low rent variable contributes to the score in less than one-third of the ED's. Forty percent of these exceed 20 percent and the highest value is found in Pearl River County, with 75 percent of its renter units costing less than \$40 a month.

### Index of Incipient Housing Demand

This index, for which data will be found in Appendix Tables 17 and 17A and Figures 17, and 17A through 17H, attempts to assess the extent to which the value of occupied housing is lower than the maximum recommended by home economists on the basis of size of family income. In general, it is recommended that the housing costs should not exceed twice the yearly income in terms of house value or 20 percent of yearly income in terms of monthly payments.\*

The index displayed on the maps is the actual percent of all families, both renters and owners, who spend less than this maximum for housing and who also have more than \$3,000 in annual income. The tables give not only the summary index but also (1) the same percents for owner and renters and (2) the percent of families at each income level with sub-maximum expenditures for housing. Because many of the cells in the component categories gave zero percents, Table 17A was added to allow the user to assess if the zero percents resulted from zero family populations or from a situation where all families spend more than the recommended maximum.

Categories selected for displaying the distribution on this index were: Low, 0-24.99; Low-medium, 25-39.99; High-medium, 40-54.99; and High, 55 and over. As Table 3 indicates, nonmetropolitan areas tend to have greater incipient housing demands than the areas in the metropolitan core. Nearly 60 percent of nonmetropolitan ED's are in the top two categories. Over 64 percent of metropolitan areas are in the two bottom categories.

The indication is that families in the peripheral rural areas tend more towards conservative housing budgets than do their urban core counterparts. Should these families become more urban oriented, it is possible that the existing high level of incipient demand might manifest itself in an actual demand for new or improved housing.

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\*Personal interview with Dr. Phoebe Harris, Department of Home Economics, Mississippi State University.

## Summary and Conclusion

This report contains compilations and indexes of Census data that are intended to provide basic data for planning in the Coastal region of Mississippi. This area, which has had an outstanding growth of both its population and economy in recent years, is one of the most dynamic in the state. However, while this growth has created progress, it has also generated pressures and changes which have affected the social and economic structures and created problems in providing basic community needs. Since it is anticipated that in the future the growth trends of the past few years will continue, many are raising the question of balanced growth. Until recently, the virtues of continued economic growth, per se, have been taken more or less for granted, apparently based on the assumption that progress can be measured entirely in quantitative terms. Concern about what is now called "quality of life" is growing, however, with more people becoming more interested in achieving a balance between quality and quantity in economic and population growth. Such considerations have both conceptual and methodological dimensions -- that is, ideal goals must be defined and the means of achieving them implemented. Planning to achieve projected goals of balanced growth must be based on knowledge of population and housing resources and needs.

An extensive data base has been provided in this report. Five tables give chiefly raw Enumeration District data on population and housing numbers and densities, and on population distributions by age, sex, occupation, industry, and income. Mapped indexes depict the ranks of Enumeration Districts on a series of twelve indexes -- Stability, Heterogeneity, Quality Potential, Dependency, Familism, Social Disorganization, Labor Force, Industrial Lag, Poverty, Housing Affluence, Housing Inadequacy, and Housing Demand. Each of these indexes is supported by a table cataloging the measurement inputs which in themselves may be extremely useful to area planners. In addition, maps and tables comparing commuting patterns in 1960 and 1970 for the six counties are included.

Worker commuting patterns and their relationship to population characteristics and distributions provide one good example of the kinds of things leaders should consider as they engage in planning for balanced development. As pointed out earlier in this report, the three counties bordering the Gulf of Mexico can expect to draw more workers from their surrounding areas if economic activities continue the trend of the 1960's. As the number of persons entering the area for work increases, so does the prosperity of peripheral areas, but so also do traffic and water problems, educational needs, and consumer demands for housing, recreation, and professional and health services.

It is hoped that this report will provide the basic peripheral area population and housing data needed for planning balanced area development of the Mississippi Gulf Coast region.

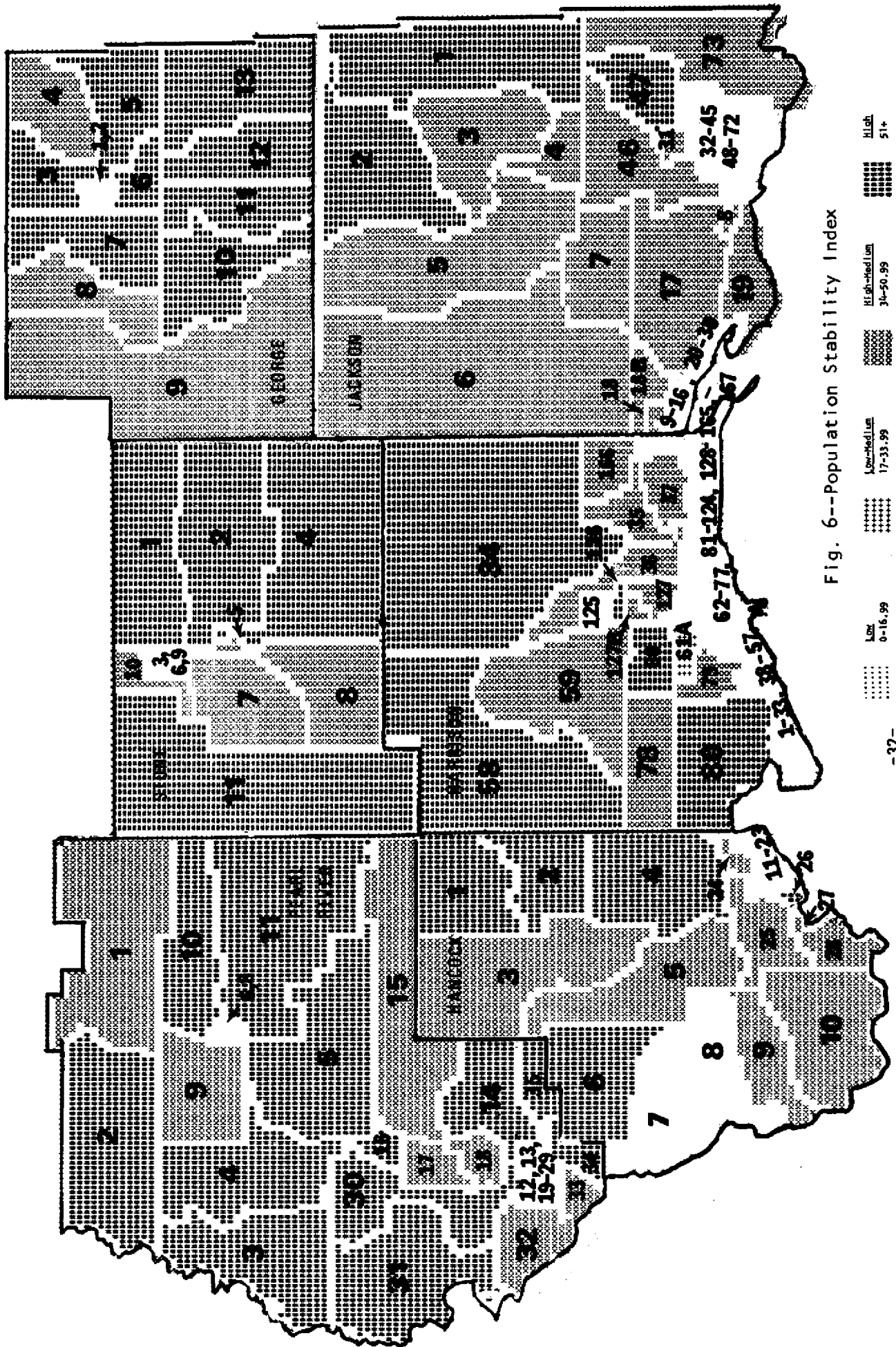


Fig. 6--Population Stability Index



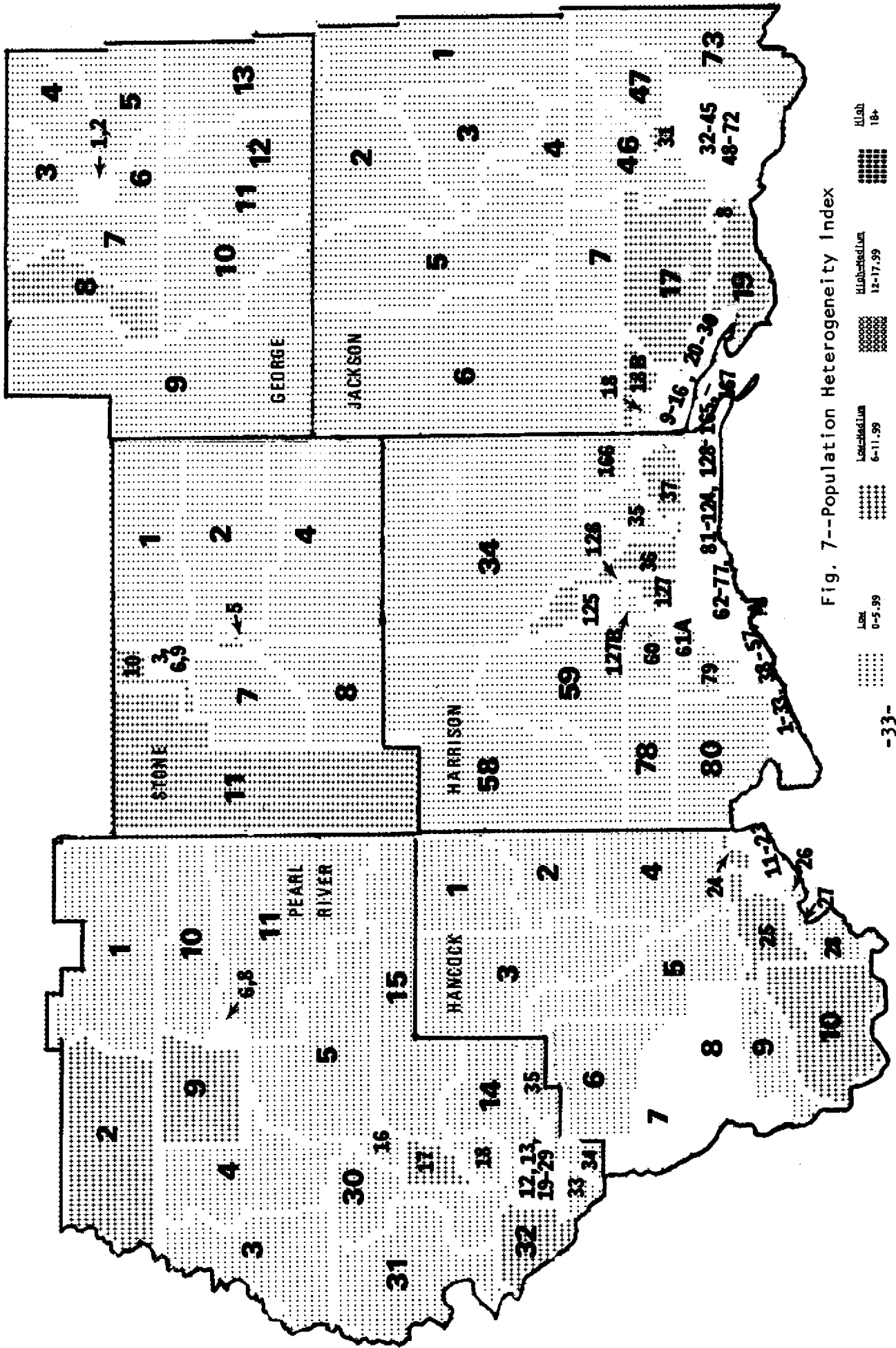


Fig. 7--Population Heterogeneity Index

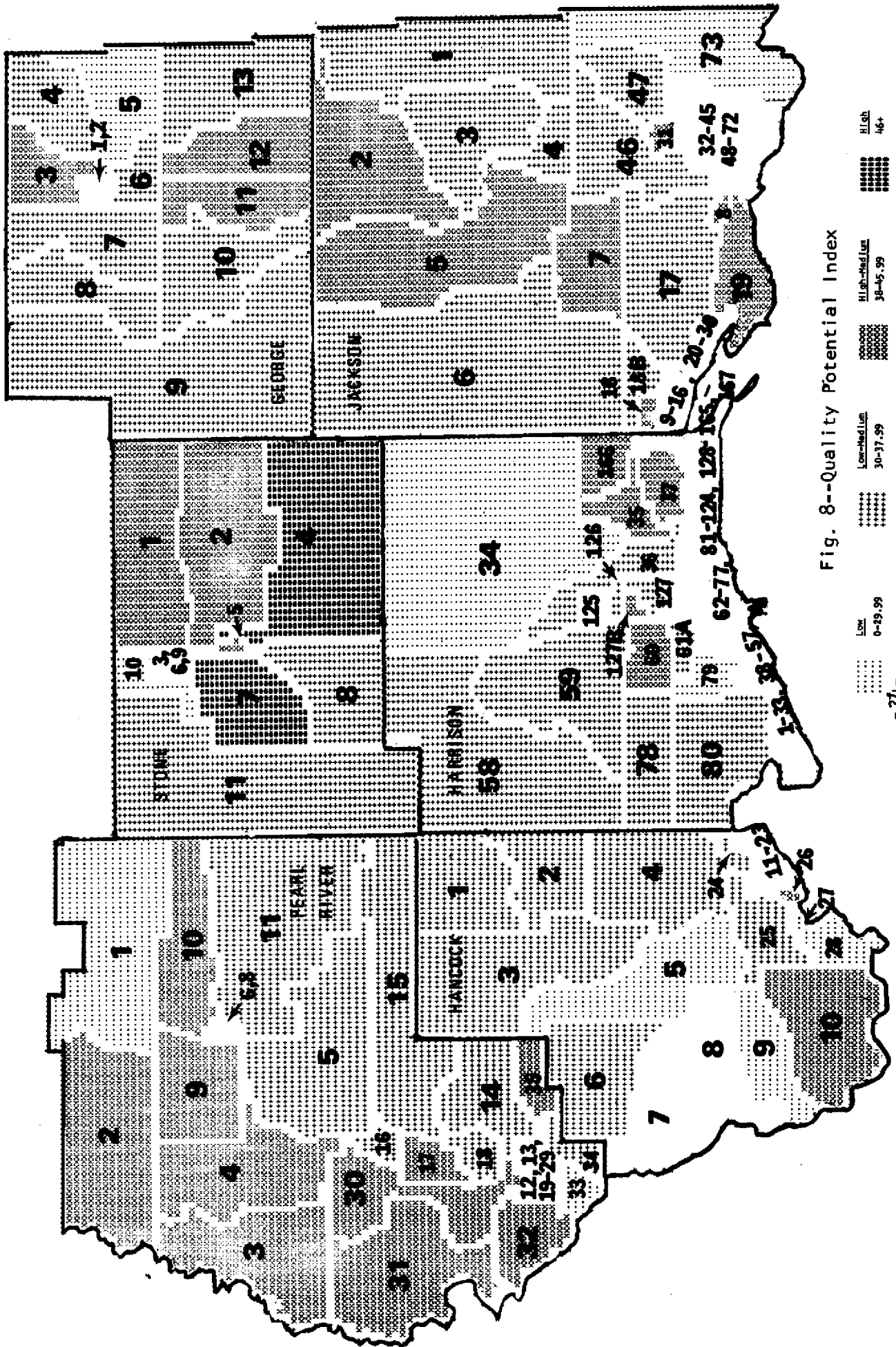


Fig. 8--Quality Potential Index

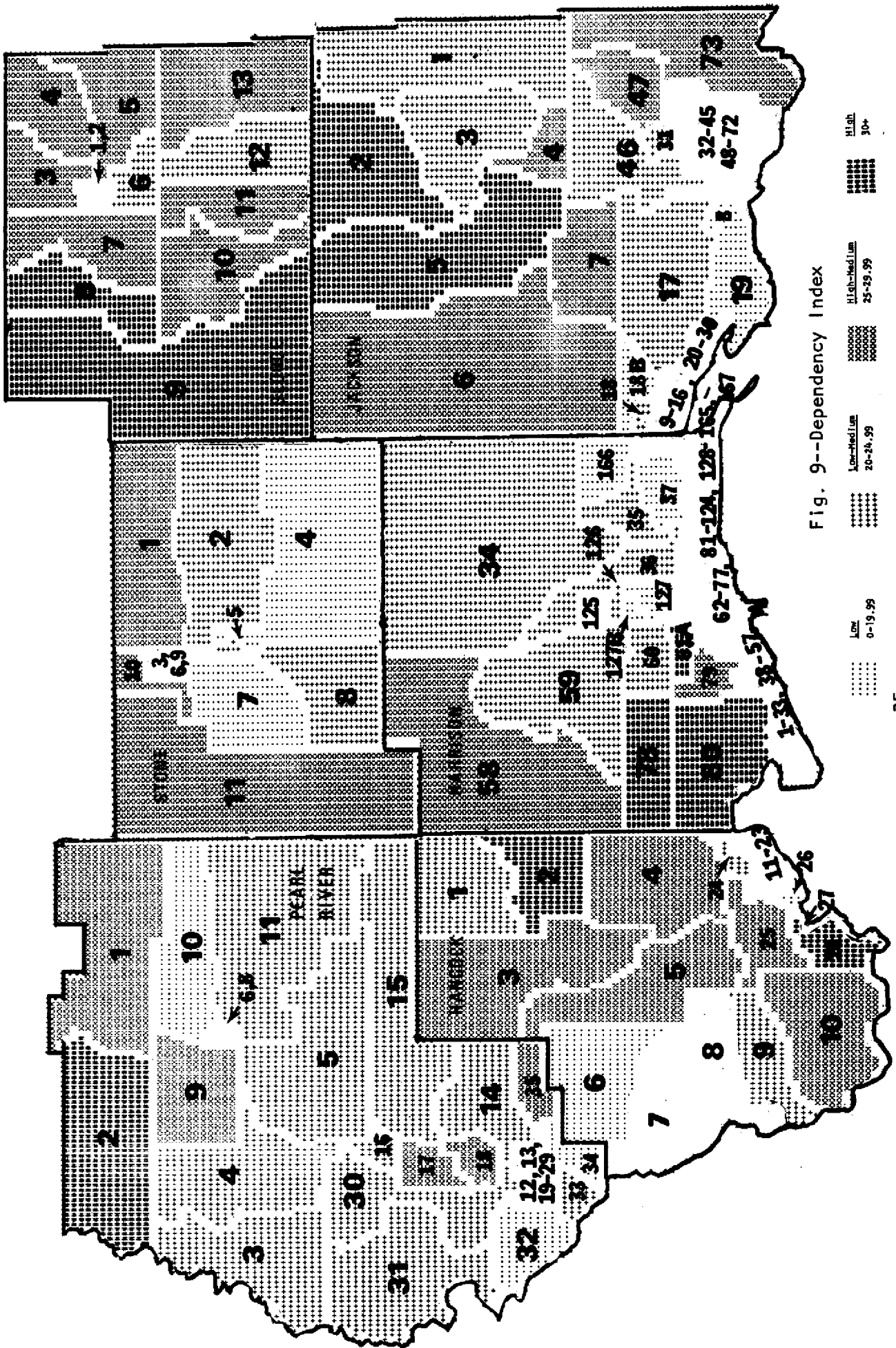


Fig. 9--Dependency Index



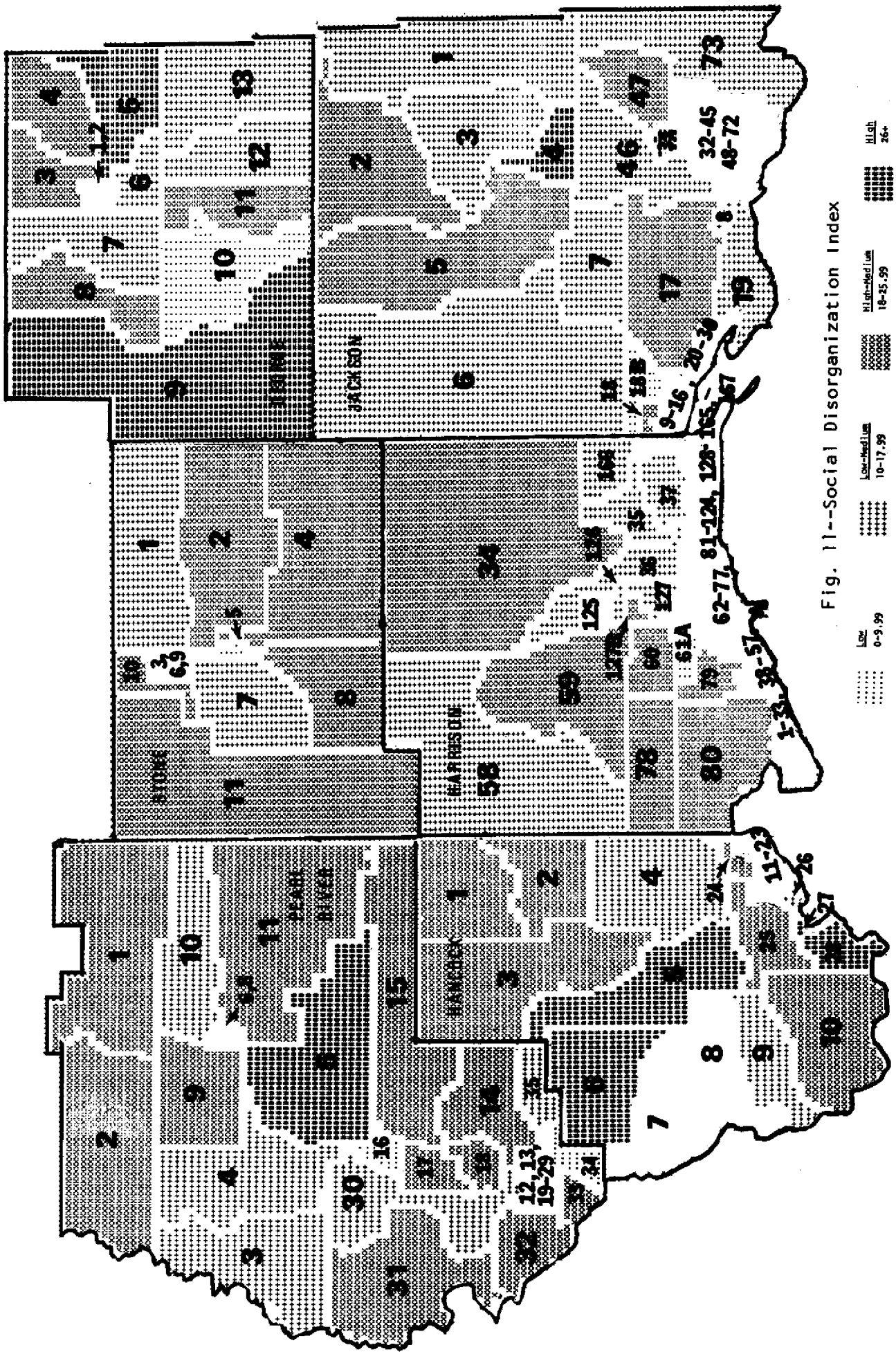


Fig. 11--Social Disorganization Index





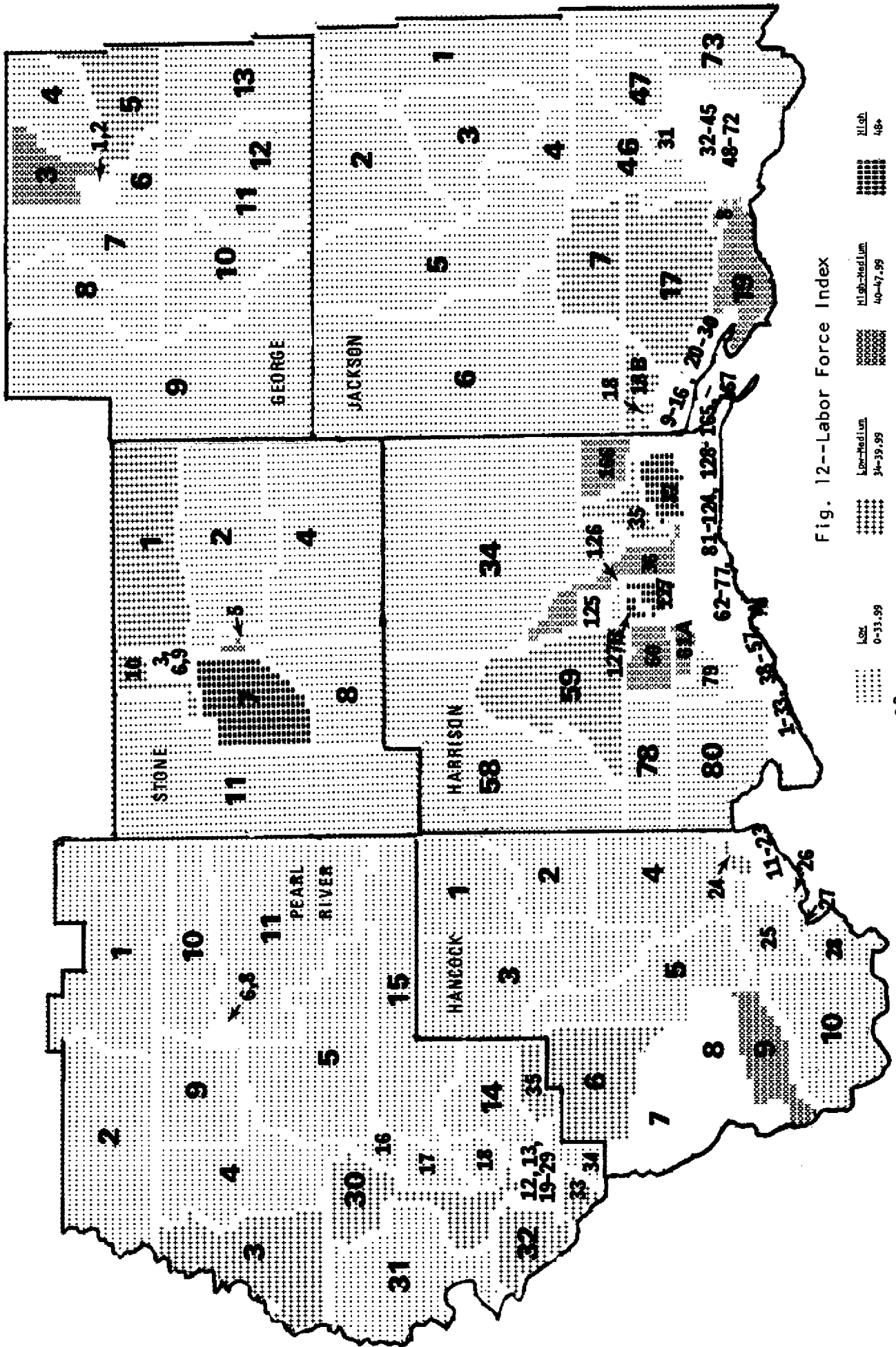


Fig. 12--Labor Force Index

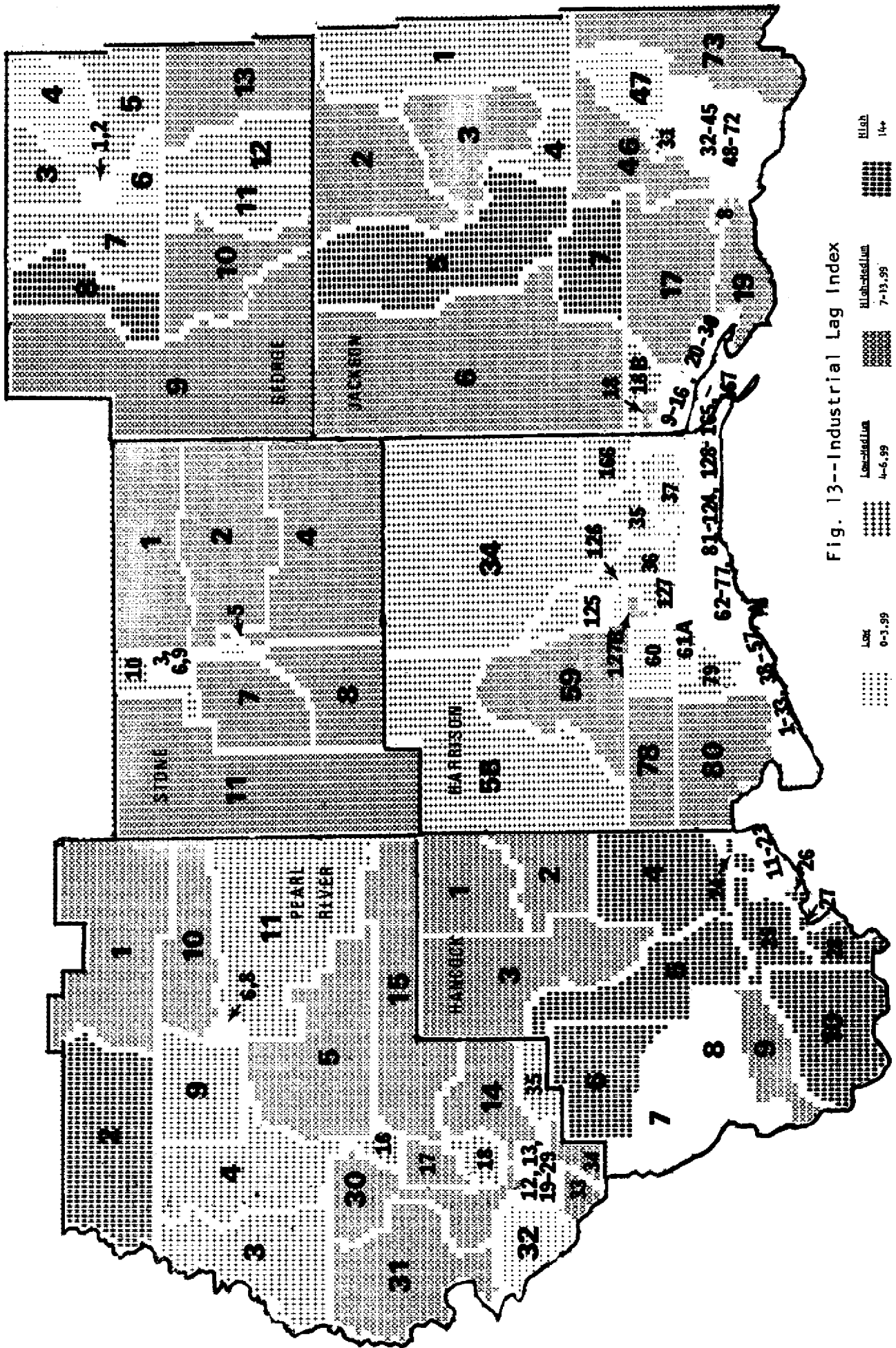


Fig. 13--Industrial Lag Index



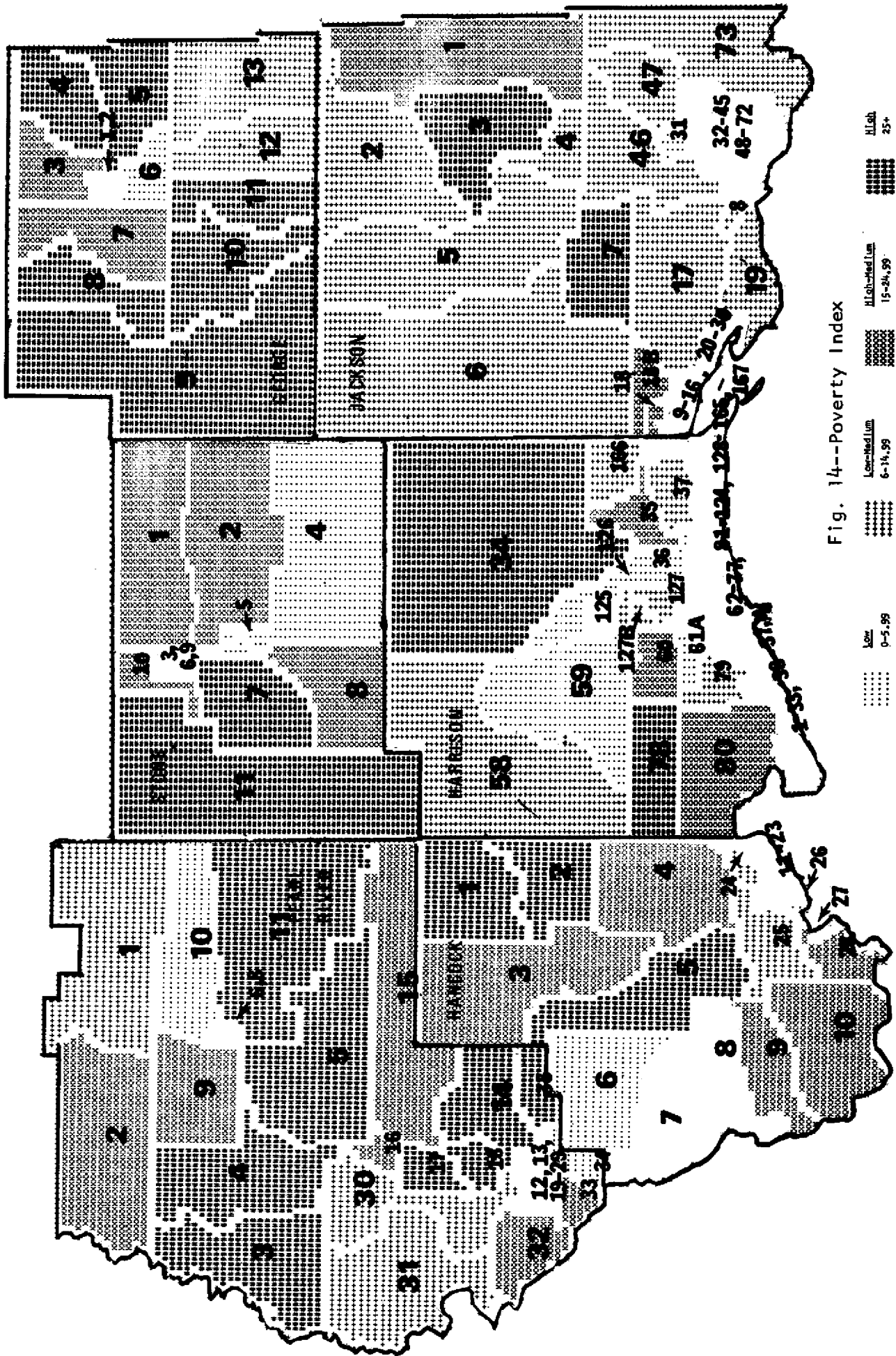


Fig. 14--Poverty Index









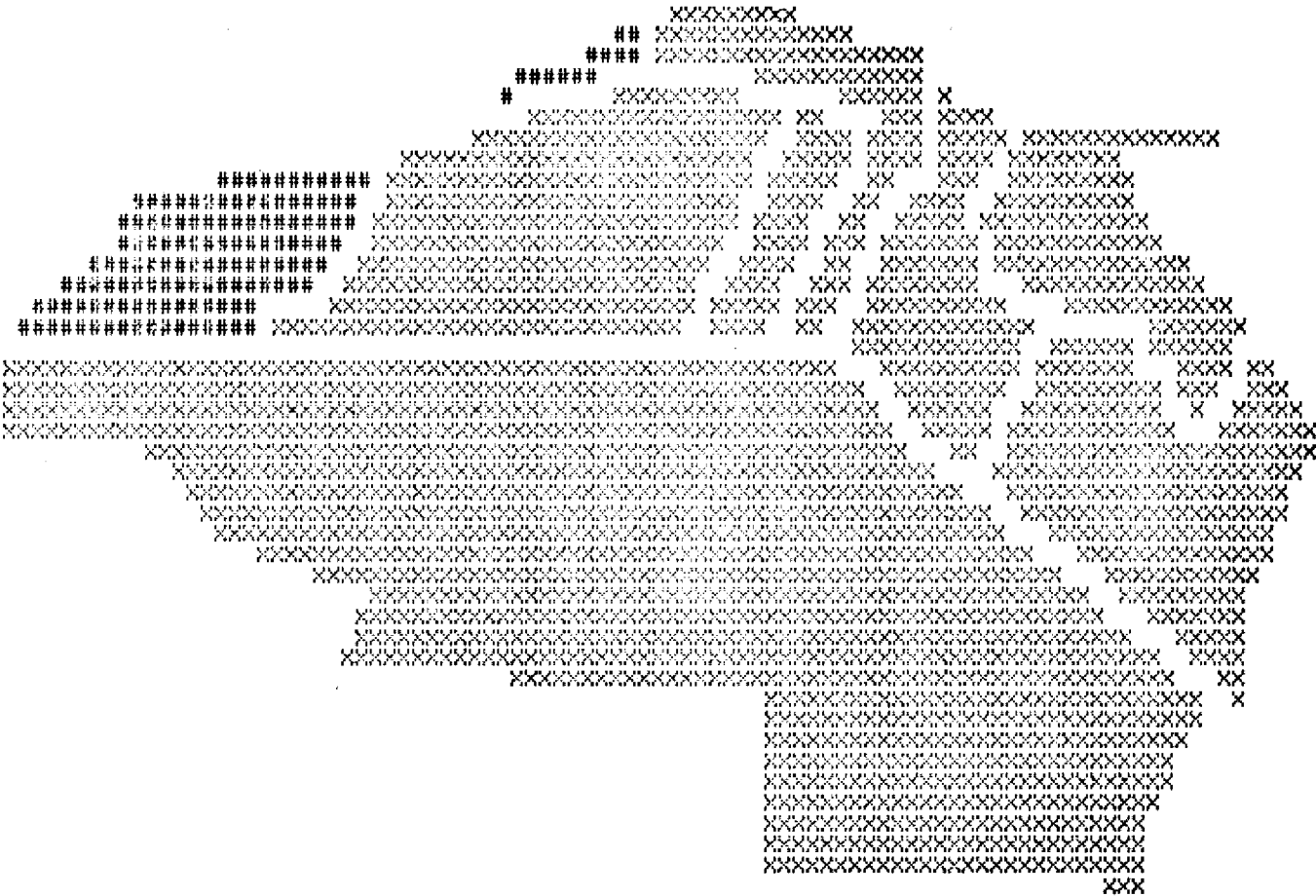


Fig. 6A--Population Stability Index

Bay St. Louis

.....  
 .....  
 .....  
Low  
 0-16.99

+++++++  
 +++++++  
 +++++++  
Low-Medium  
 17-33.99

XXXXXXX  
 XXXXXXX  
 XXXXXXX  
High-Medium  
 34-50.99

#####  
 #####  
 #####  
High  
 51+

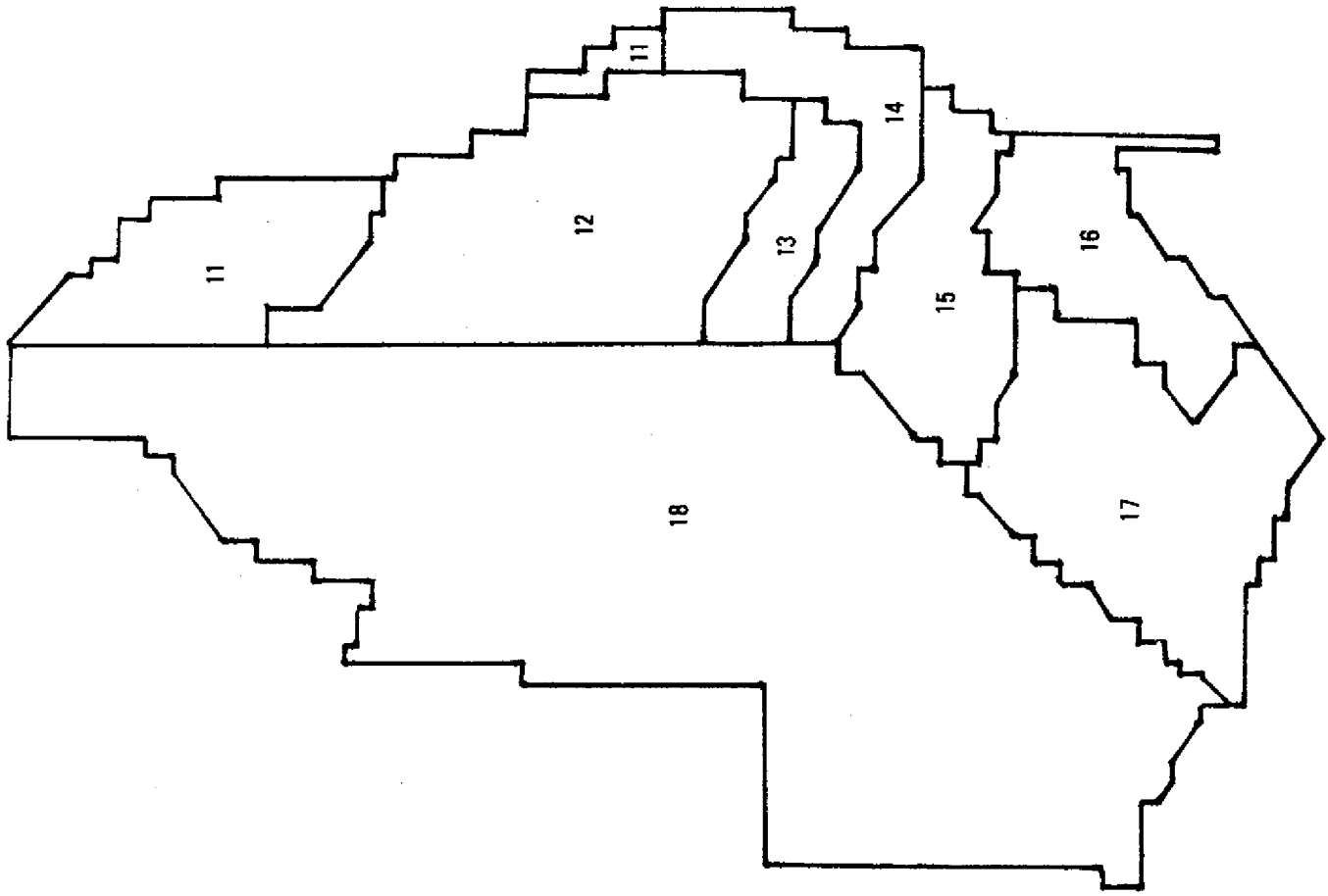


Fig. 5A--Enumeration District Outline

Bay St. Louis

Fig. 7A--Population Heterogeneity Index

Bay St. Louis

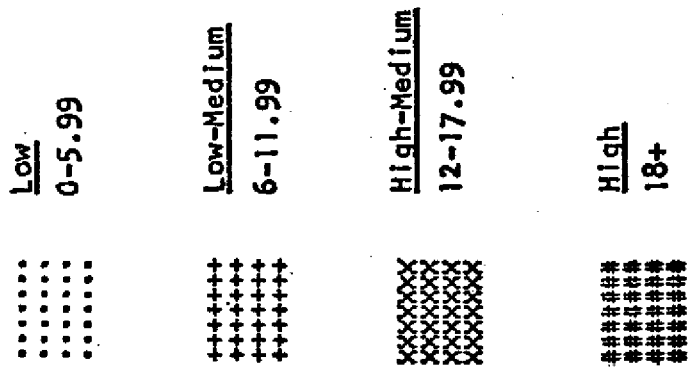


Fig. 8A--Quality Potential Index

Bay St. Louls

.....  
 .....  
 .....  
 .....  
 .....  
LOW  
 0-29.99

++++++  
 +++++++  
 +++++++  
 +++++++  
Low-Medium  
 30-37.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX  
High-Medium  
 38-45.99

#####  
 #####  
 #####  
 #####  
 #####  
High  
 46+



Fig. 9A--Dependency Index

Bay St. Louis

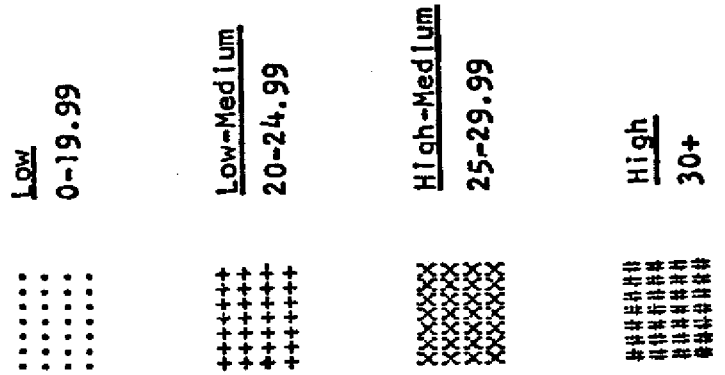


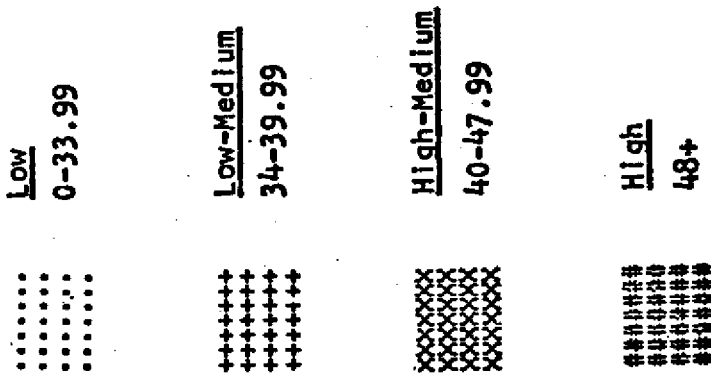






Fig. 12A--Labor Force Index

Bay St. Louis



13A--Industrial Lag Index  
 Bay St. Louls

Low  
 0-3.99

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

Low-Medium  
 4-6.99

++++++  
 +++  
 +++  
 +++

High-Medium  
 7-13.99

XXXXXX  
 XXXXX  
 XXXXX  
 XXXXX

High  
 14+

#####  
 #####  
 #####  
 #####

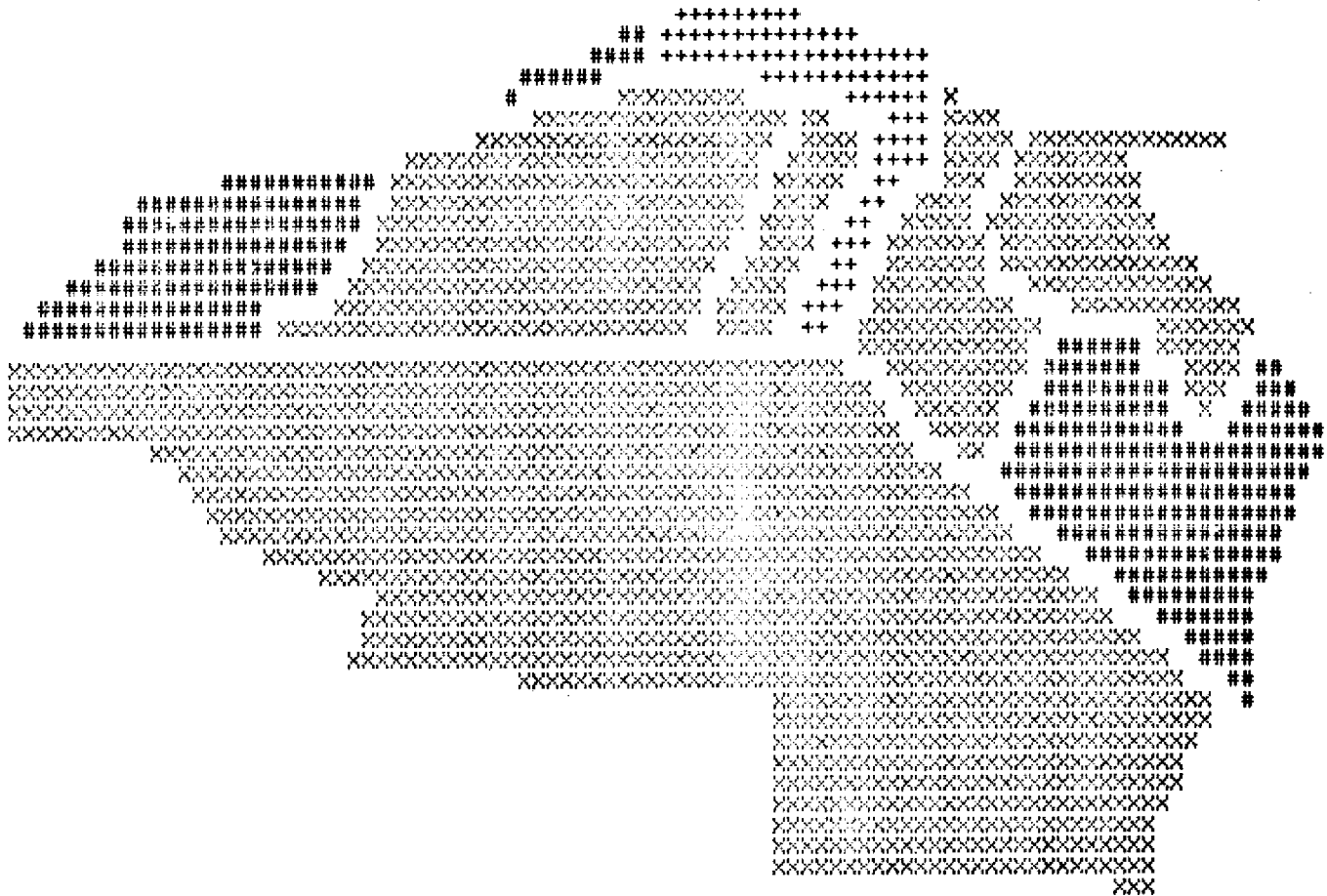


Fig. 14A--Poverty Index

Bay St. Louis

Low  
0-5.99

Low-Medium  
6-14.99

High-Medium  
15-24.99

High  
25+

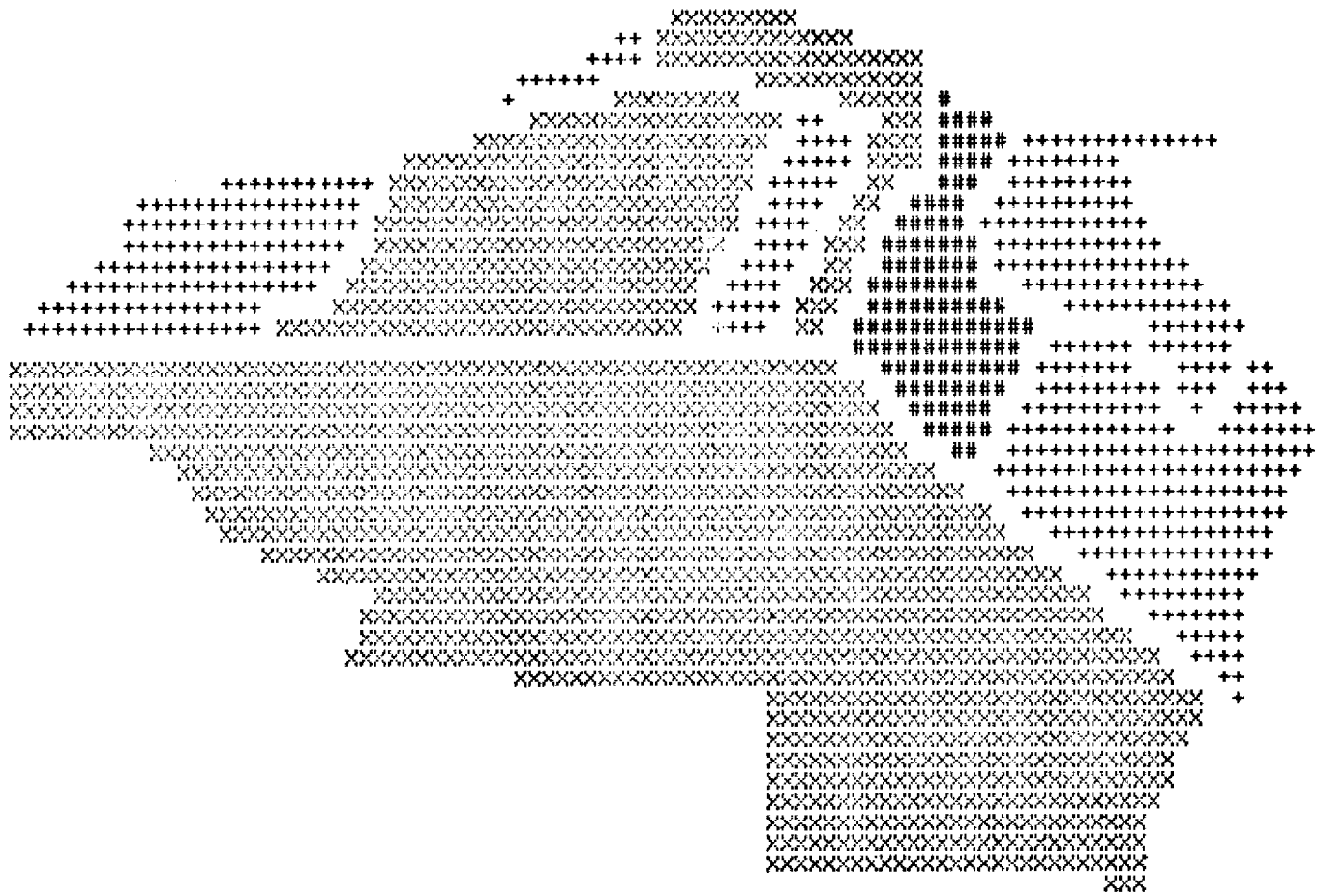


Fig. 15A--Housing Affluence Index

Bay St. Louls

Low  
 0-14.99

Low-Medium  
 15-29.99

High-Medium  
 30-39.99

High  
 40+



Fig. 16A--Housing Inadequacy Index

Bay St. Louis

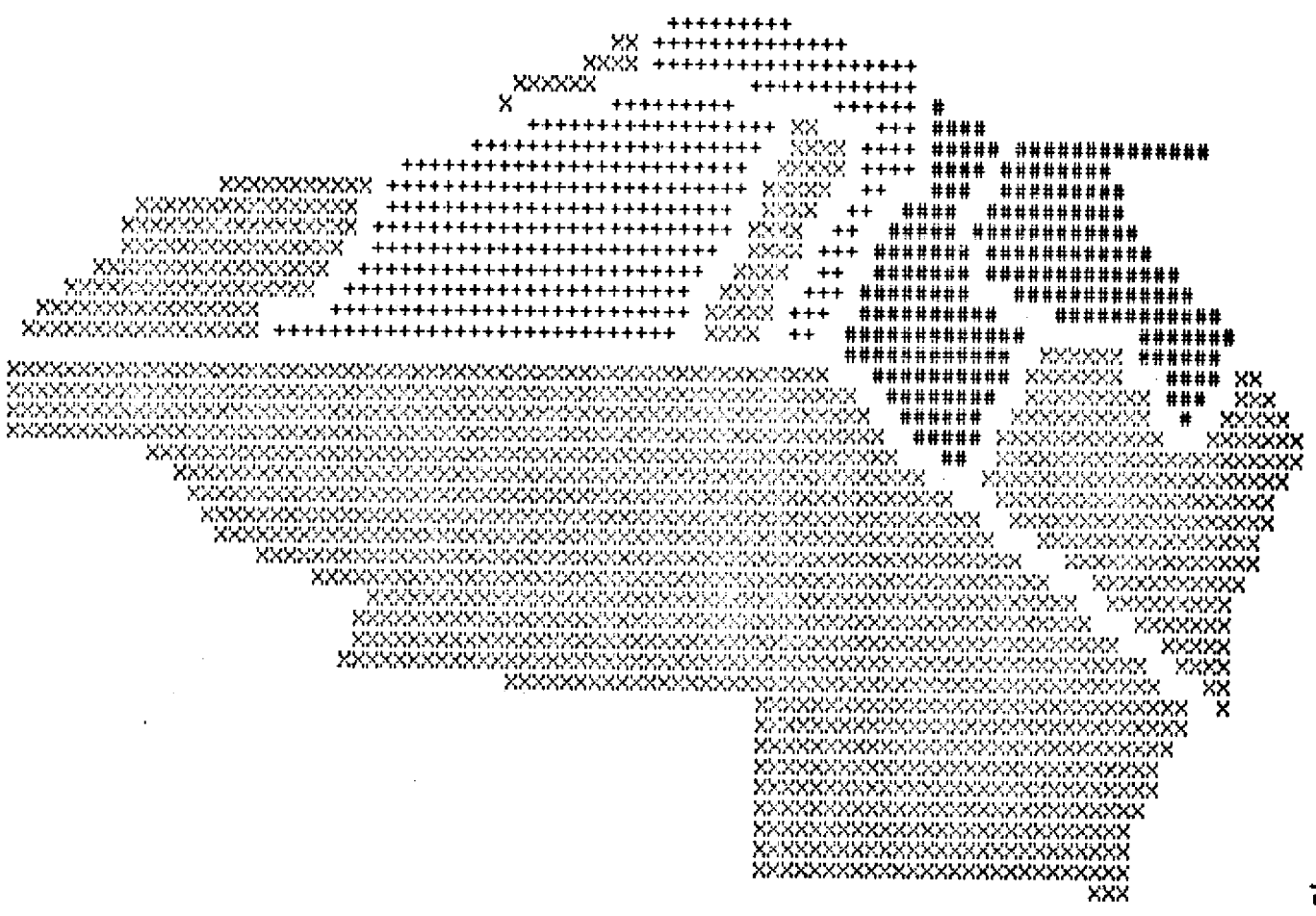
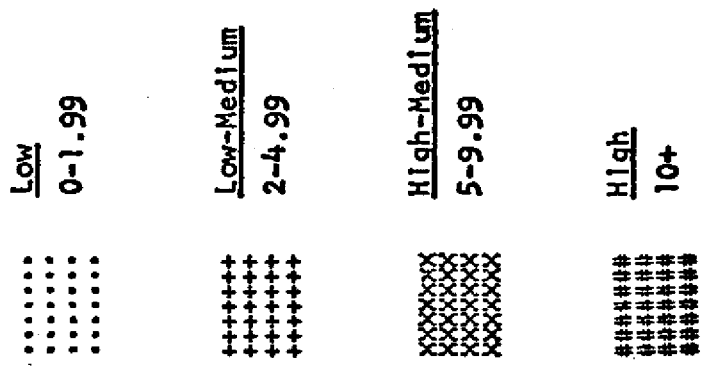


Fig. 17A--Incipient Housing Demand Index

Bay St. Louis

Low  
0-24.99

Low-Medium  
25-39.99

High-Medium  
40-54.99

High  
55+





Fig. 6B--Population Stability Index

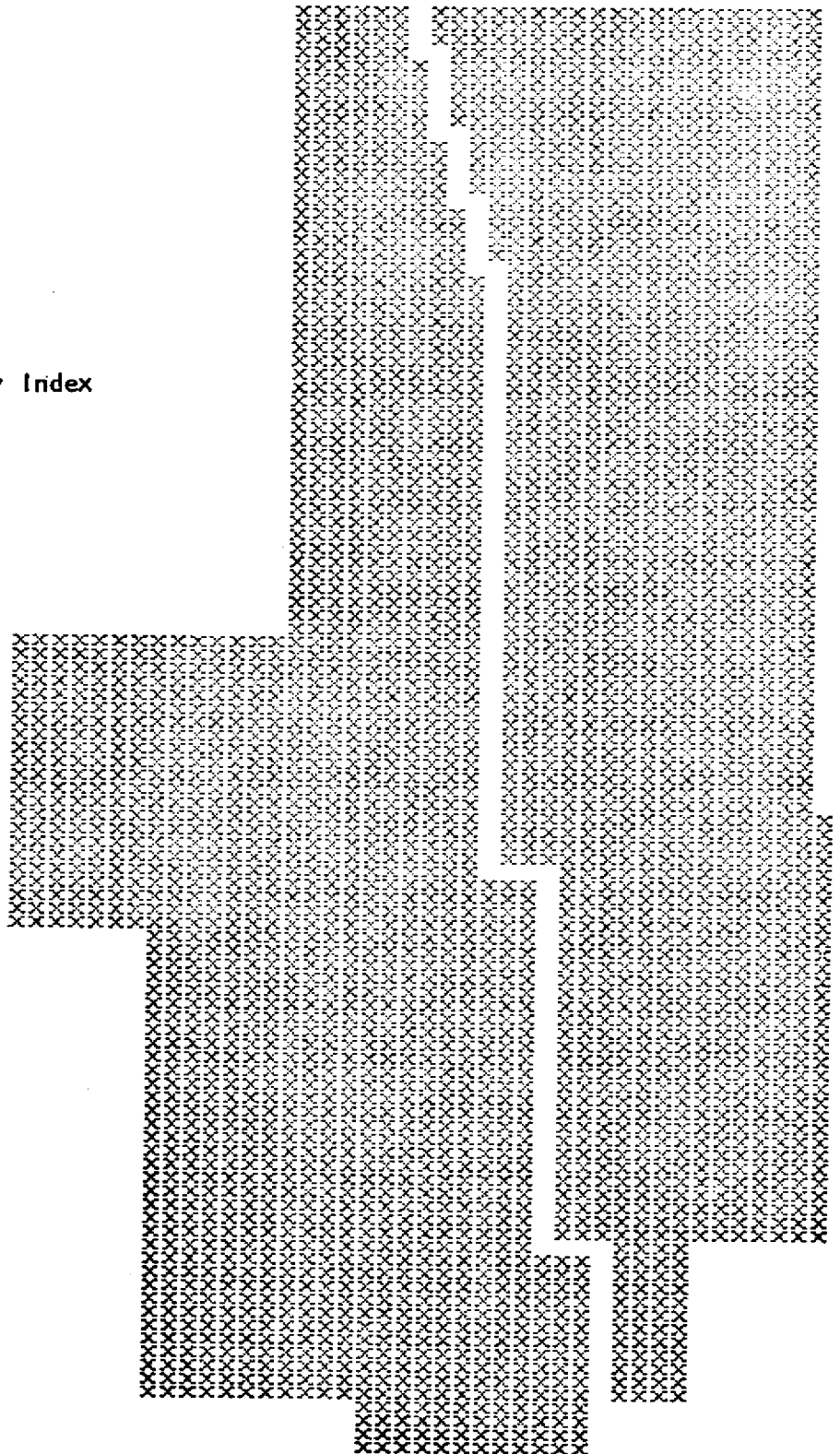
Lucedale

..... Low  
.....  
.....  
.....  
.....  
..... 0-16.99

+++++++ Low-Medium  
+++++++  
+++++++  
+++++++ 17-33.99

xxxxxxxx High-Medium  
xxxxxxxx  
xxxxxxxx  
xxxxxxxx 34-50.99

##### High  
#####  
#####  
##### 51+



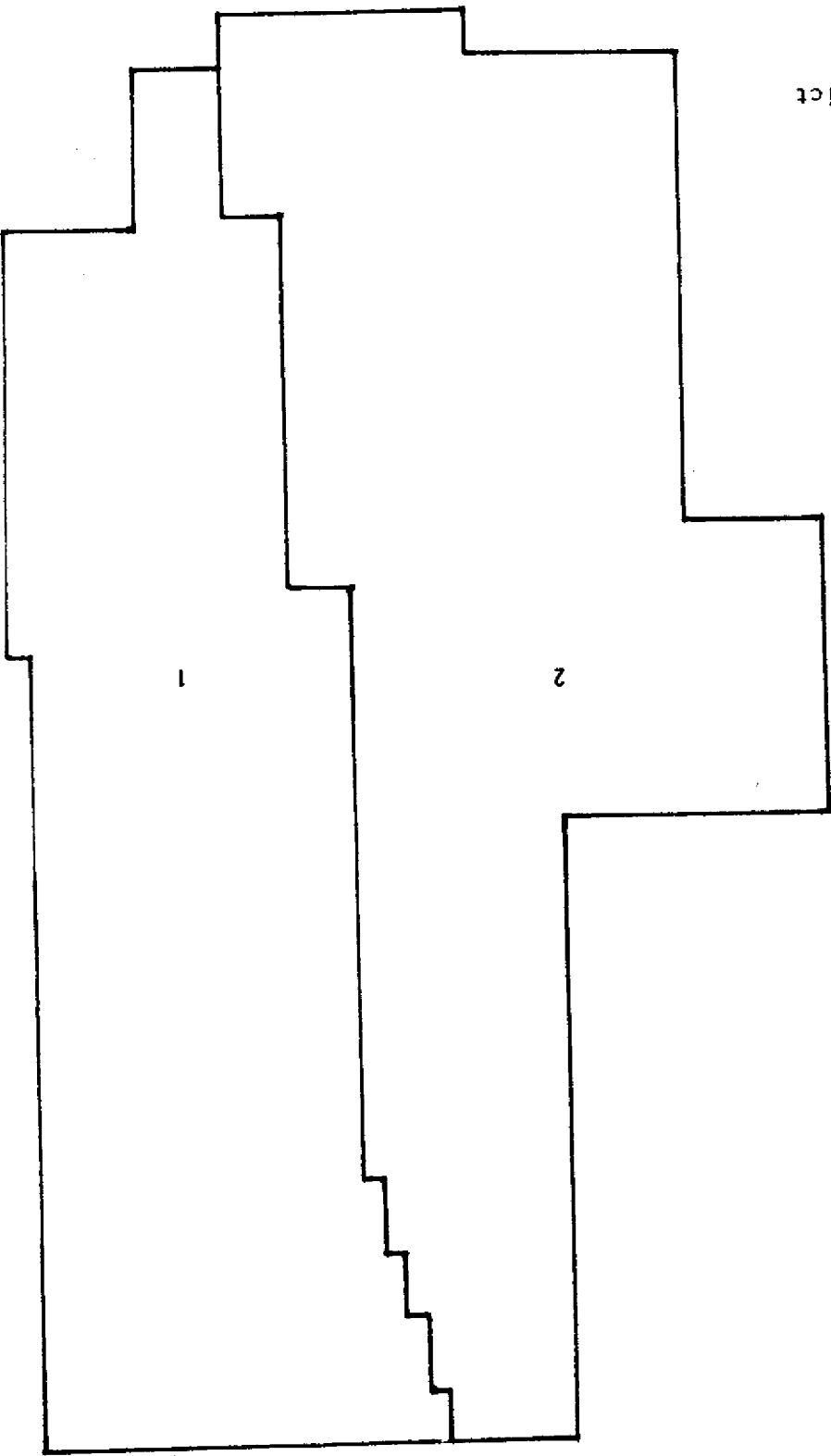


Fig. 58--Enumeration District  
Outline  
Lucedale



Fig. 8B--Quality Potential Index

Lucedale

.....

Low  
0-29.99

++++++  
++++++  
++++++  
++++++

Low-Medium  
30-37.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High-Medium  
38-45.99

#####  
#####  
#####  
#####

High  
46+

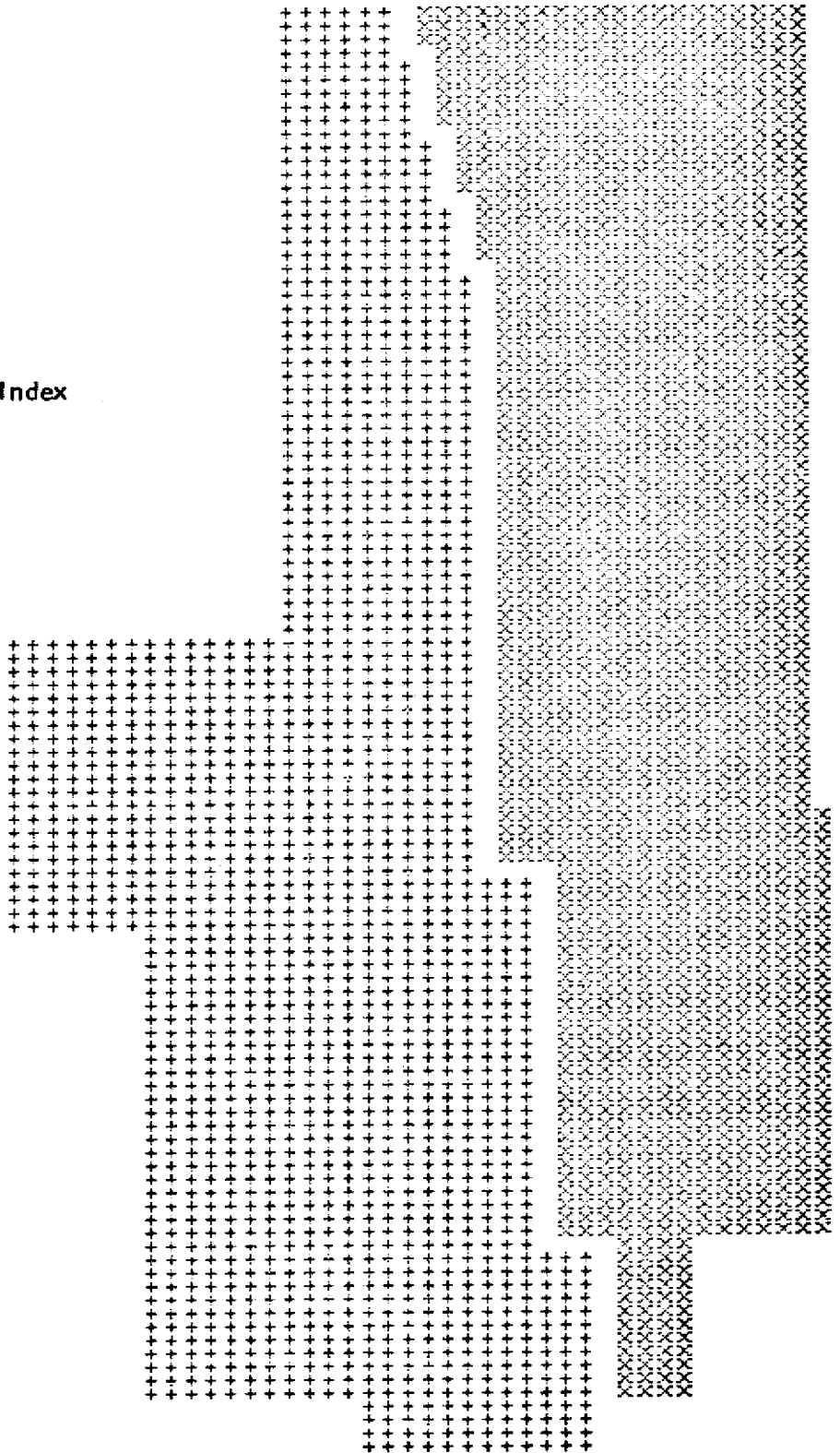


Fig. 9B--Dependency Index

Lucedale

..... Low  
0-19.99

+++++++ Low-Medium  
20-24.99

XXXXXXXX High-Medium  
25-29.99

##### High  
30+

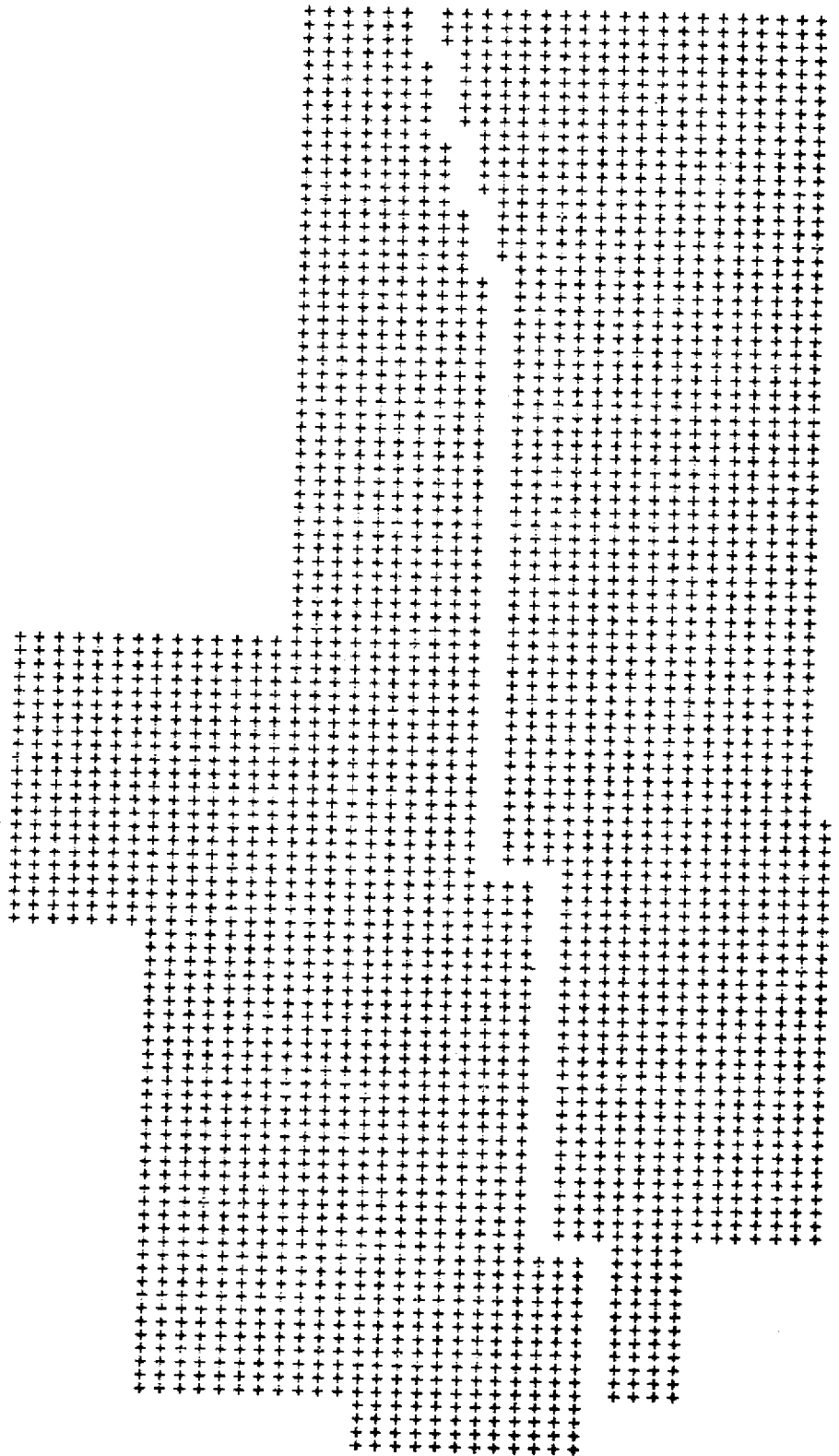


Fig 10B--Familism Index

Lucedale

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

Low  
0-39.99

++++++  
++++++  
++++++  
++++++

Low-Medium  
40-47.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High-Medium  
48-54.99

#####  
#####  
#####  
#####

High  
55+

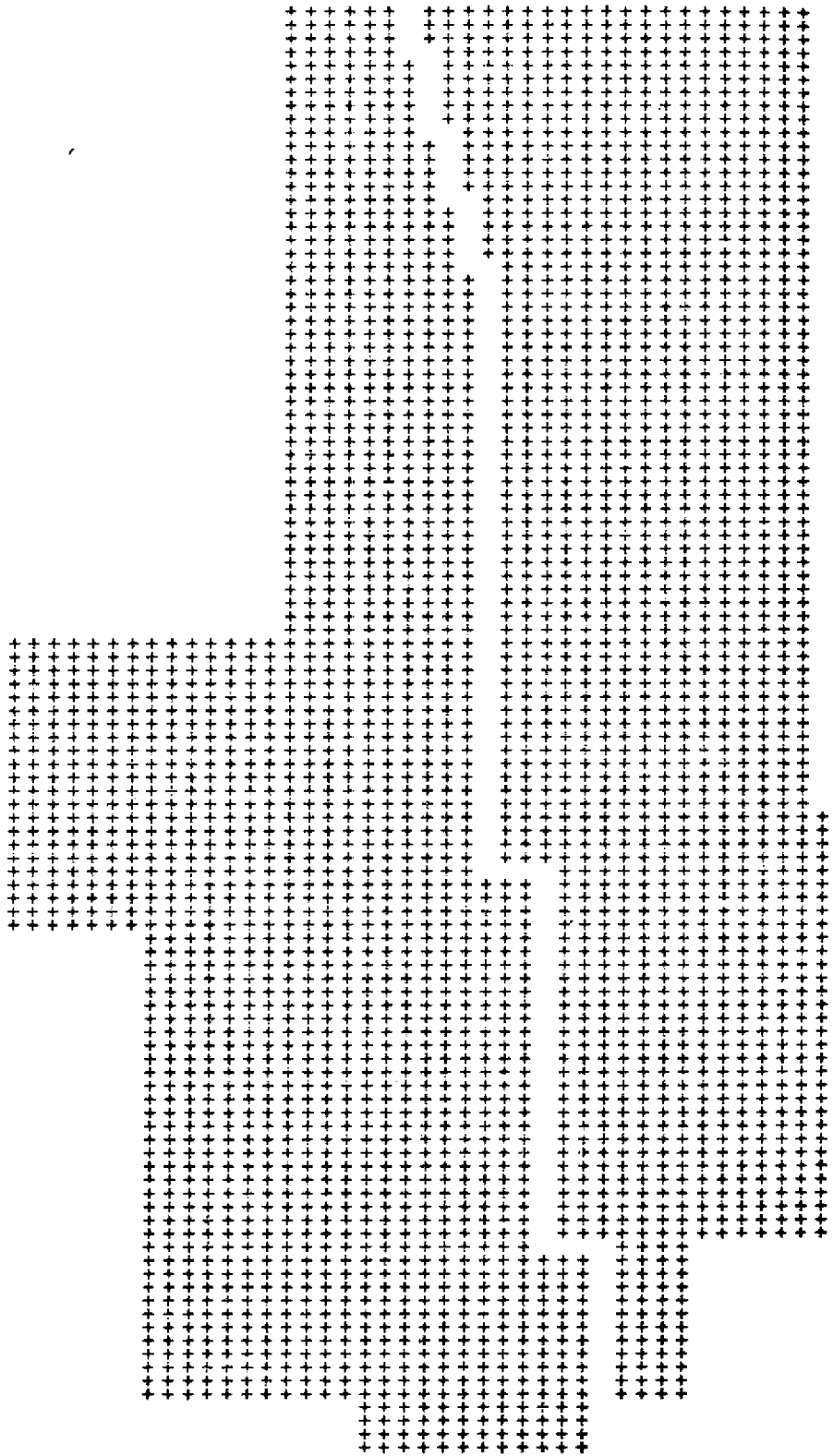


Fig. 11B--Social Disorganization Index

Lucedale

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

Low  
0-9.99

++++++  
++++++  
++++++  
++++++

Low-Medium  
10-17.99

xxxxxxxx  
xxxxxxxx  
xxxxxxxx  
xxxxxxxx

High-Medium  
18-25.99

#####  
#####  
#####  
#####

High  
26+

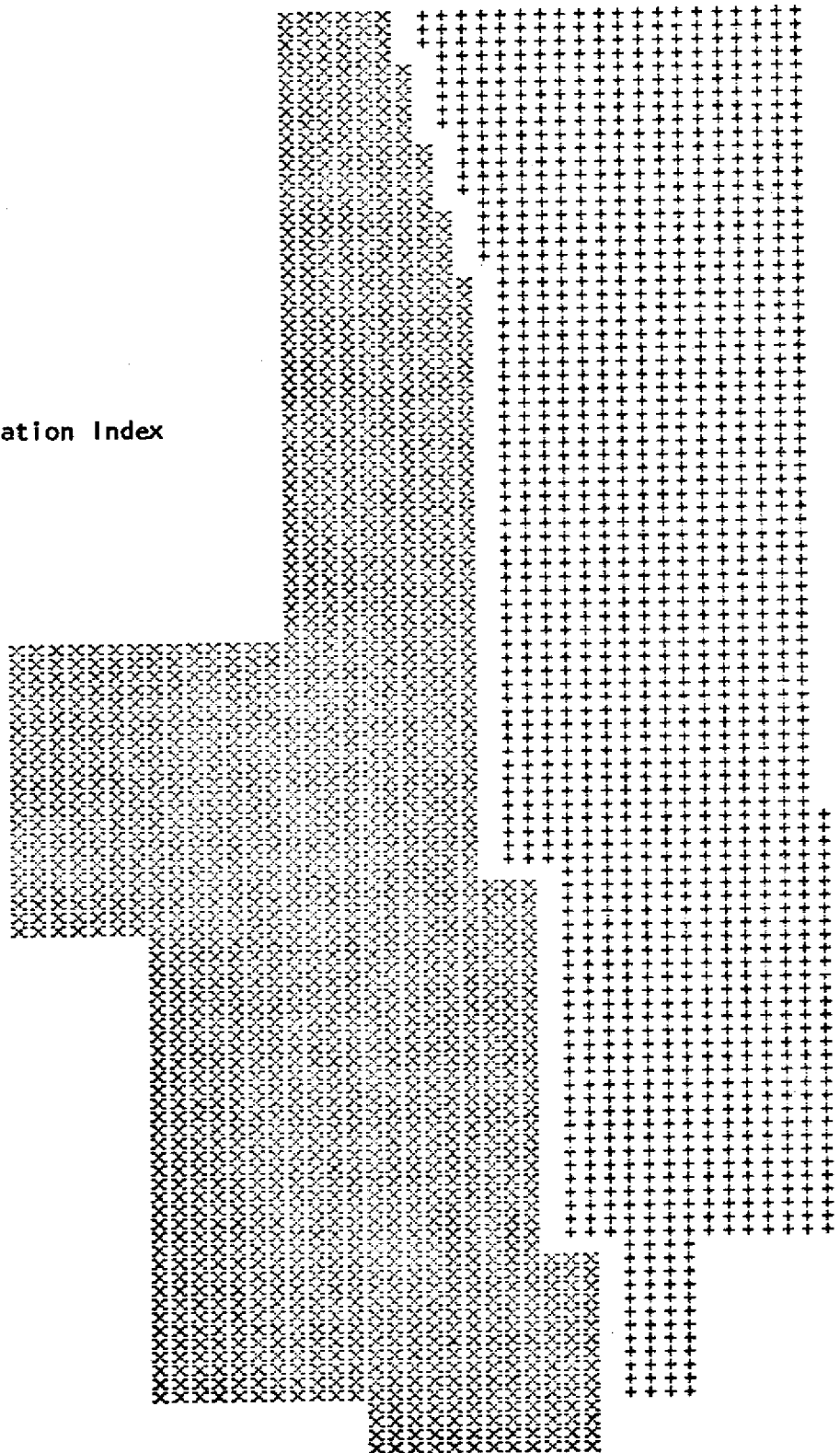


Fig. 12B--Labor Force Index

Lucedale

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

Low  
0-33.99

++++++  
++++++  
++++++  
++++++

Low-Medium  
34-39.99

xxxxxx  
xxxxxx  
xxxxxx  
xxxxxx

High-Medium  
40-47.99

#####  
#####  
#####  
#####

High  
48+

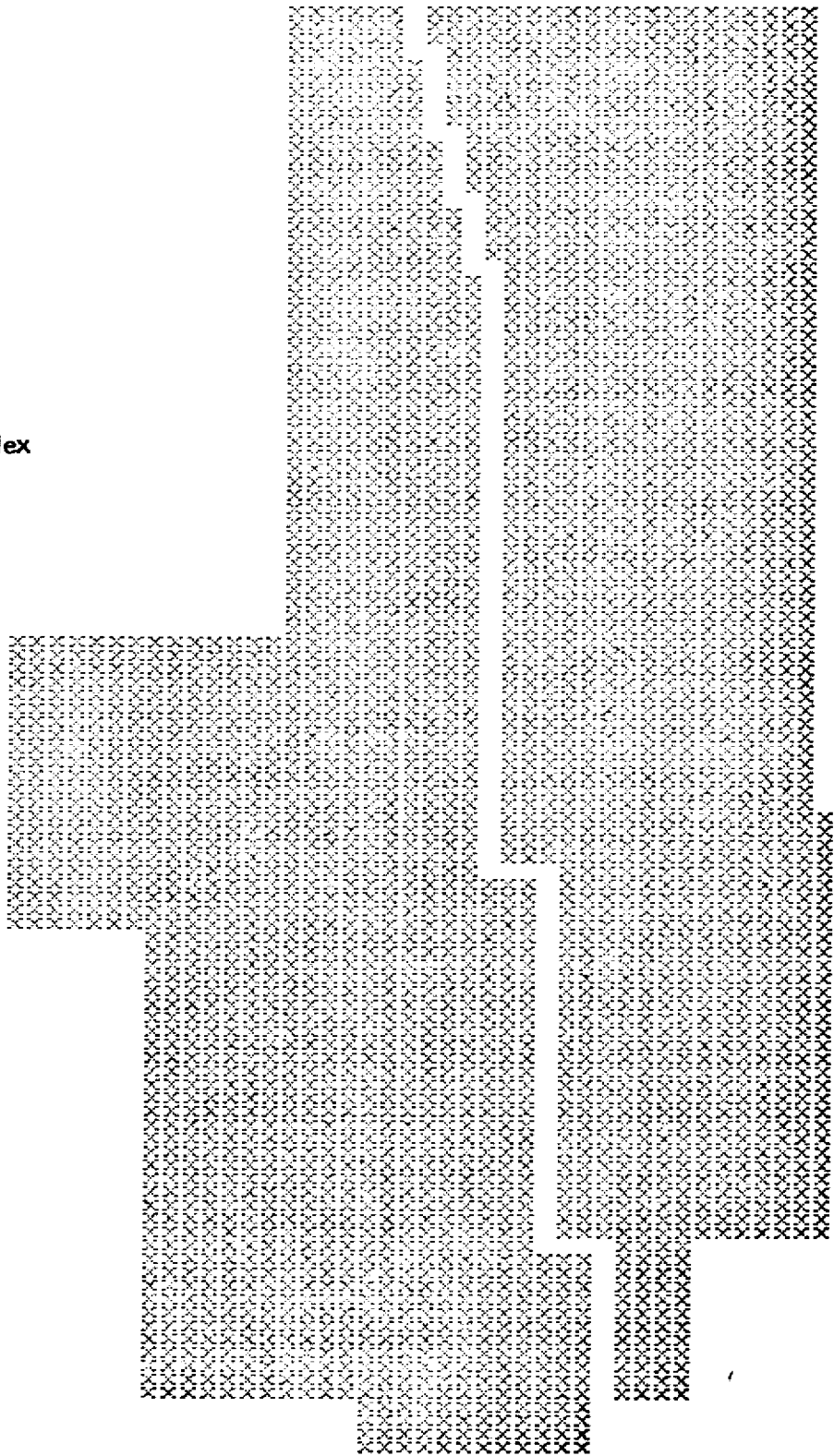




Fig. 13B--Industrial Lag Index

Lucedale

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

Low  
0-3.99

++++++  
++++++  
++++++  
++++++

Low-Medium  
4-6.99

XXXXXXXX  
XXXXXXXX  
XXXXXXXX  
XXXXXXXX

High-Medium  
7-13.99

#####  
#####  
#####  
#####

High  
14+

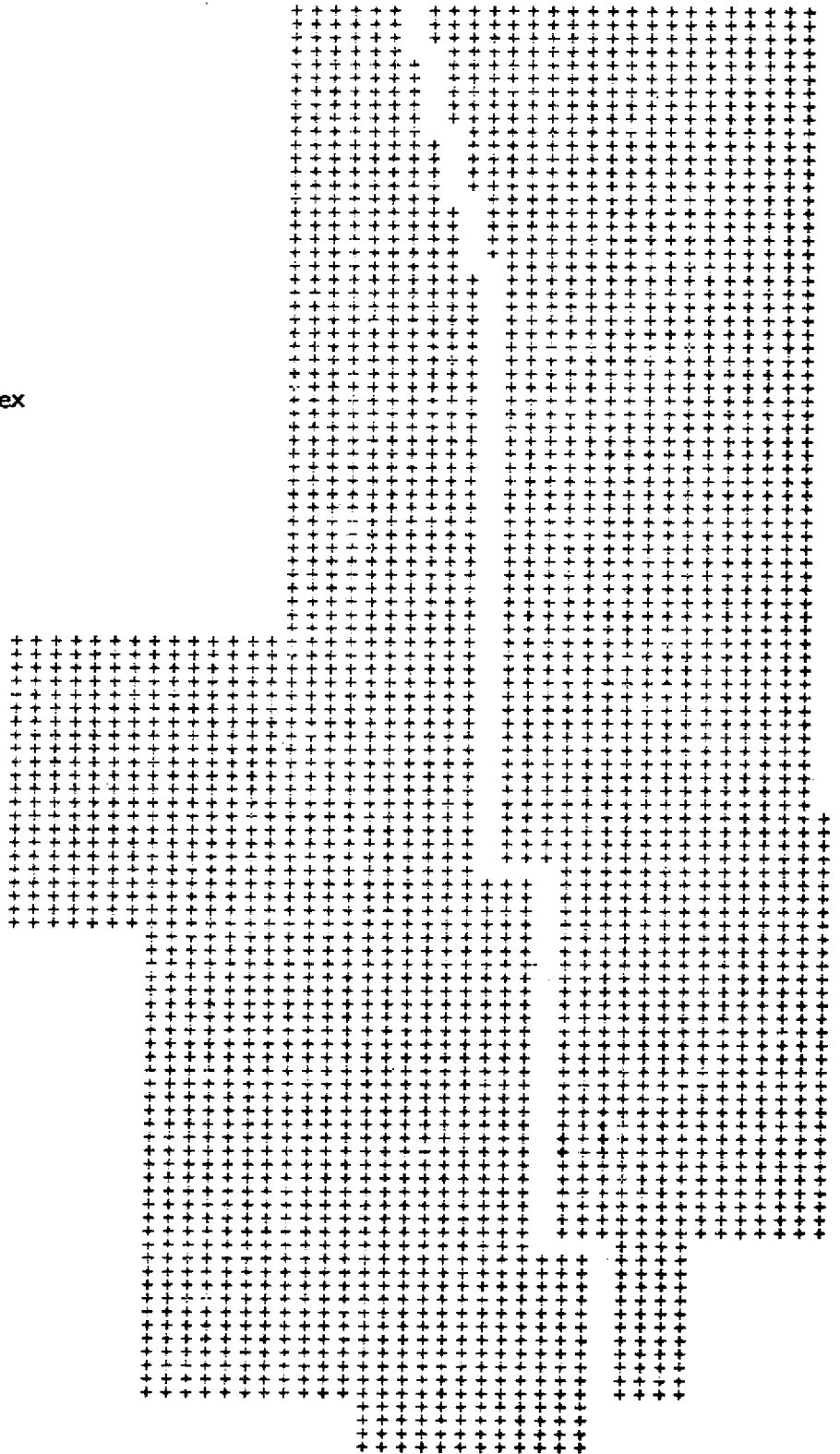


Fig. 14B--Poverty Index

Lucedale

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

Low  
0-5.99

++++++  
++++++  
++++++  
++++++

Low-Medium  
6-14.99

XXXXXX  
XXXXXX  
XXXXXX

High-Medium  
15-24.99

#####  
#####  
#####  
#####

High  
25+

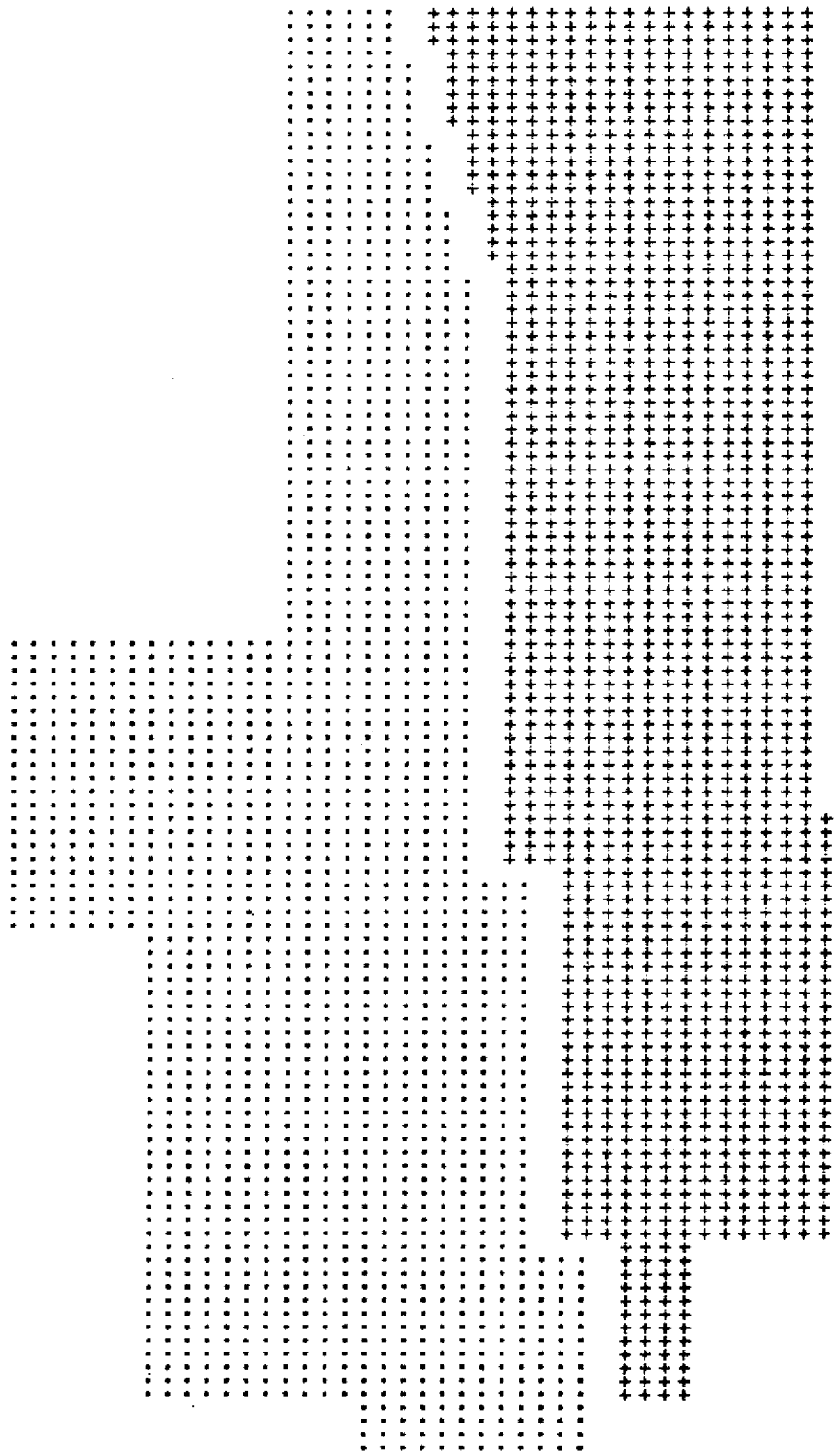


Fig. 15B--Housing Affluence Index

Lucedale

..... Low  
0-14.99

+++++++ Low-Medium  
15-29.99

XXXXXXXX High-Medium  
30-39.99

##### High  
40+

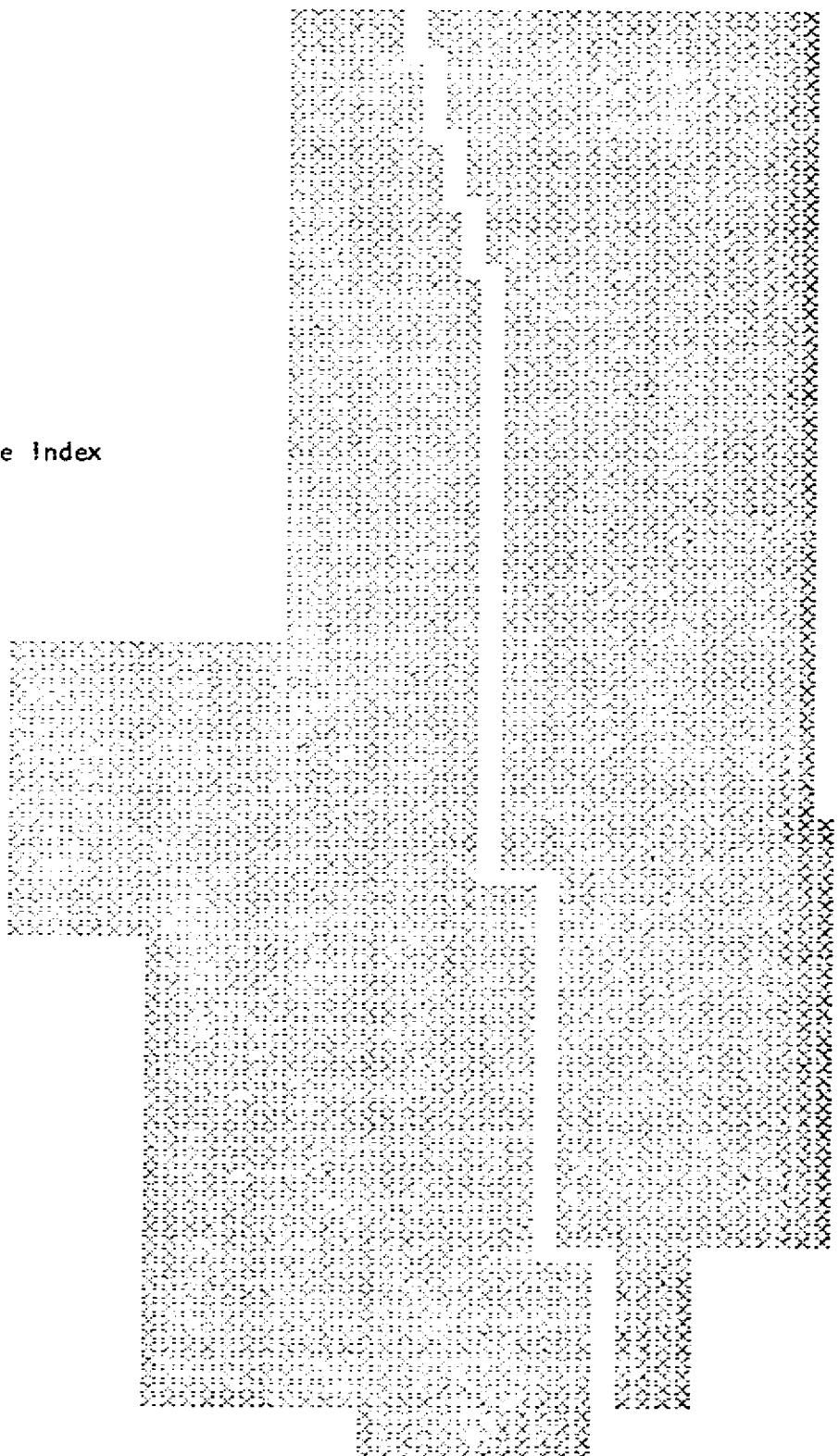


Fig. 16B--Housing Inadequacy Index

Lucedale

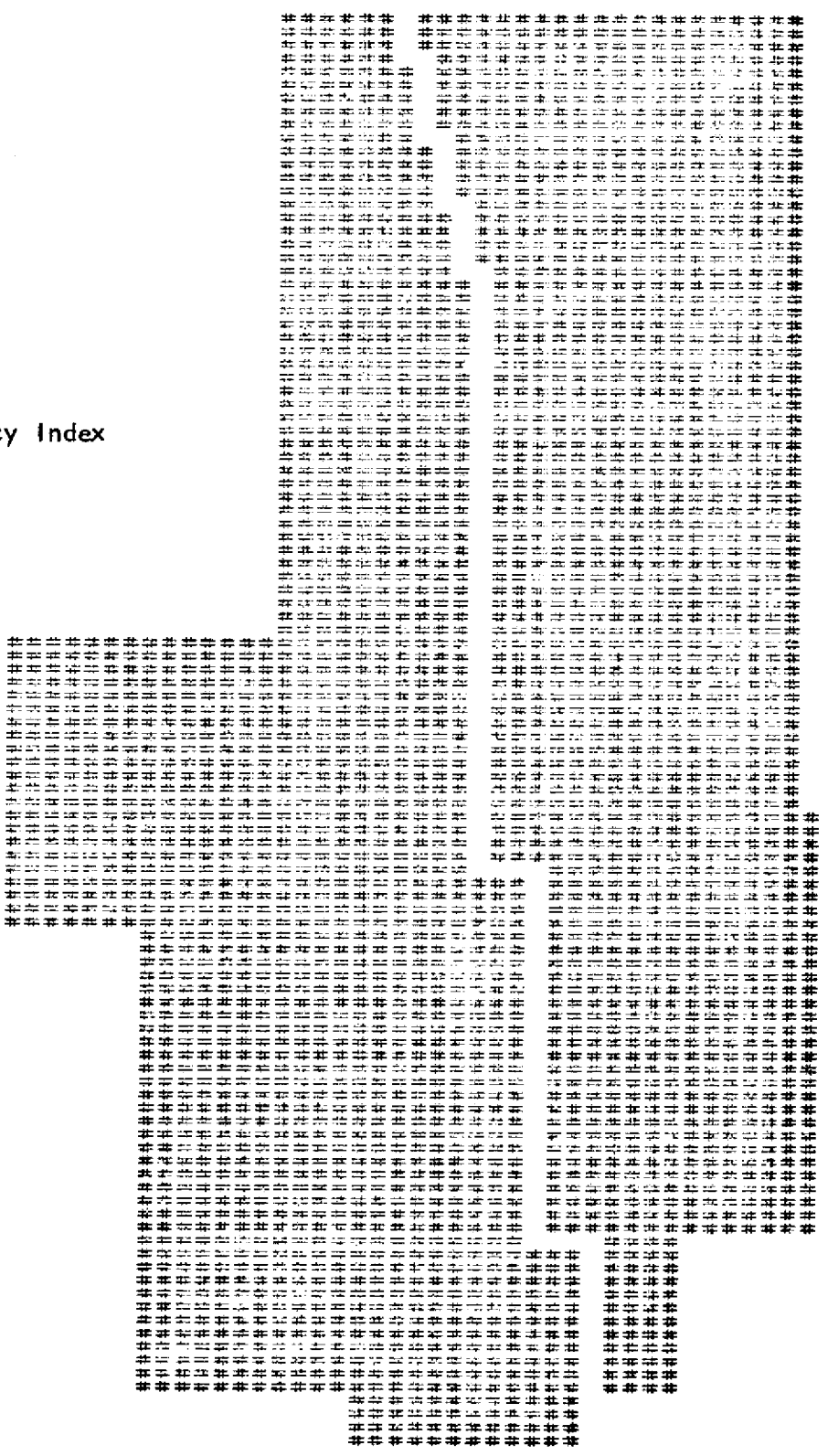


Fig. 17B--Incipient Housing Demand Index

Lucedale

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

Low  
0-24.99

+++++++  
+++++++  
+++++++  
+++++++

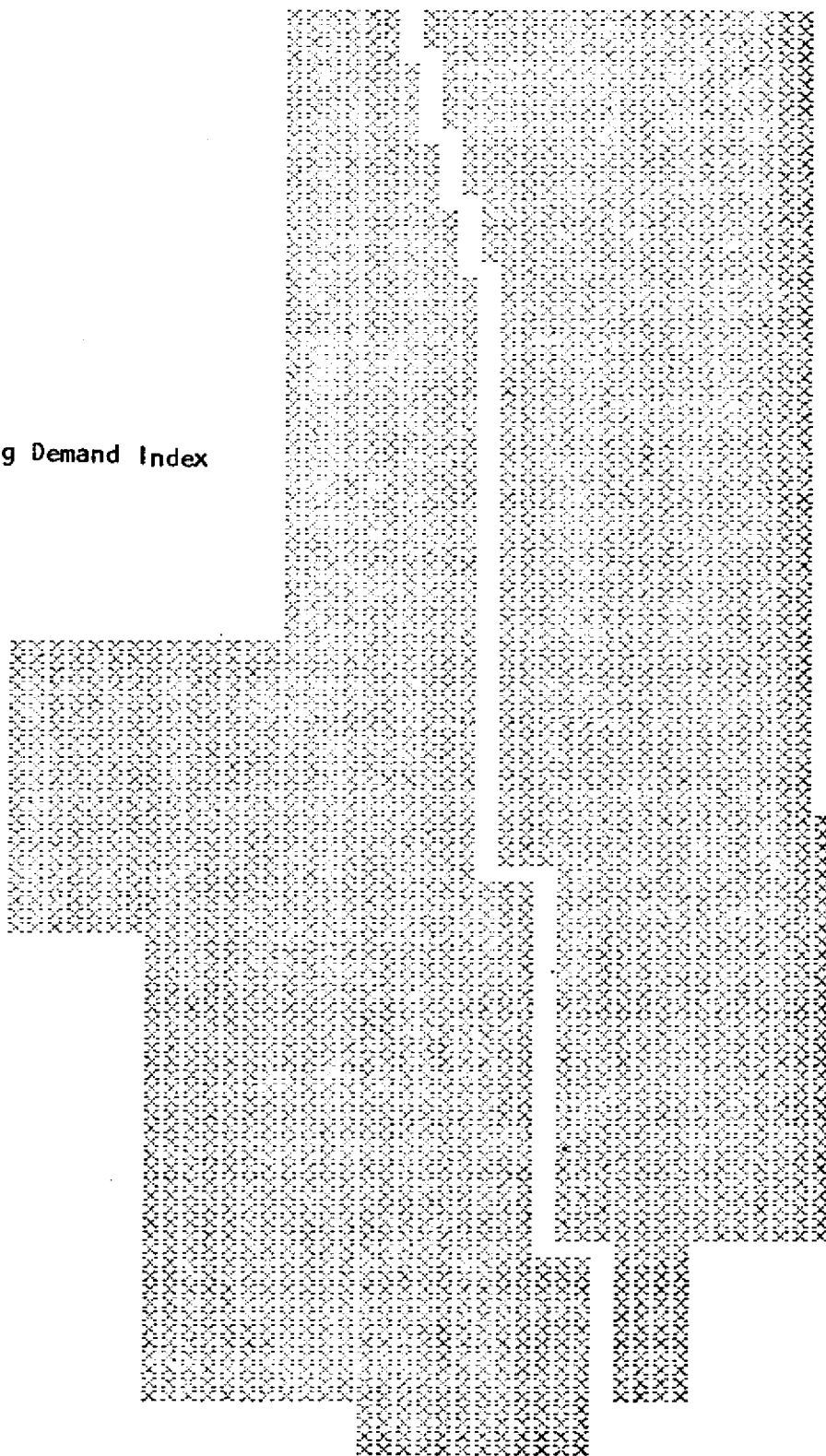
Low-Medium  
25-39.99

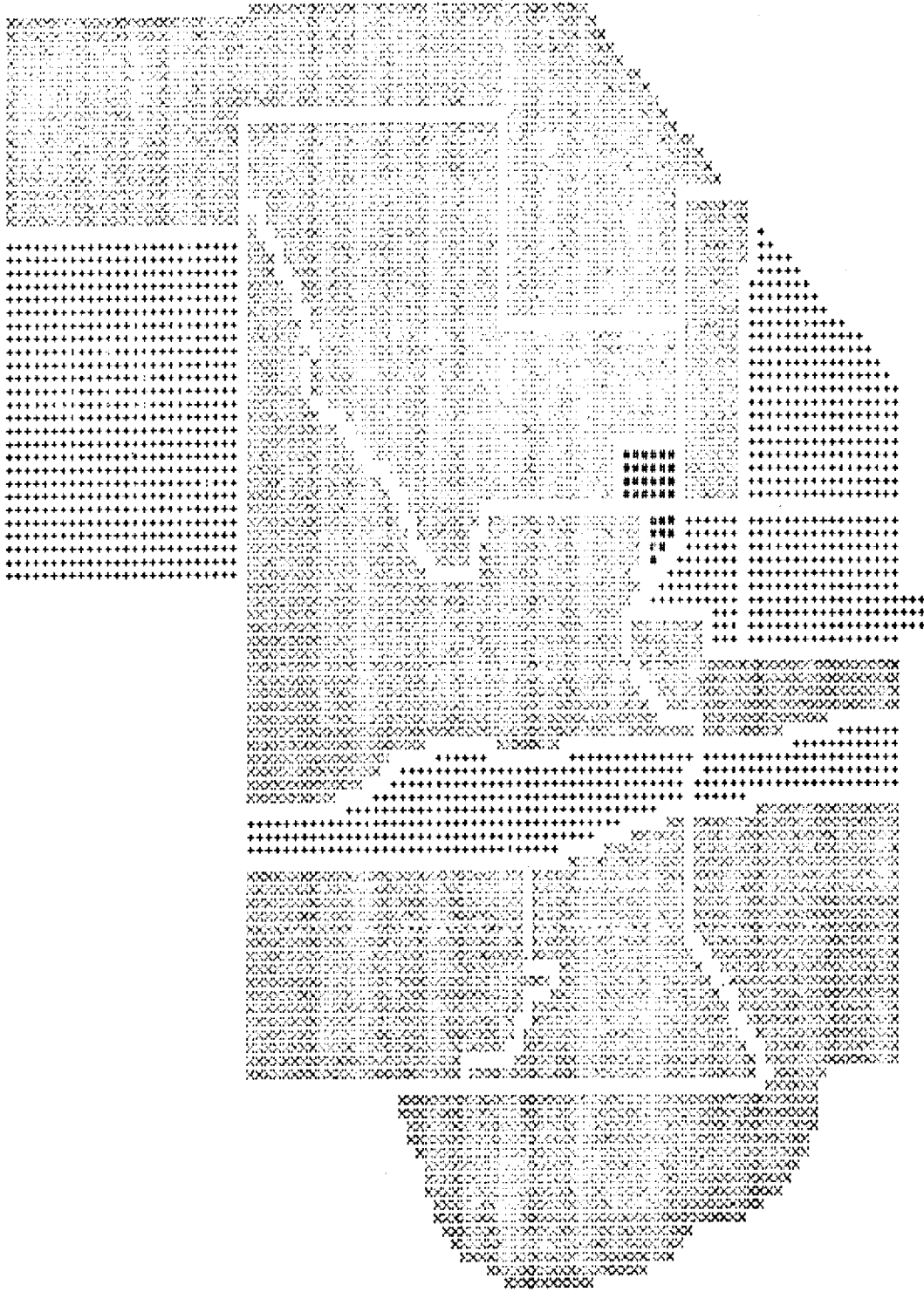
XXXXXXXX  
XXXXXXXX  
XXXXXXXX  
XXXXXXXX

High-Medium  
40-54.99

#####  
#####  
#####  
#####

High  
55+





..... Low 0-16.99  
 ++++++ Low-Medium 17-33.99  
 XXXXXXXX High-Medium 34-50.99  
 Mos Point High 51+

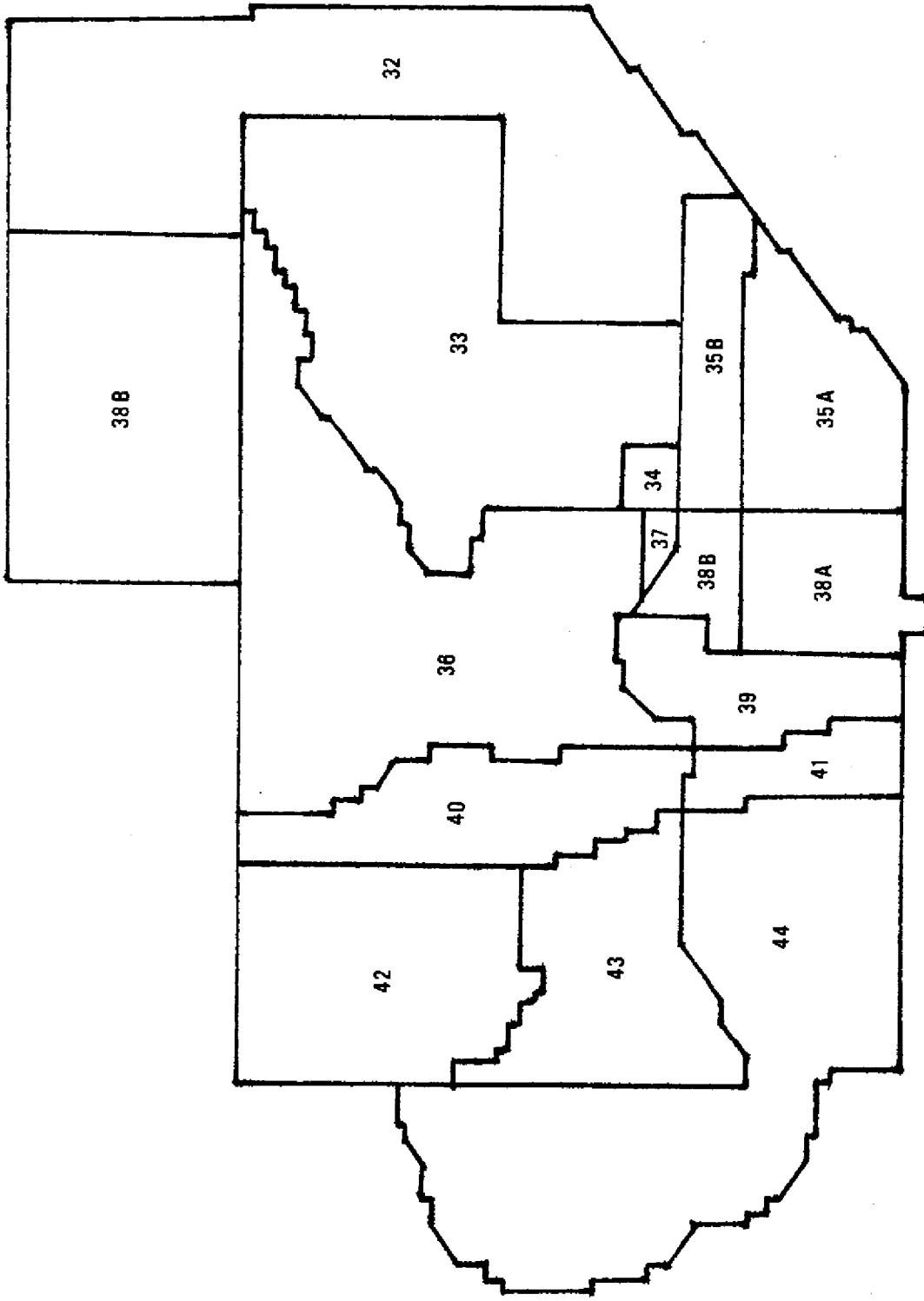


Fig. 5C--Enumeration District Outline

Moss Point

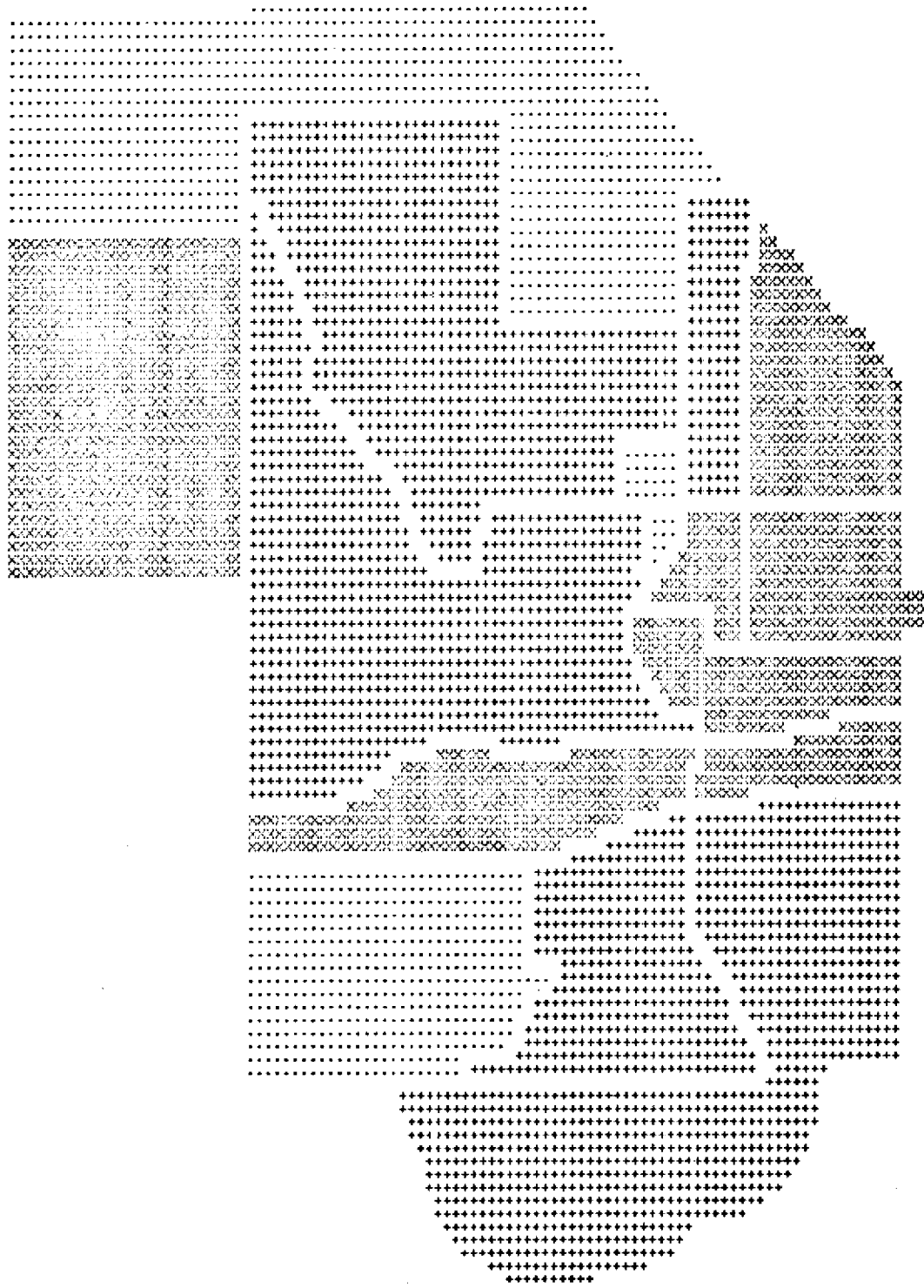


Fig. 7C--Population Heterogeneity Index

.....	Low	0-5.99	+++++	Low-Med	6-11.99	XXXXXX	High-Med	12-17.99	#####	High	18+
-------	-----	--------	-------	---------	---------	--------	----------	----------	-------	------	-----



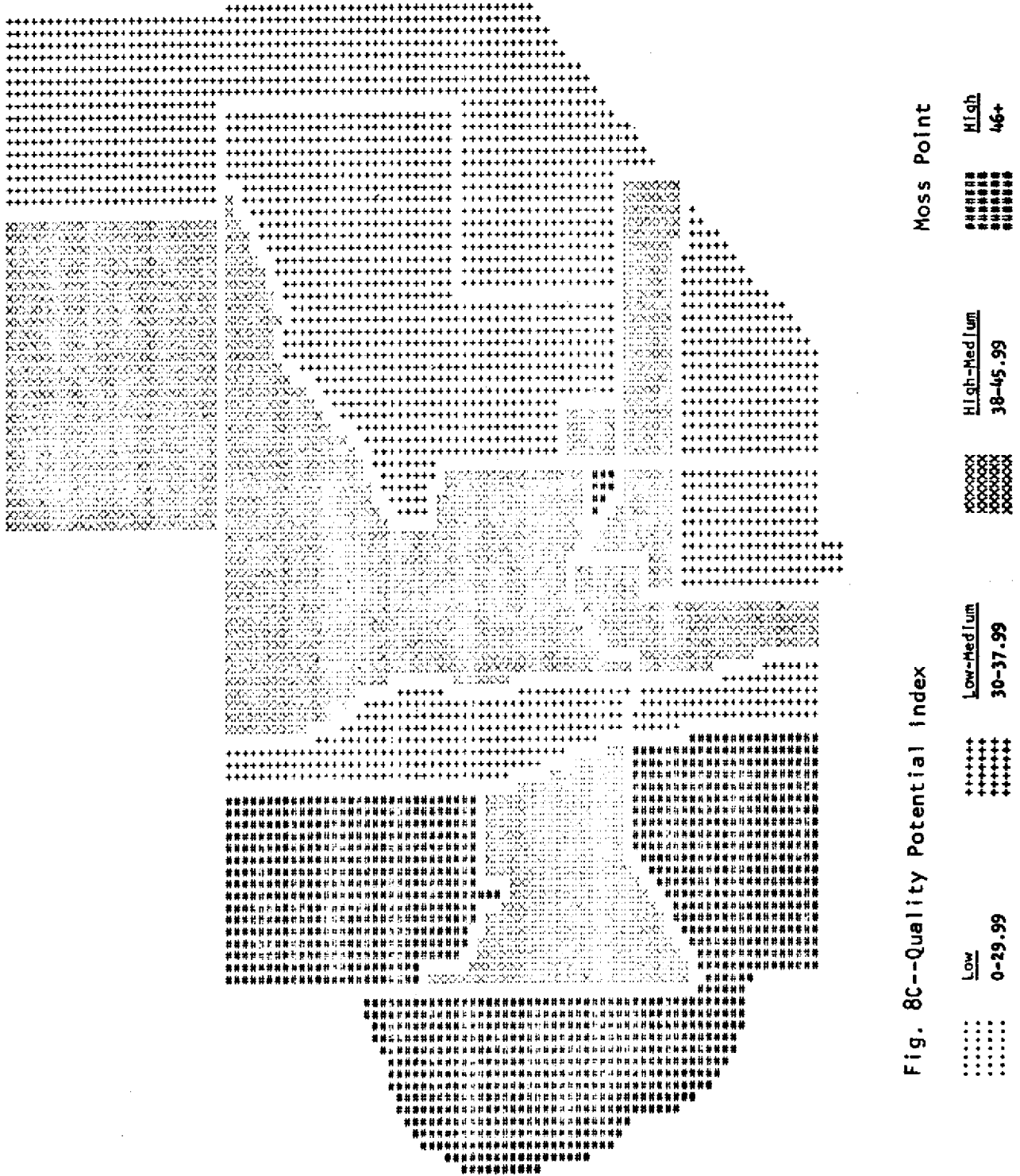
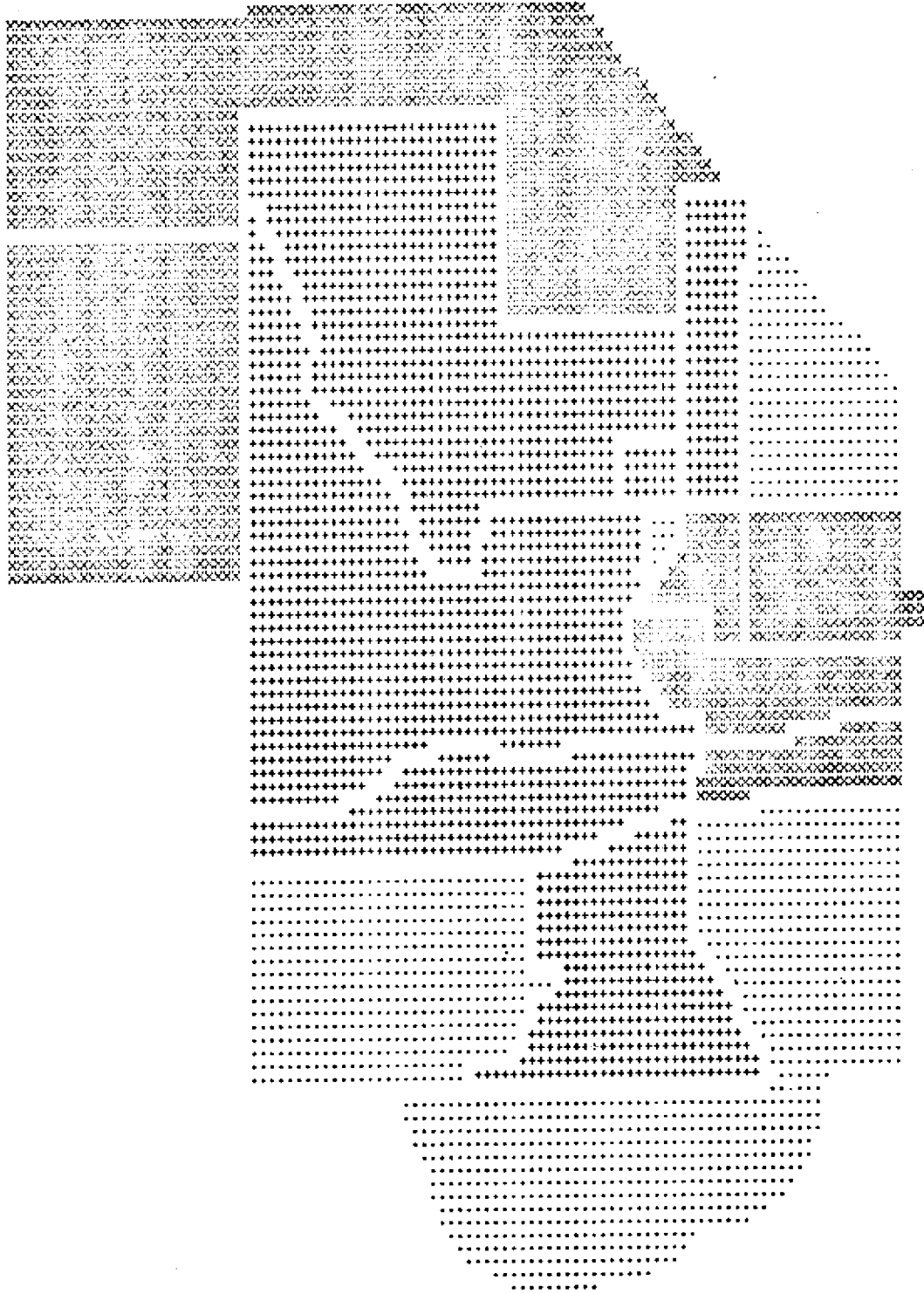


Fig. 8C--Quality Potential Index



Moss Point

Fig. 9C--Dependency Index

High 30+

High-Med 25-29.99

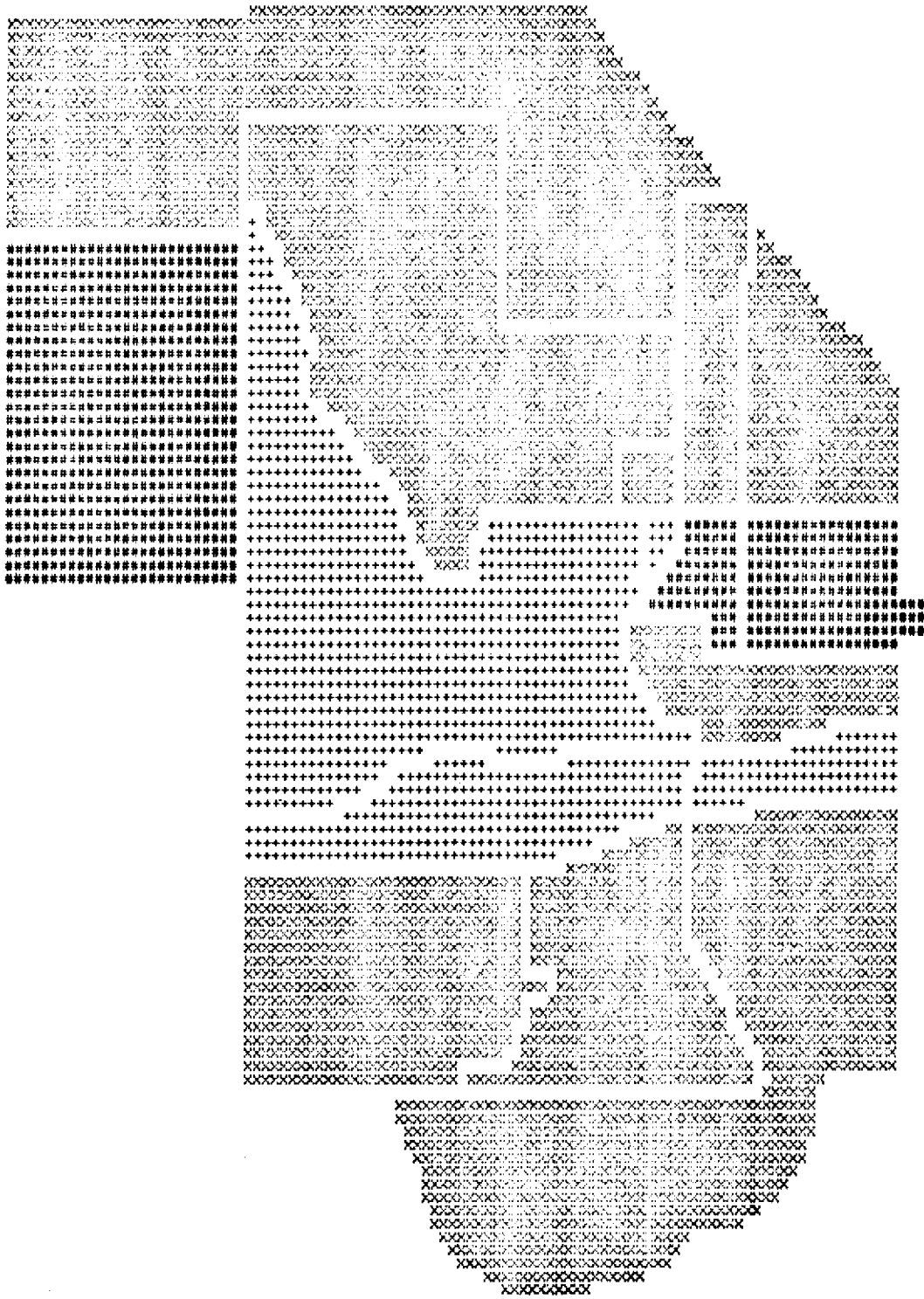
Low-Med 20-24.99

Low 0-19.99

.....

.....

.....



Moss Point

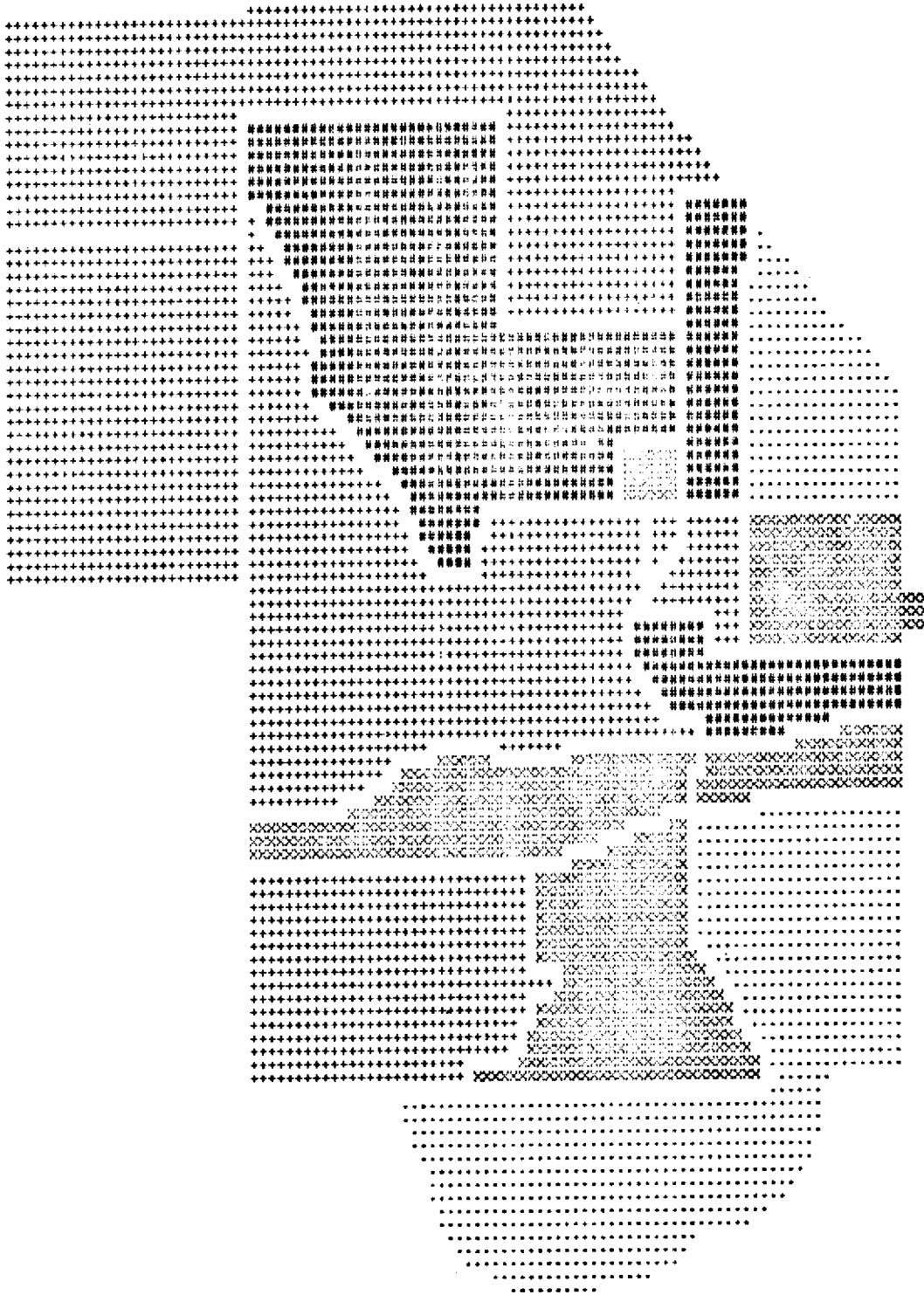
High 55+

High-Med Lum 48-54.99

Low-Med Lum 40-47.99

Low 0-39.99

Fig. 10C--Familism Index



Moss Point

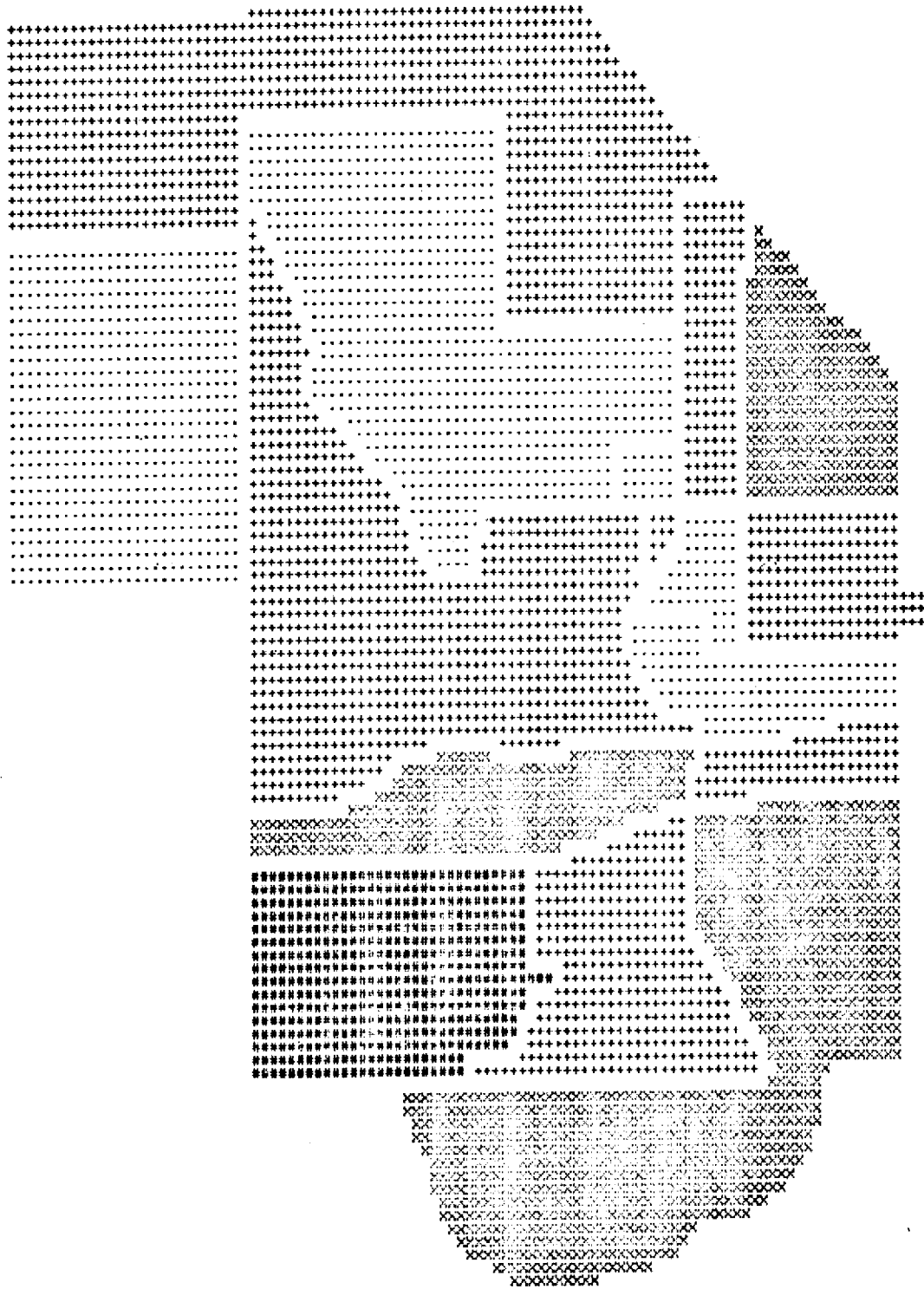
Fig. 11C--Social Disorganization Index

High  
26+

High-Medium  
18-25.99

Low-Medium  
10-17.99

Low  
0-9.99



Moss Point

High 48+

High-Med Lum 40-47.99

Low-Med Lum 34-39.99

Low 0-33.99

Fig. 12C--Labor Force Index

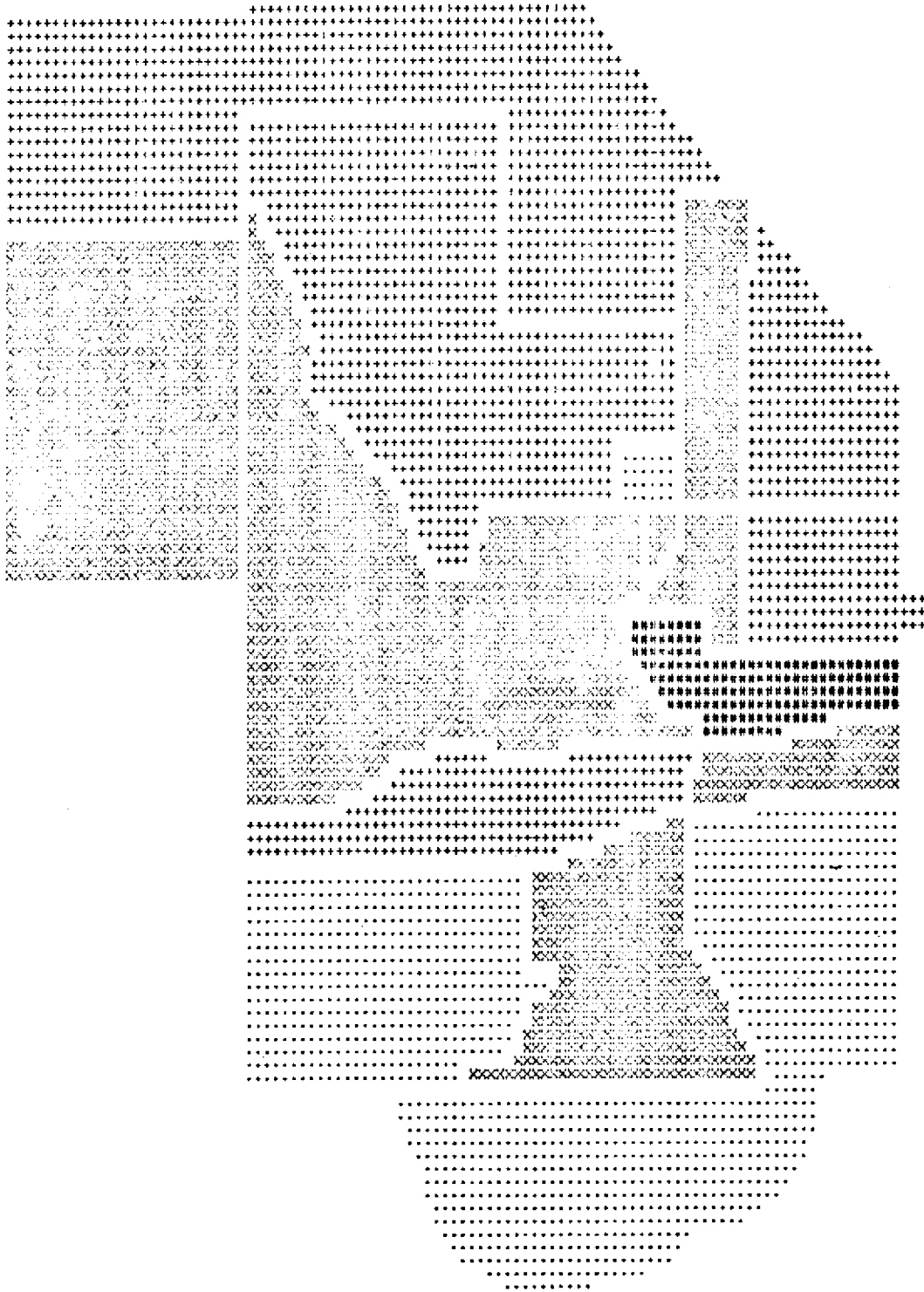
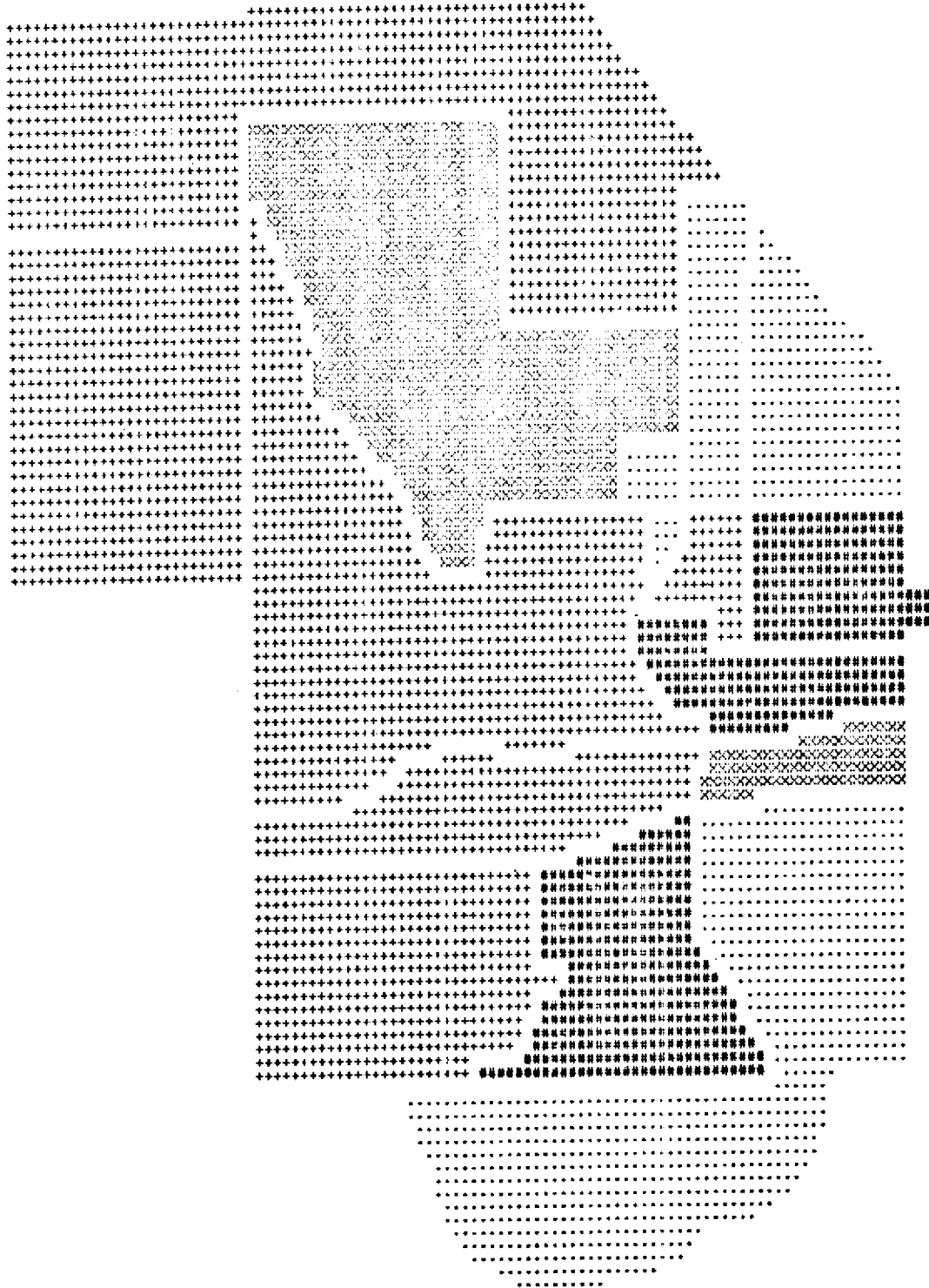


Fig. 13C--Industrial Lag Index

.....	Low	0-3.99	+++++	Low-Med Lum	4-6.99	XXXXXX	High-Med Lum	7-13.99	#####	High	14+
-------	-----	--------	-------	-------------	--------	--------	--------------	---------	-------	------	-----



Moss Point

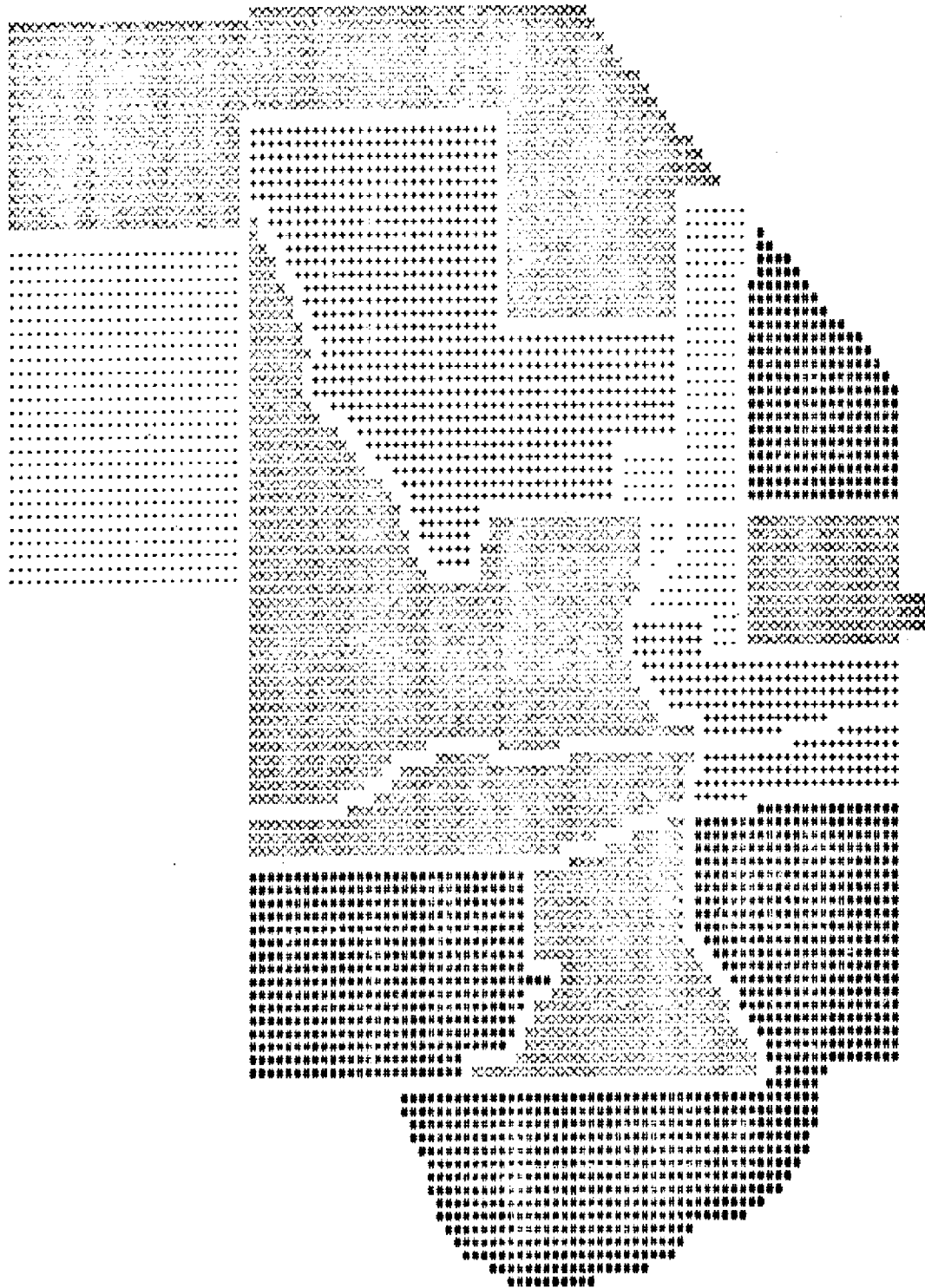
High  
25+

High-Med Lum  
15-24.99

Low-Med Lum  
6-14.99

Low  
0-5.99

Fig. 14C--Poverty Index



Moss Point

Fig. 15C--Housing Affluence Index

High 40+

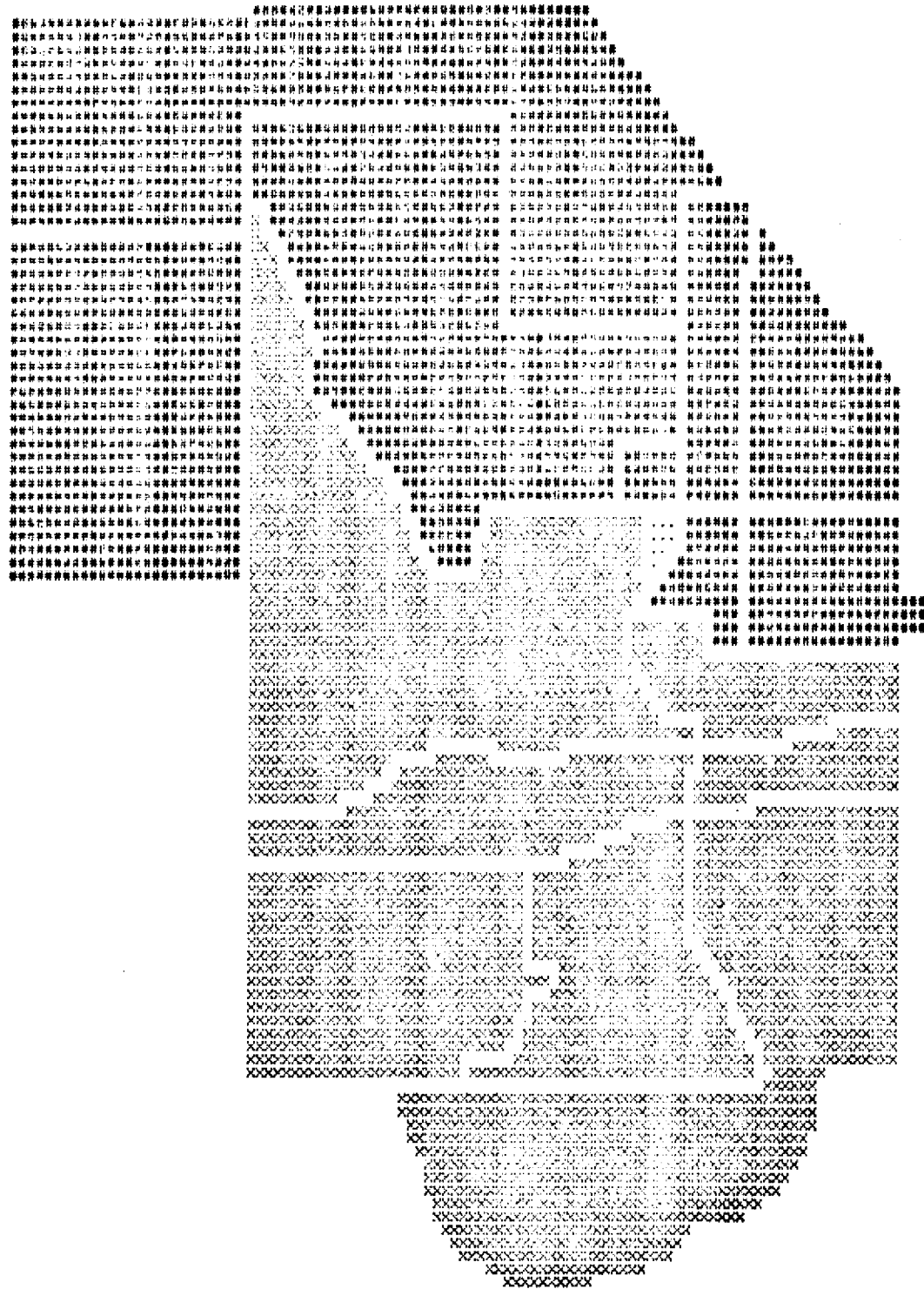
High-Medium 30-39.99

Low-Medium 15-29.99

Low 0-14.99







Moss Point

High  
55+

High-Medium  
40-54.99

Low-Medium  
25-39.99

Low  
0-24.99

Fig. 17C--Incipient Housing Demand Index

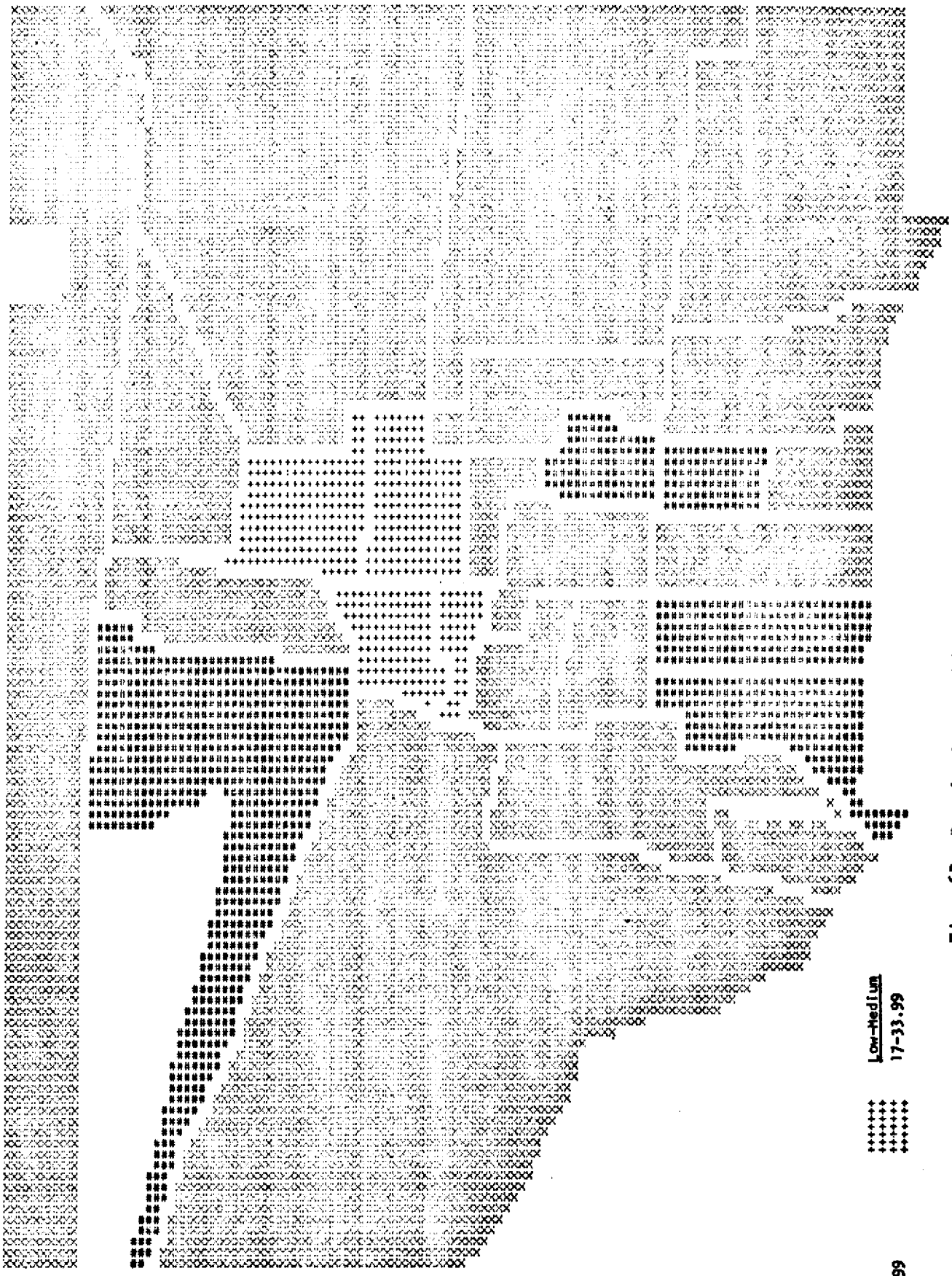


Fig. 6D--Population Stability Index  
Pascagoula

Low-Med Lum  
17-33.99

HLah  
51+

++++++  
++++++  
++++++

#####  
#####  
#####  
#####

Low  
0-16.99

HLsh-Med Lum  
34-50.99

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

XXXXXXXX  
XXXXXXXX  
XXXXXXXX  
XXXXXXXX

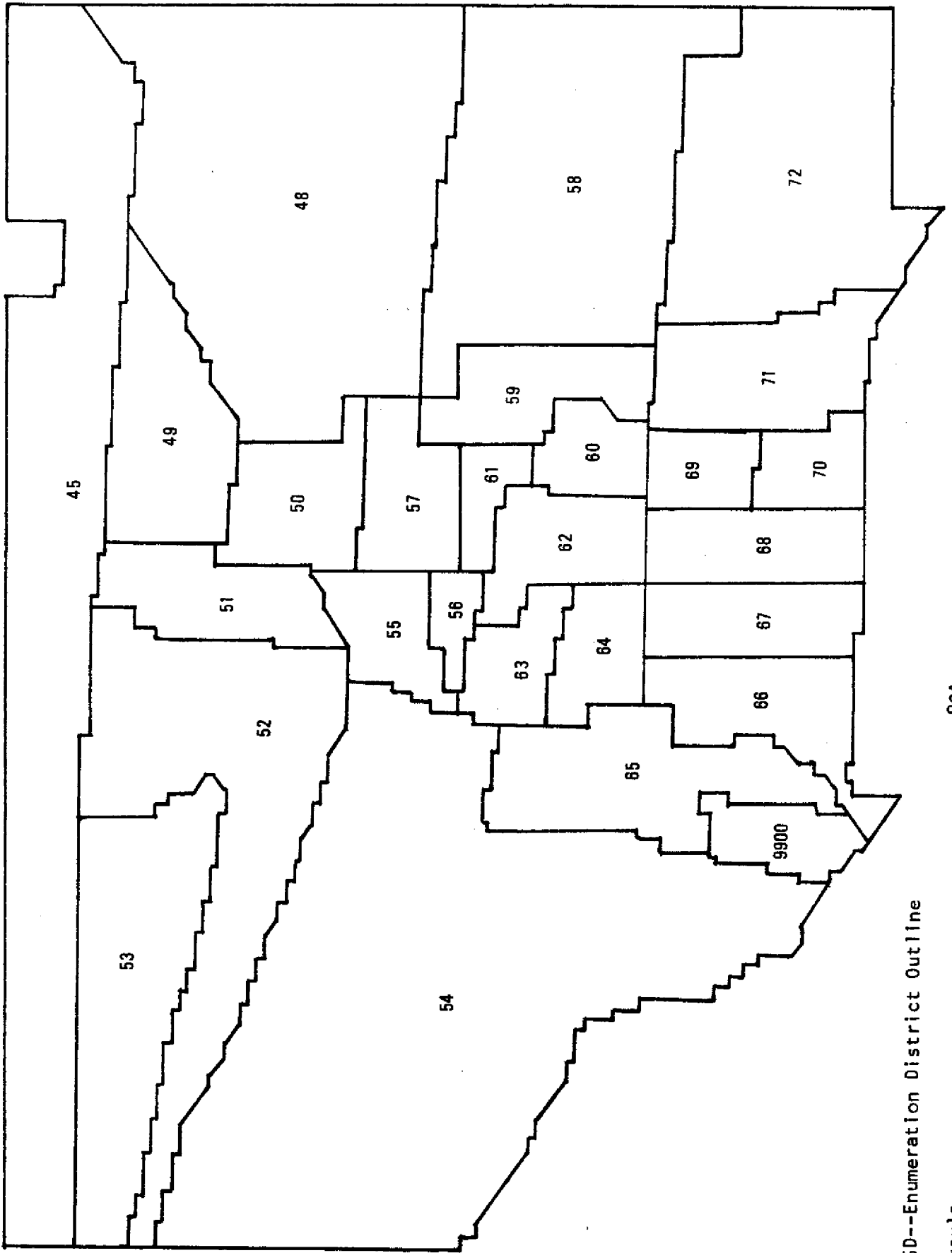
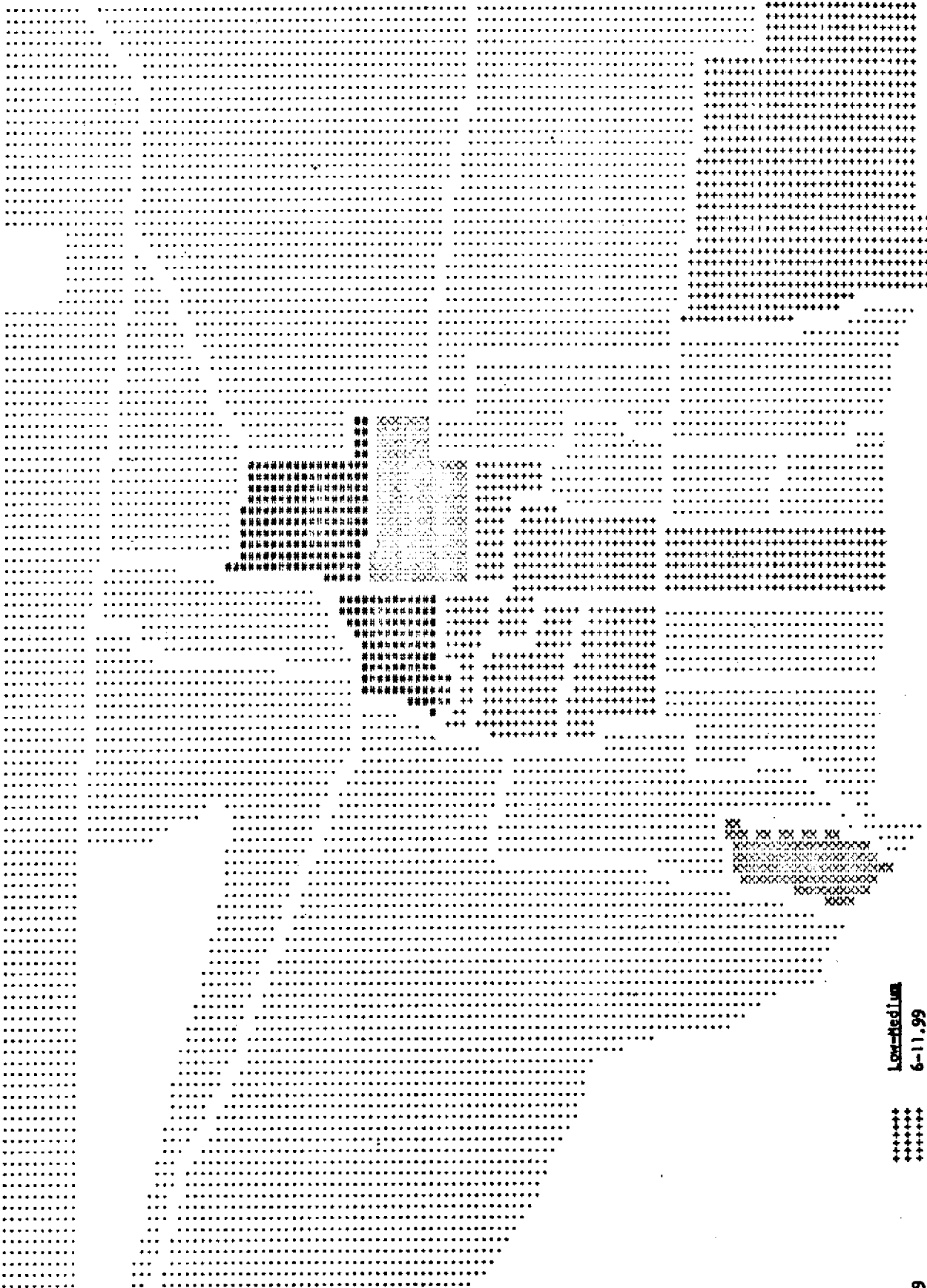


Fig. 5D--Enumeration District Outline

Pascagoula



Low-Med Luv  
6-11.99

High  
18+

++++++  
++++++  
++++++  
++++++

#####  
#####  
#####  
#####

Low  
0-5.99

High-Med Luv  
12-17.99

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

#####  
#####  
#####

Fig. 7D--Population Heterogeneity Index  
Pascagoula -81-

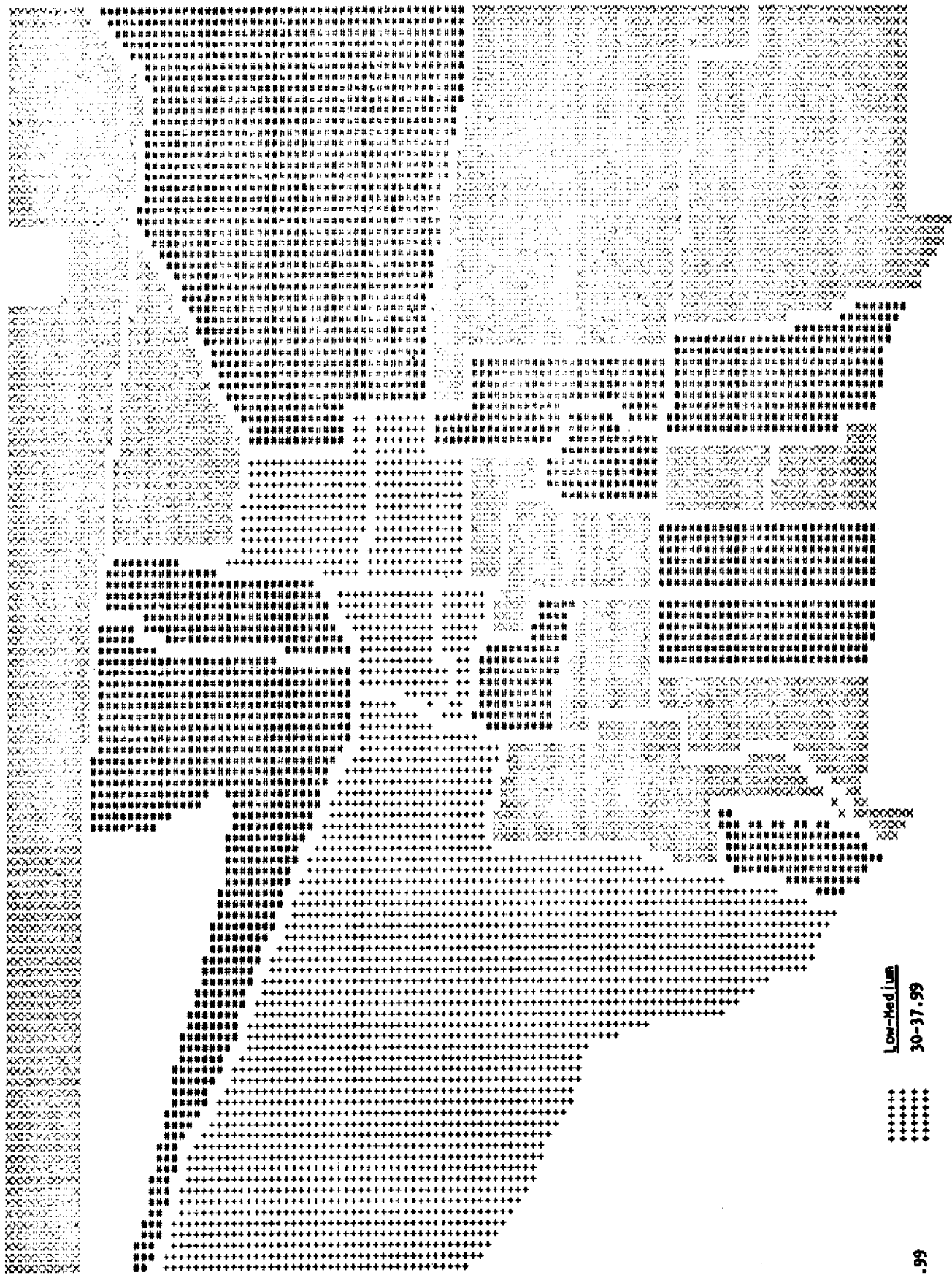
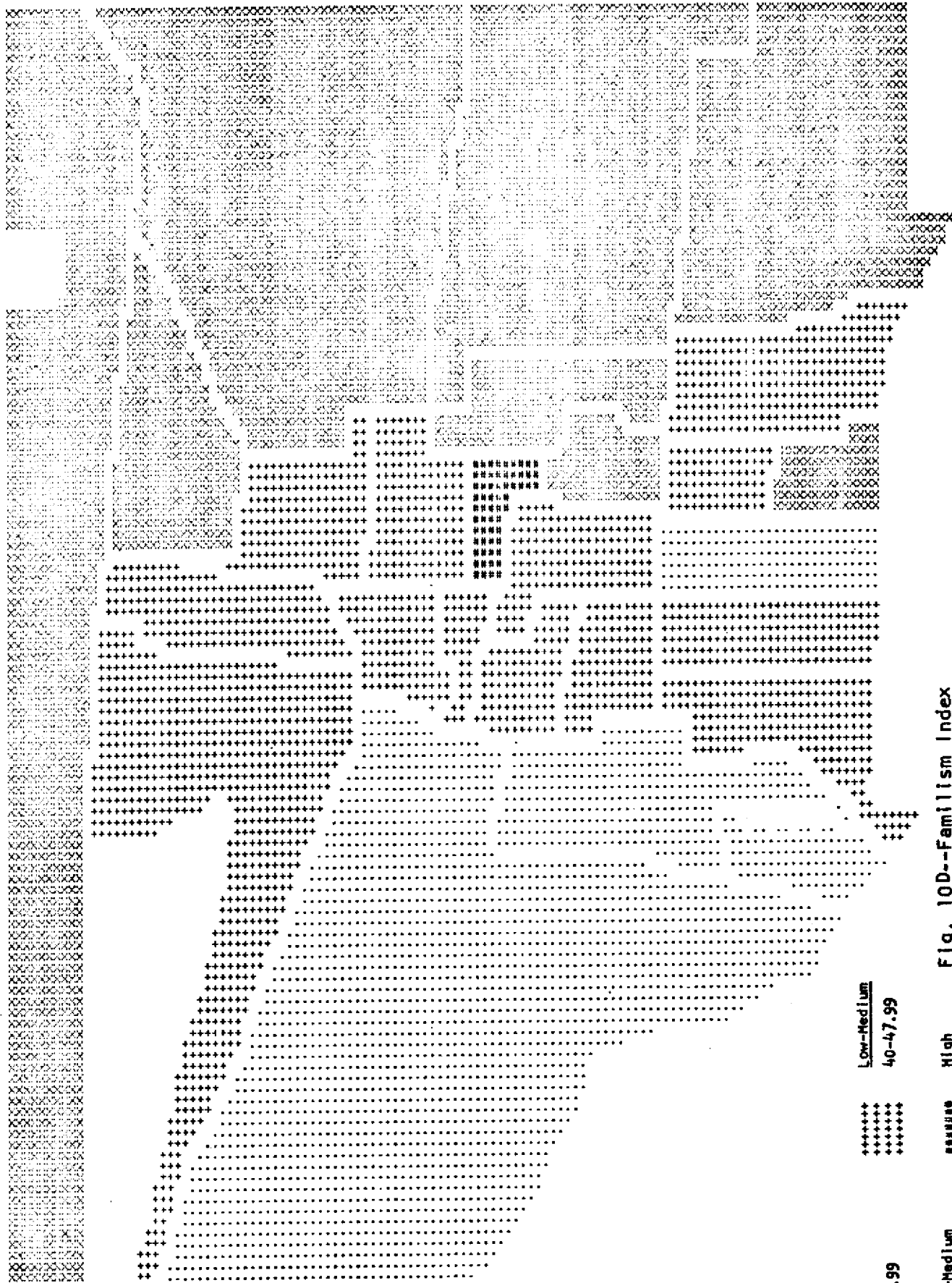


Fig. 8D--Quality Potential Index  
Pascagoula -82--

Low 0-29.99  
 High-Med Lum. 30-37.99  
 High 46+  
 High-Med Lum. 38-45.99  
 Low  
 High-Med Lum.  
 High





Low-Medium  
40-47.99

++++++  
++++++  
++++++

Low  
0-39.99

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

Fig. 10D--Familism Index  
-84-  
Pascagoula

High  
55+

#####  
#####  
#####  
#####

High-Medium  
48-54.99

#####  
#####  
#####  
#####



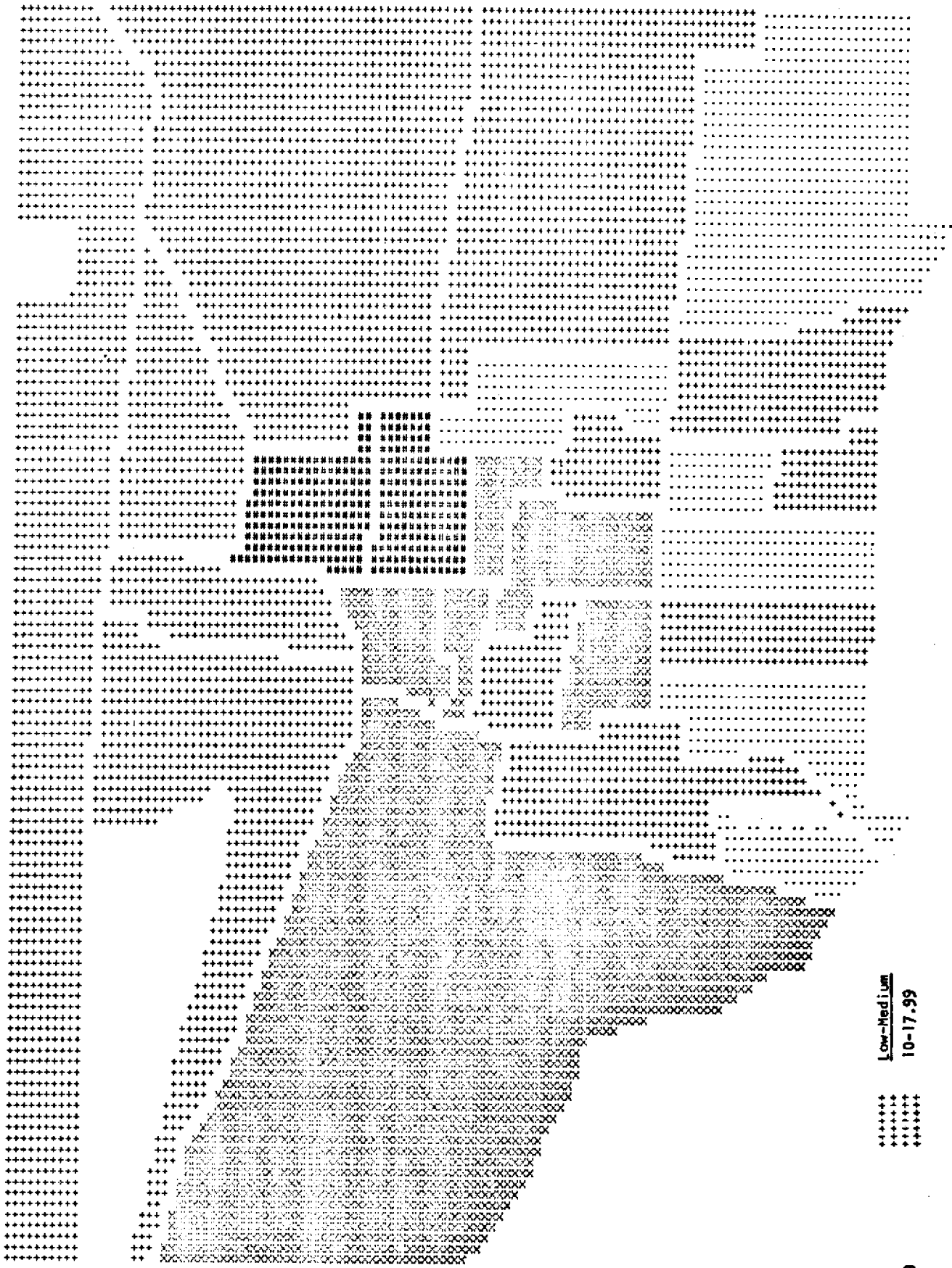


Fig. 10--Social Disorganization Index

Pascagoula -85-

Low-Medium  
10-17.99

High  
26+

+++++  
+++++  
+++++  
+++++

#####  
#####  
#####  
#####

Low  
0-9.99

High-Medium  
18-25.99

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

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

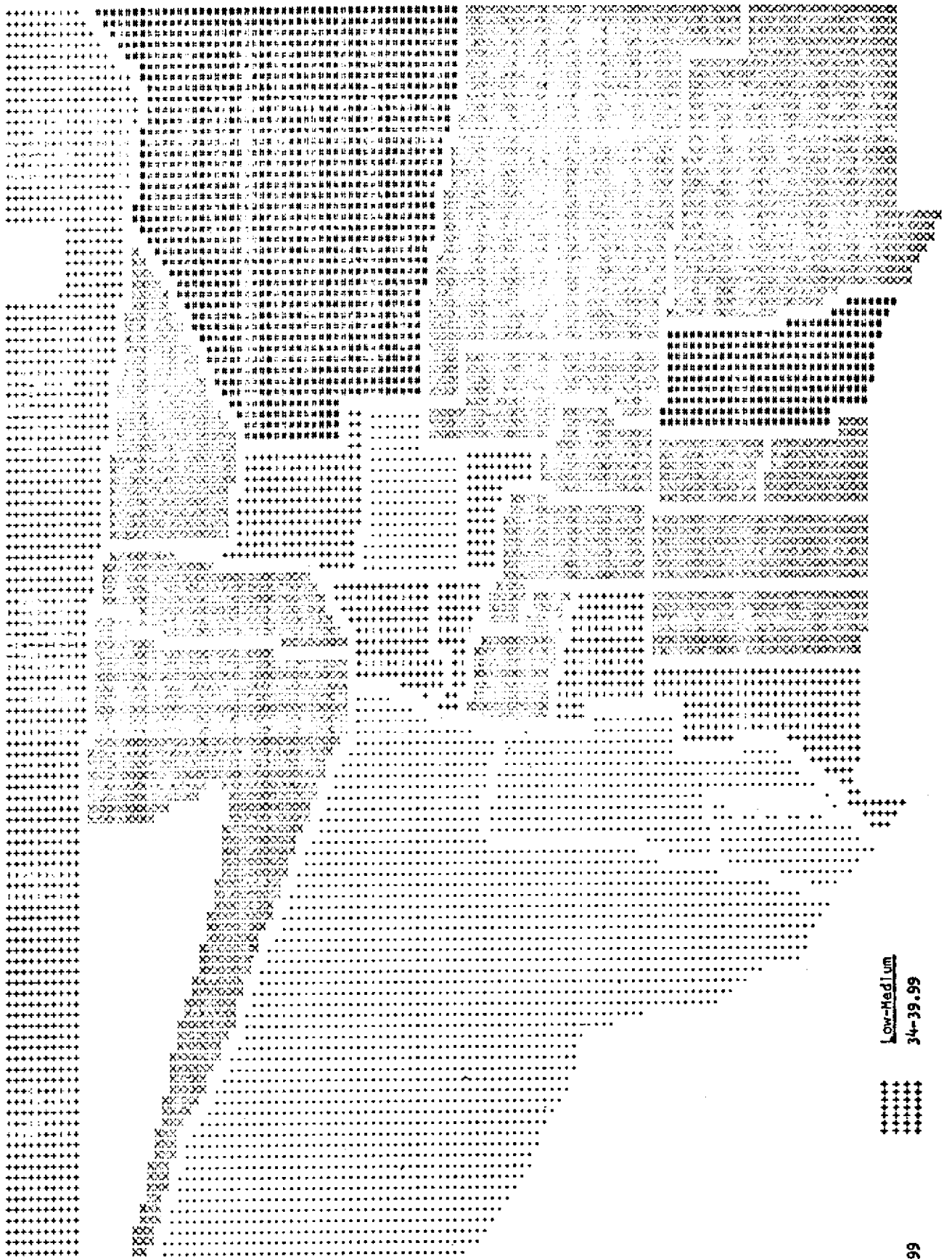


Fig. 12D--Labor Force Index  
Pascagoula -86-

Low-Medium  
34-39.99

High  
48+

++++++  
++++++  
++++++

#####  
#####  
#####

Low  
0-33.99

High-Medium  
40-47.99

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

#####  
#####  
#####

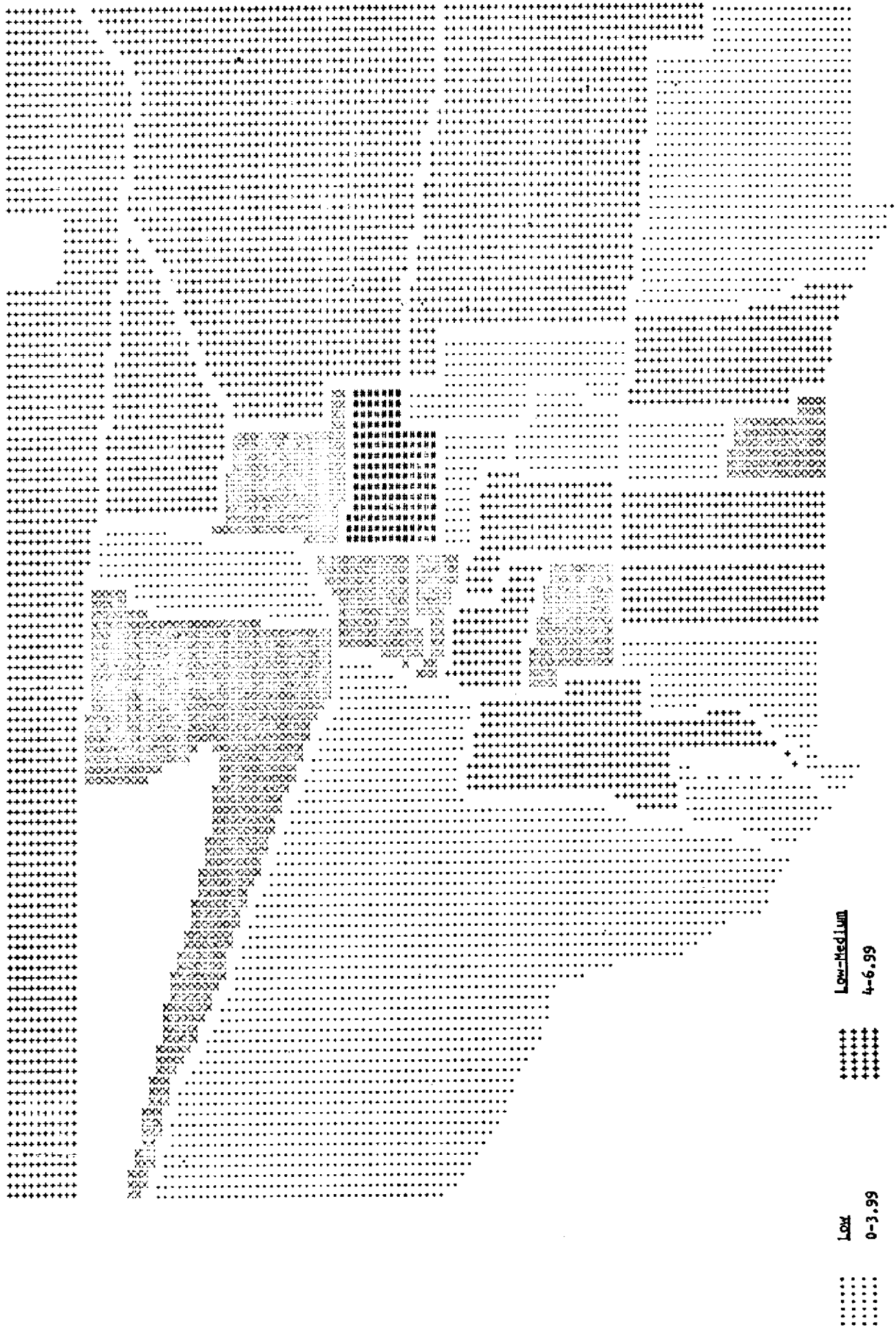


Fig. 13D--Industrial Lag Index

Low-Medium

4-6.99

High

14+

Low

0-3.99

High-Medium

7-13.99

+++++

+++++

+++++

+++++

#####

#####

#####

#####

#####

#####

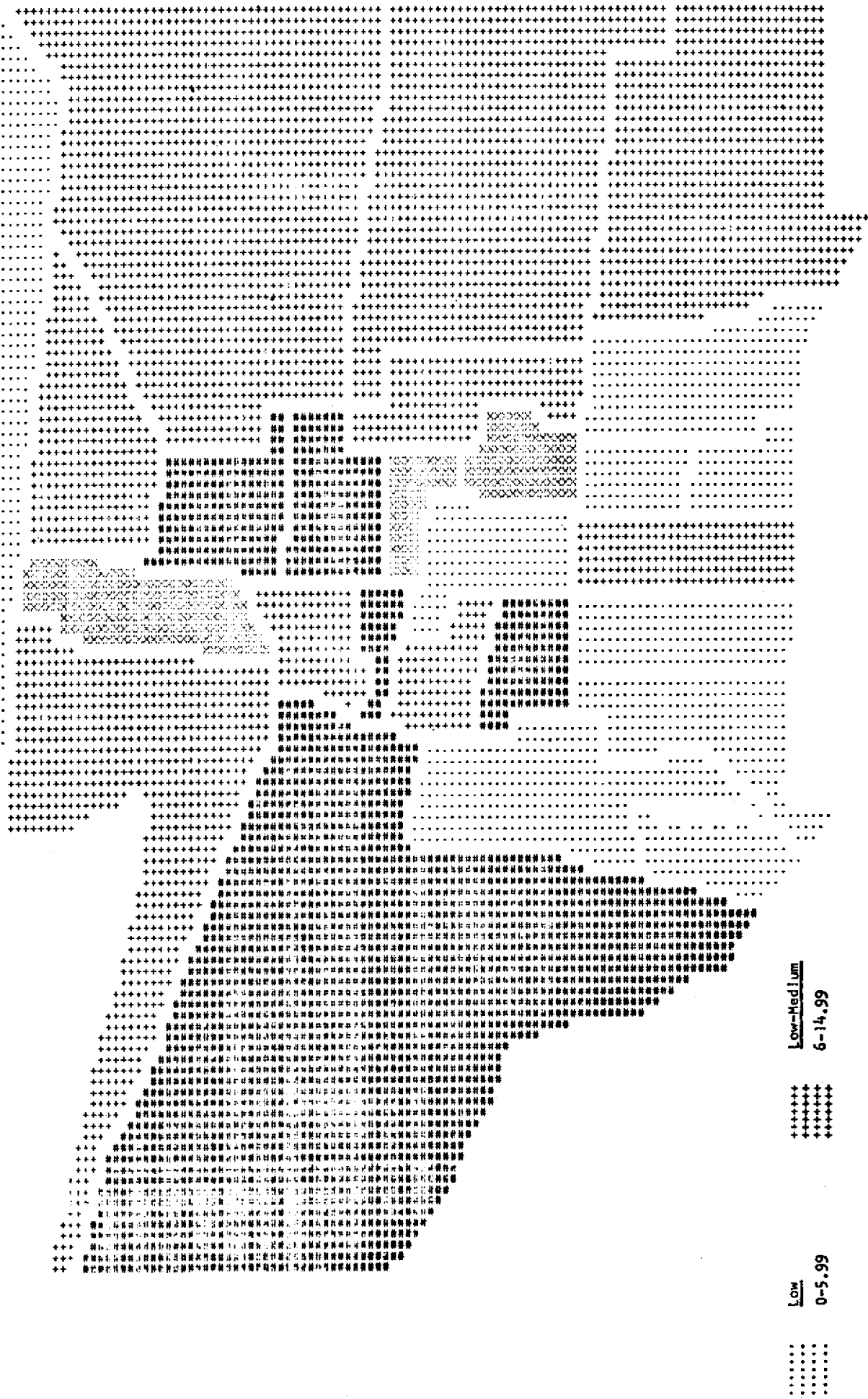


Fig. 14D--Poverty Index  
Pasco County

High  
25+

High-Medium  
15-24.99

Low-Medium  
6-14.99

Low  
0-5.99

00000000  
00000000  
00000000  
00000000

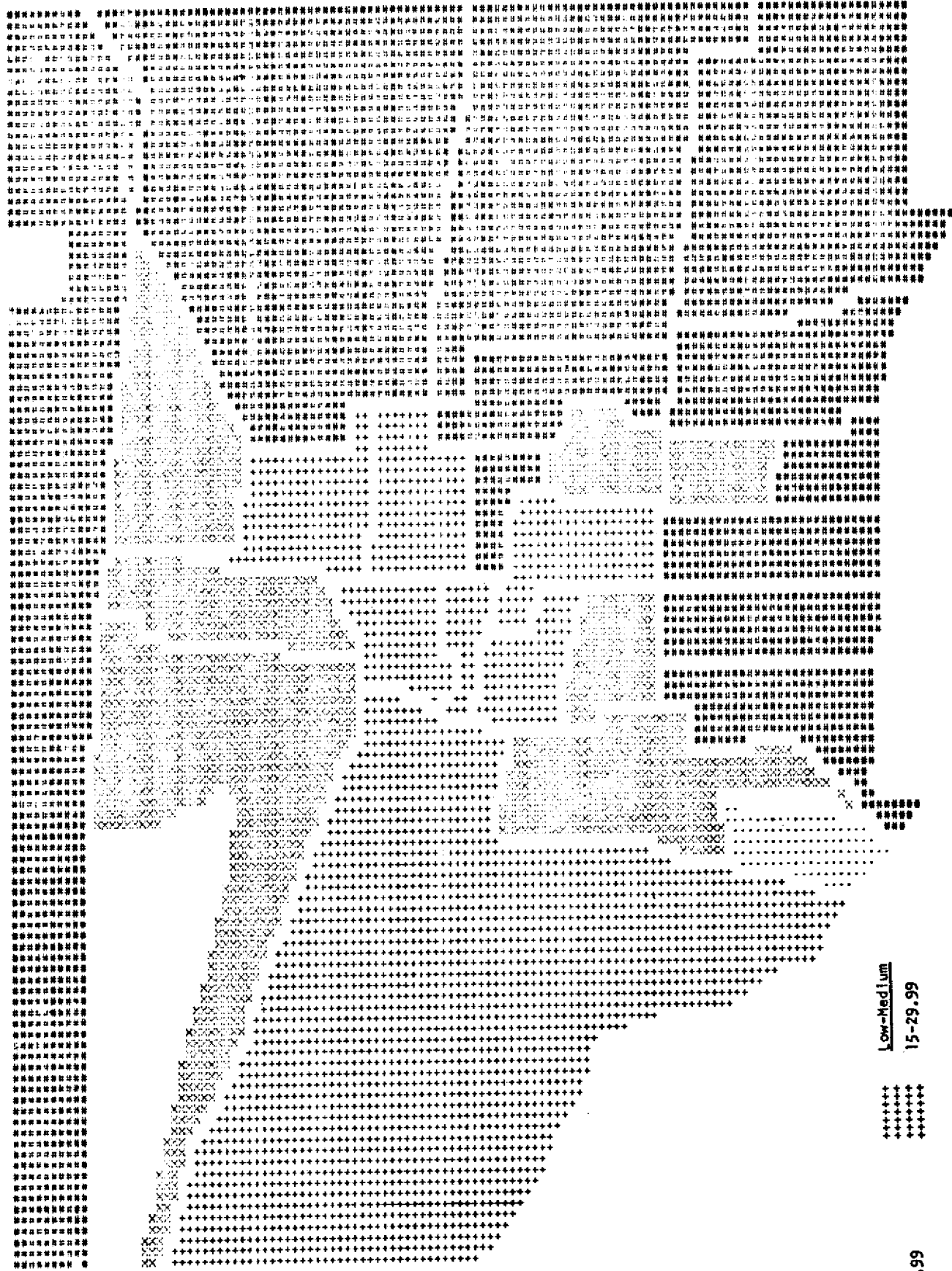


Fig. 15D--Housing Affluence Index  
Pascagoula

Low-Medlum  
15-29.99

High  
40+

Low  
0-14.99

High-Medlum  
30-39.99



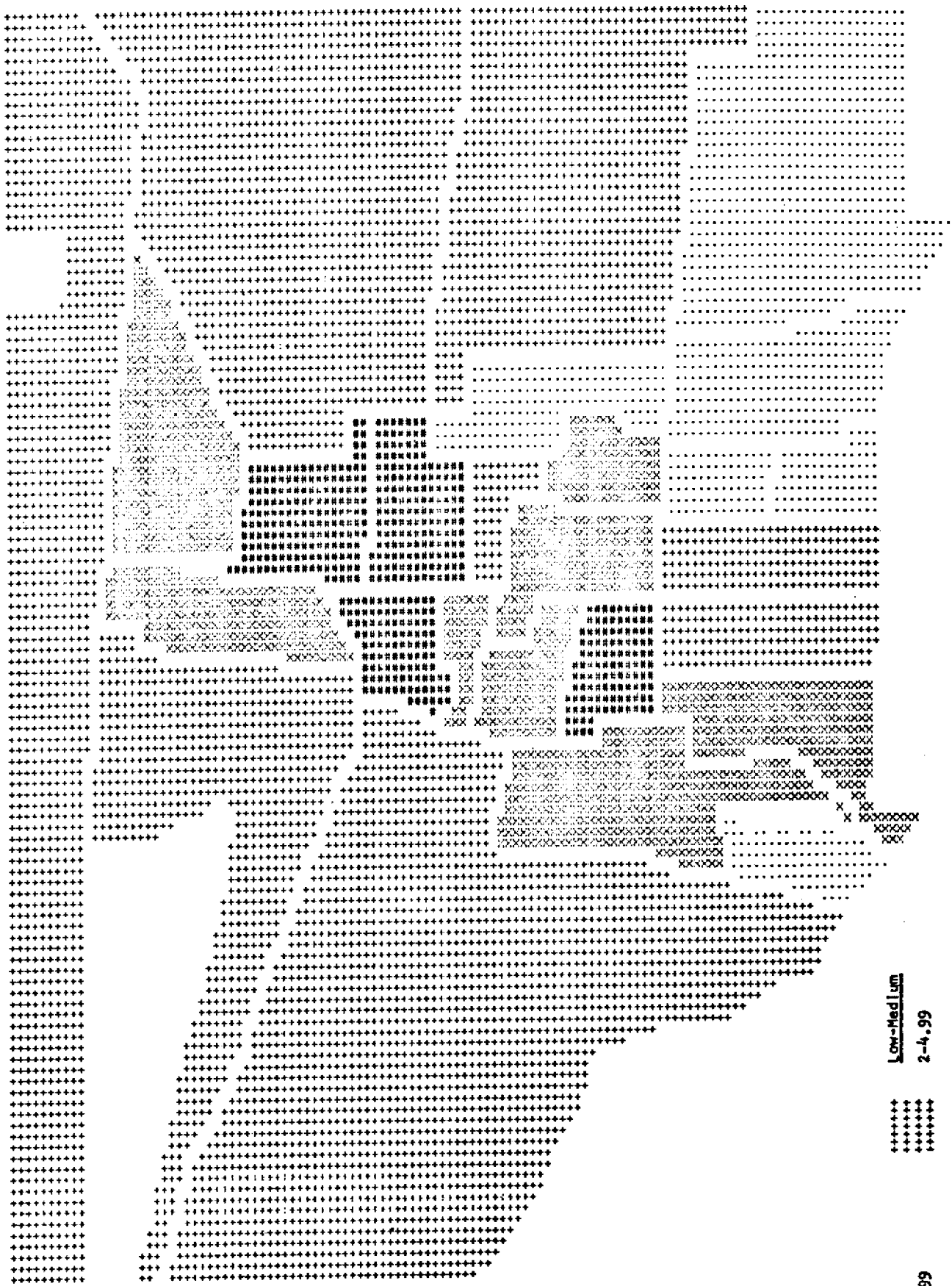


Fig. 160--Housing Inadequacy Index  
Pascagoula -90-

Low-Med Lum  
2-4.99

High  
10+

++++++  
++++++  
++++++

#####  
#####  
#####

Low  
0-1.99

High-Med Lum  
5-9.99

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

xxxxxxx  
xxxxxxx  
xxxxxxx





Fig. 6E--Population Stability Index

Plicayune

Low

0-16.99

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

Low-Medium

17-33.99

++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium

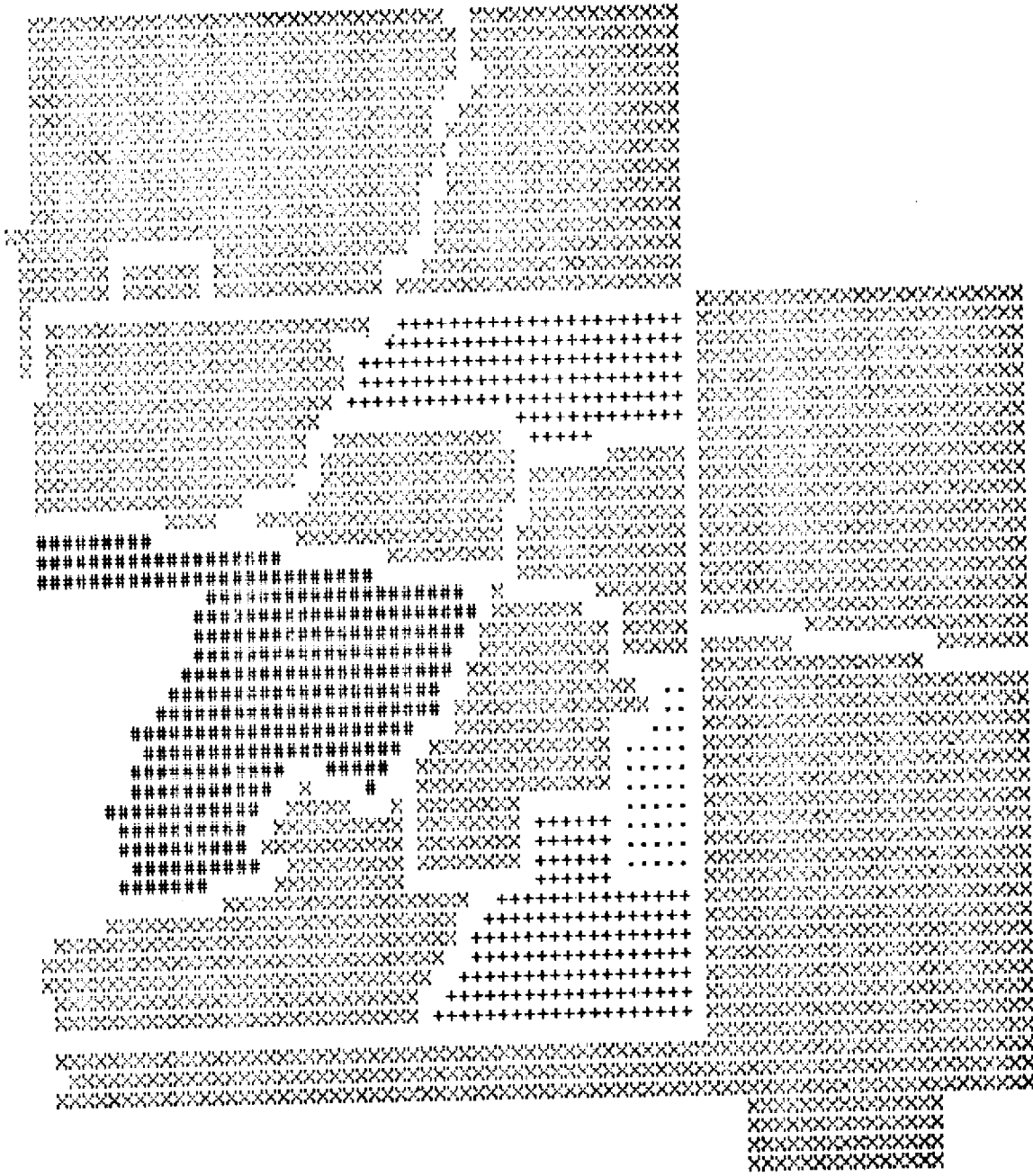
34-50.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

51+

#####  
 #####  
 #####  
 #####





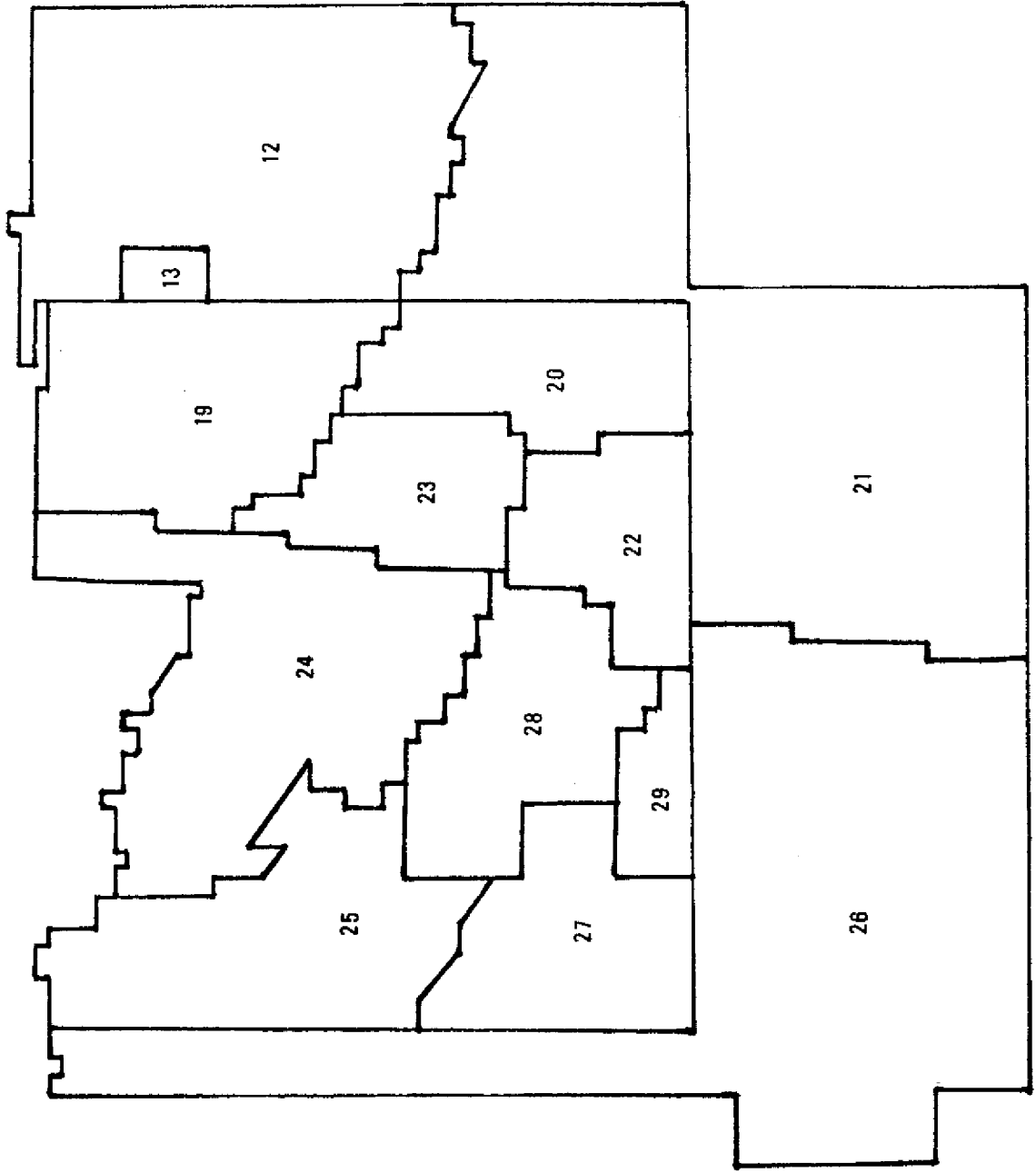


Fig. 5E--Enumeration District  
Outline

Fig. 7E--Population Heterogeneity Index

Plcayune

Low  
0-5.99

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

Low-Medium  
6-11.99

++++++  
++++++  
++++++  
++++++

High-Medium  
12-17.99

XXXXXXXX  
XXXXXXXX  
XXXXXXXX  
XXXXXXXX

High  
18+

#####  
#####  
#####  
#####

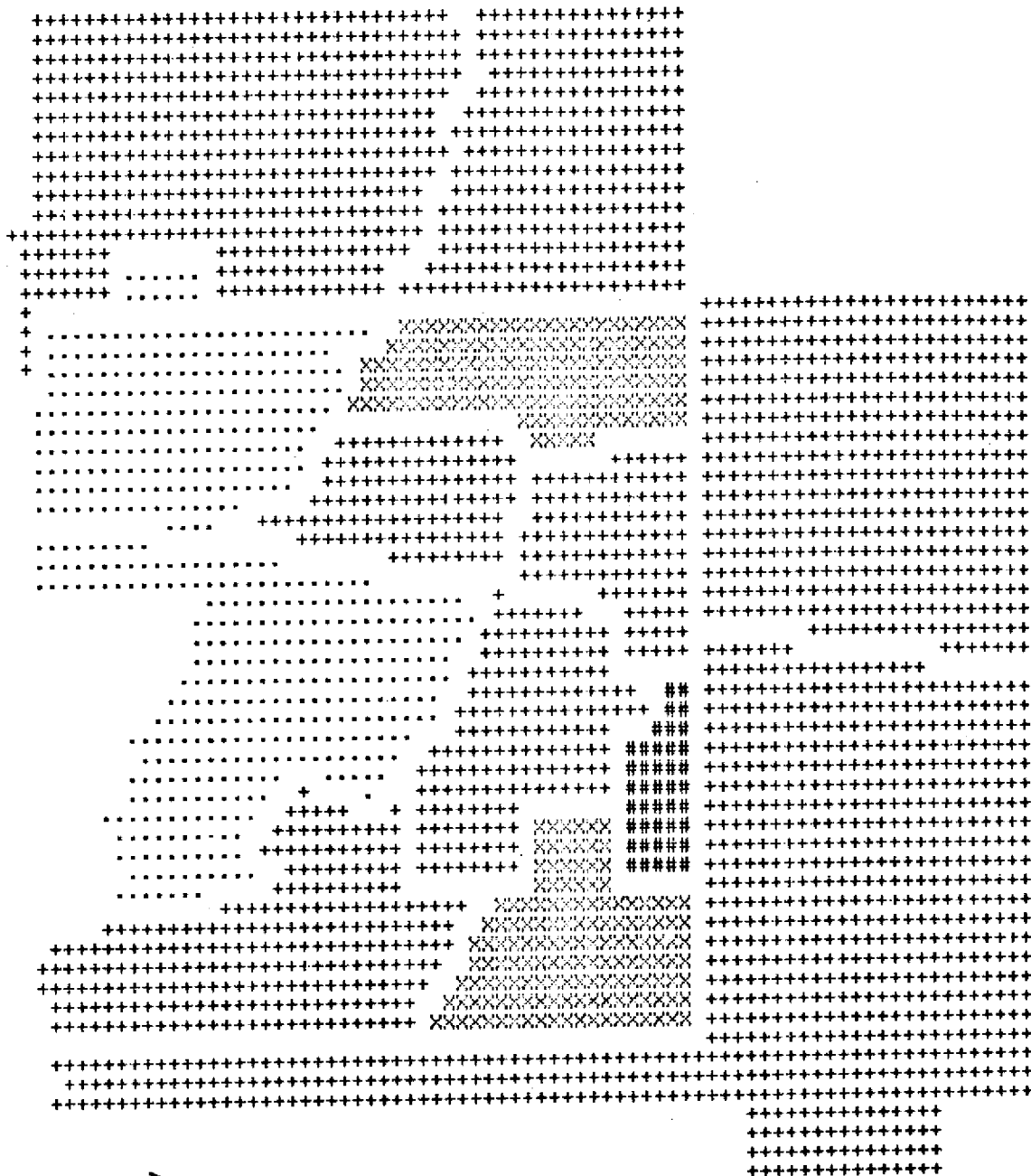


Fig. 8E--Quality Potential Index

Picayune

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

Low  
 0-29.99

++++++  
 ++++++  
 ++++++  
 ++++++

Low-Medium  
 30-37.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High-Medium  
 38-45.99

#####  
 #####  
 #####  
 #####

High  
 46+

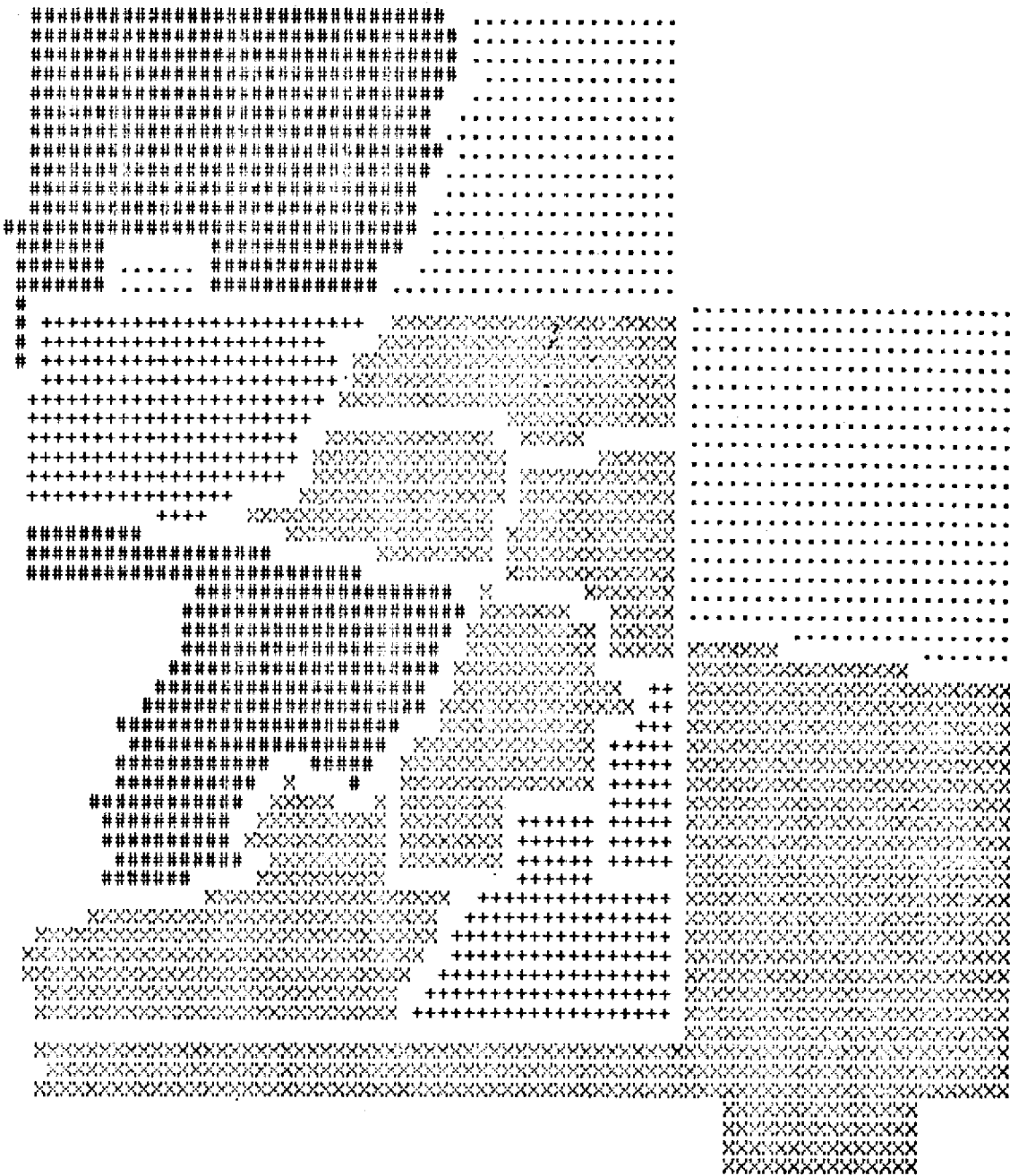


Fig 9E--Dependency Index

Plcayune



Low

0-19.99

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

Low-Medium

20-24.99

++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium

25-29.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

30+

#####  
 #####  
 #####  
 #####

Fig. 10E--Famllism Index

P/cayune



Low  
 0-39.99

Low-Medium  
 40-47.99

High-Medium  
 48-54.99

High  
 55+

Fig. 11E--Social Disorganization Index

Picayune

Low  
0-9.99

Low-Medium  
10-17.99

High-Medium  
18-25.99

High  
26+





Fig. 12E--Labor Force Index

Placayune

Low  
0-33.99

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

Low-Medium  
34-39.99

++++++  
++++++  
++++++  
++++++

High-Medium  
40-47.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
48+

\* \* \* \* \*  
\* \* \* \* \*  
\* \* \* \* \*  
\* \* \* \* \*

Fig. 13E--Industrial Lag Index

Picayune



Low  
0-3.99

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

Low-Medium  
4-6.99

++++++  
++++++  
++++++  
++++++

High-Medium  
7-13.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
14+



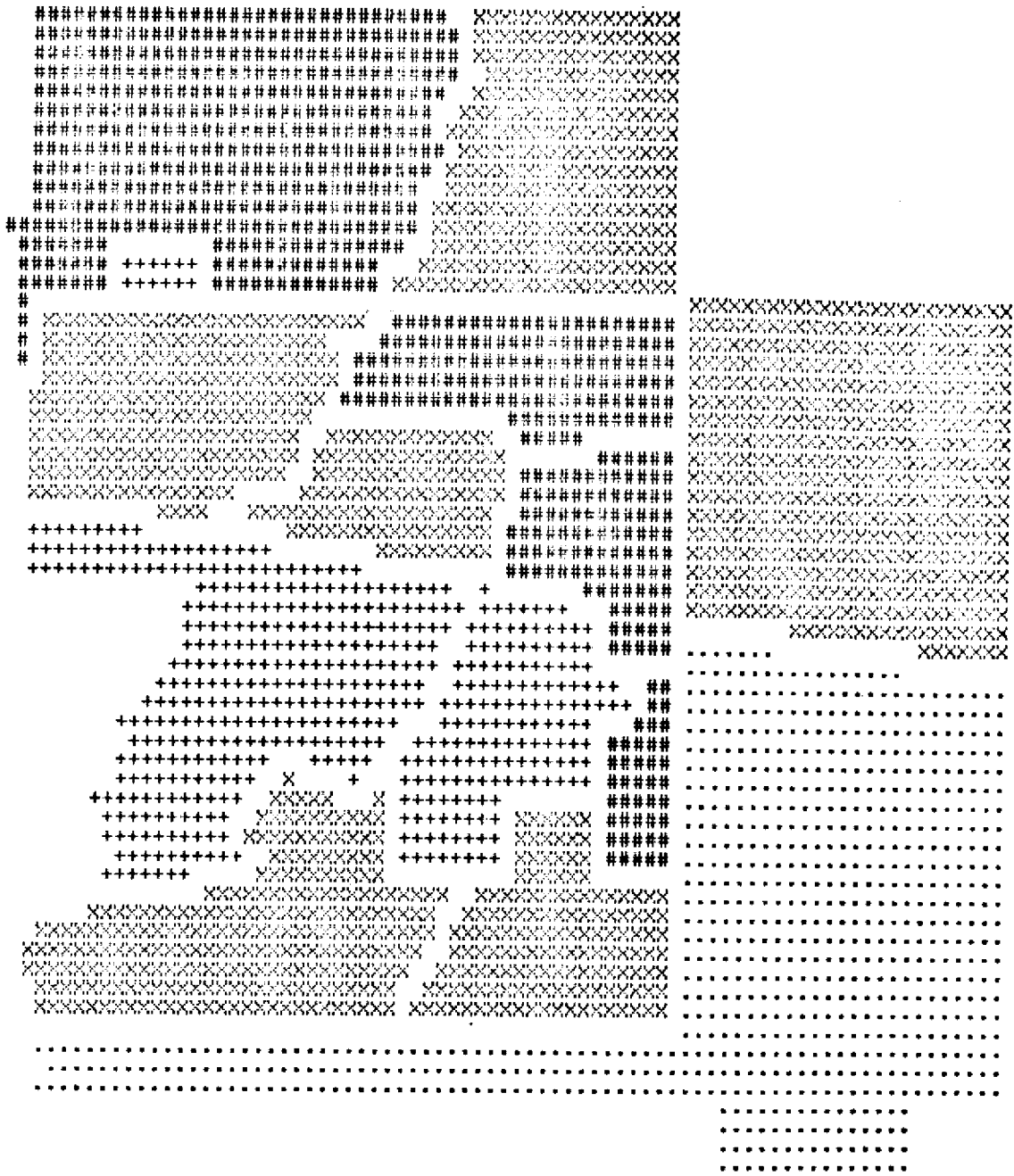



Fig. 14E--Poverty Index

Picayune

Low

0-5.99

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

Low-Medium

6-14.99

++++++  
 +++  
 +++  
 +++

High-Medium

15-24.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

25+

#####  
 #####  
 #####  
 #####



Fig. 16E---Housing Inadequacy Index



Picayune

Low  
0-1.99

Low-Med Lum  
2-4.99

High-Med Lum  
5-9.99

High  
10+



Fig. 6F--Population Stability Index

Poplarville

Low  
0-16.99

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

Low-Medium  
17-33.99

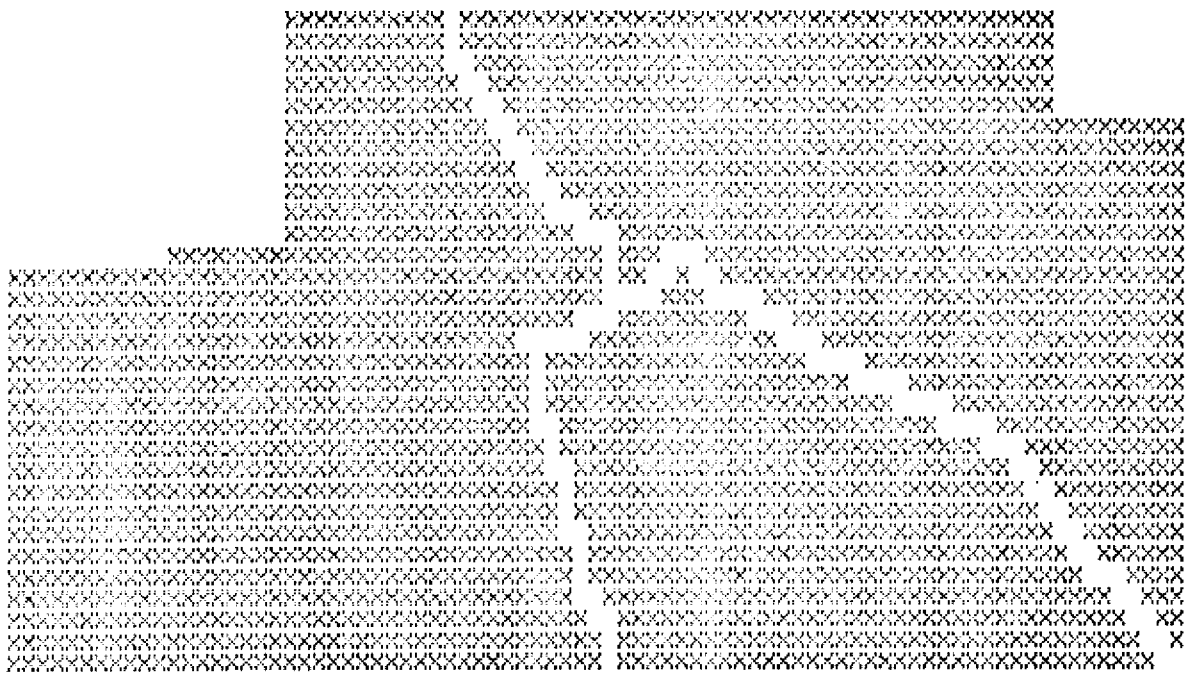
++++++  
++++++  
++++++  
++++++

High-Medium  
34-50.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
51+

#####  
#####  
#####  
#####



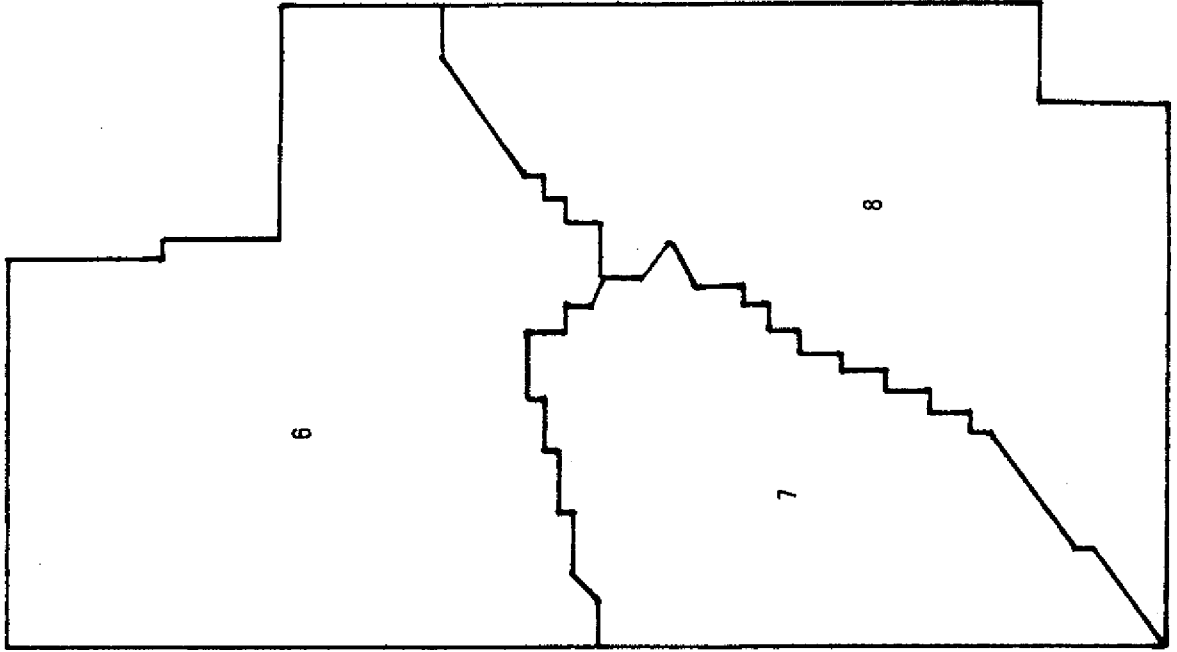


Fig. 5F--Enumeration District Outline

Poplarville

Fig. 7F--Population Heterogeneity Index

Poplarville

Low  
0-5.99  
.....  
.....  
.....  
.....

Low-Medium  
6-11.99  
+++++  
+++++  
+++++

High-Medium  
12-17.99  
XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
18+  
#####  
#####  
#####  
#####

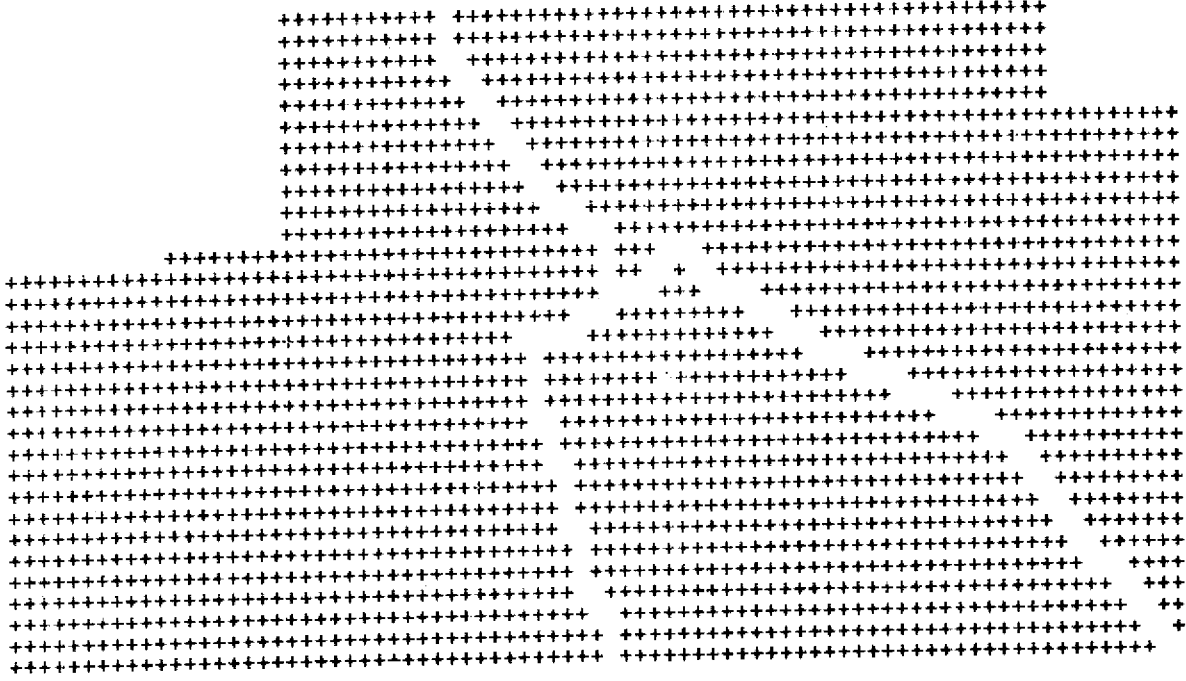


Fig. 8F--Quality Potential Index

Poplarville

.....  
.....  
.....  
.....  
.....  
Low  
0-29.99

++++++  
++++++  
++++++  
++++++  
++++++  
Low-Medium  
30-37.99

XXXXXXXXXX  
XXXXXXXXXX  
XXXXXXXXXX  
XXXXXXXXXX  
XXXXXXXXXX  
High-Medium  
38-45.99

#####  
#####  
#####  
#####  
#####  
High  
46+

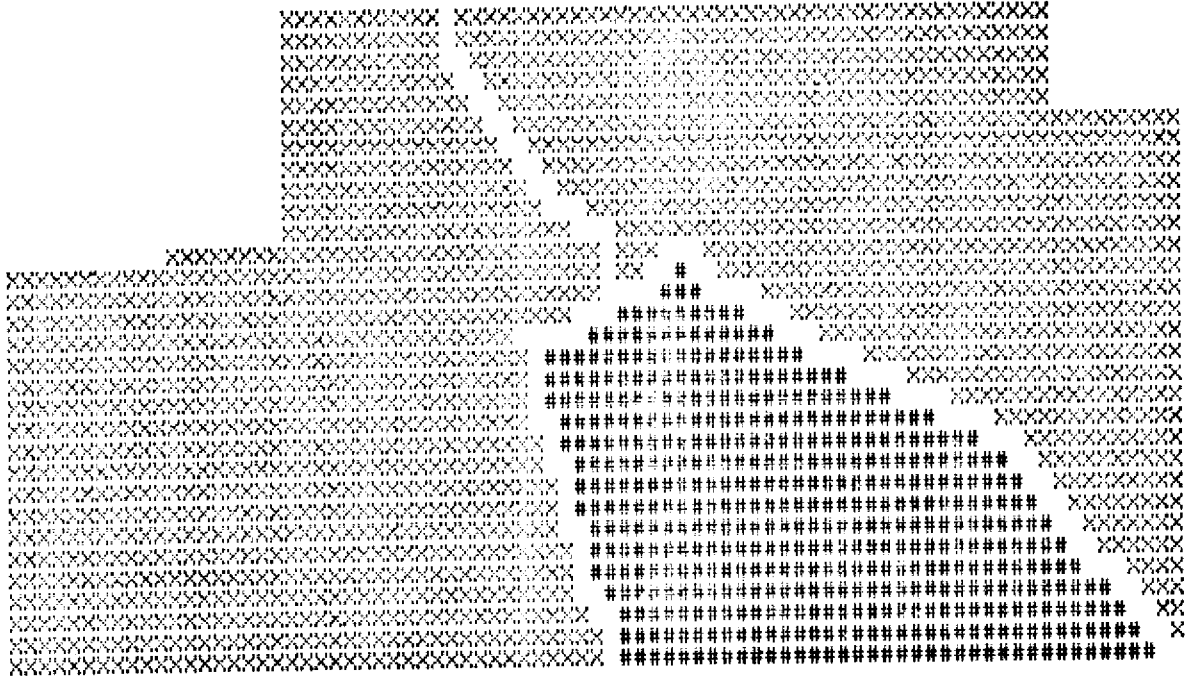




Fig. 9F--Dependency Index

Poplarville

.....  
 .....  
 .....  
 .....  
Low  
 0-19.99

+++++++  
 +++++++  
 +++++++  
 +++++++  
Low-Medium  
 20-24.99

XXXXXXXX  
 XXXXXXXX  
 XXXXXXXX  
 XXXXXXXX  
High-Medium  
 25-29.99

#####  
 #####  
 #####  
 #####  
High  
 30+

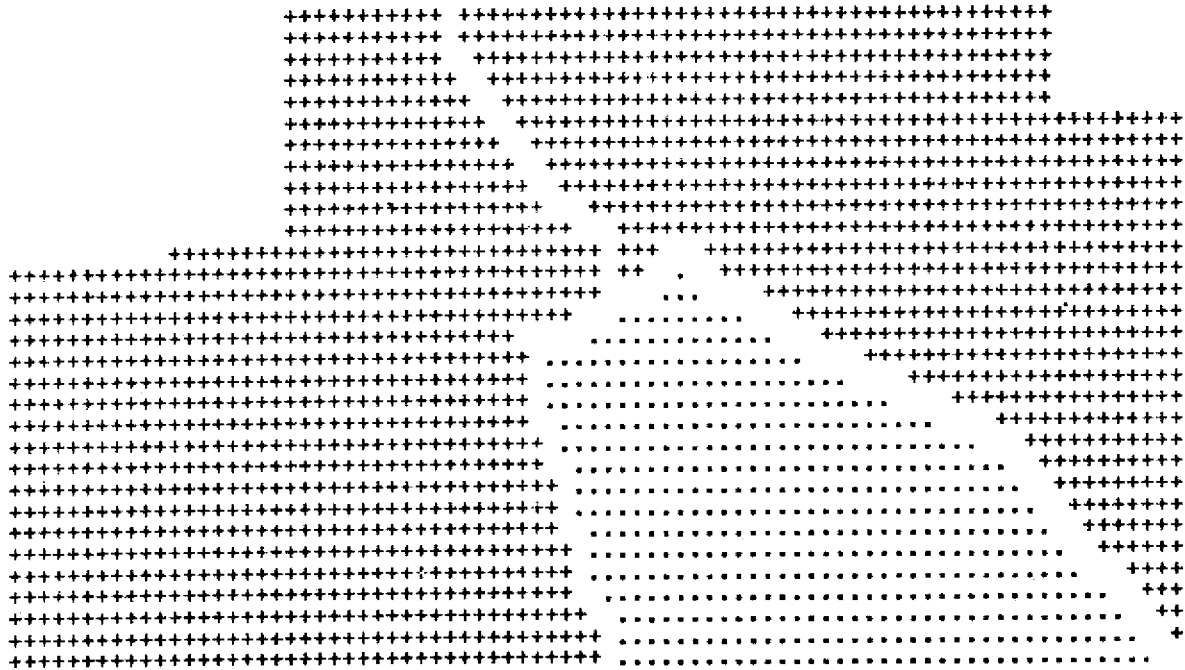
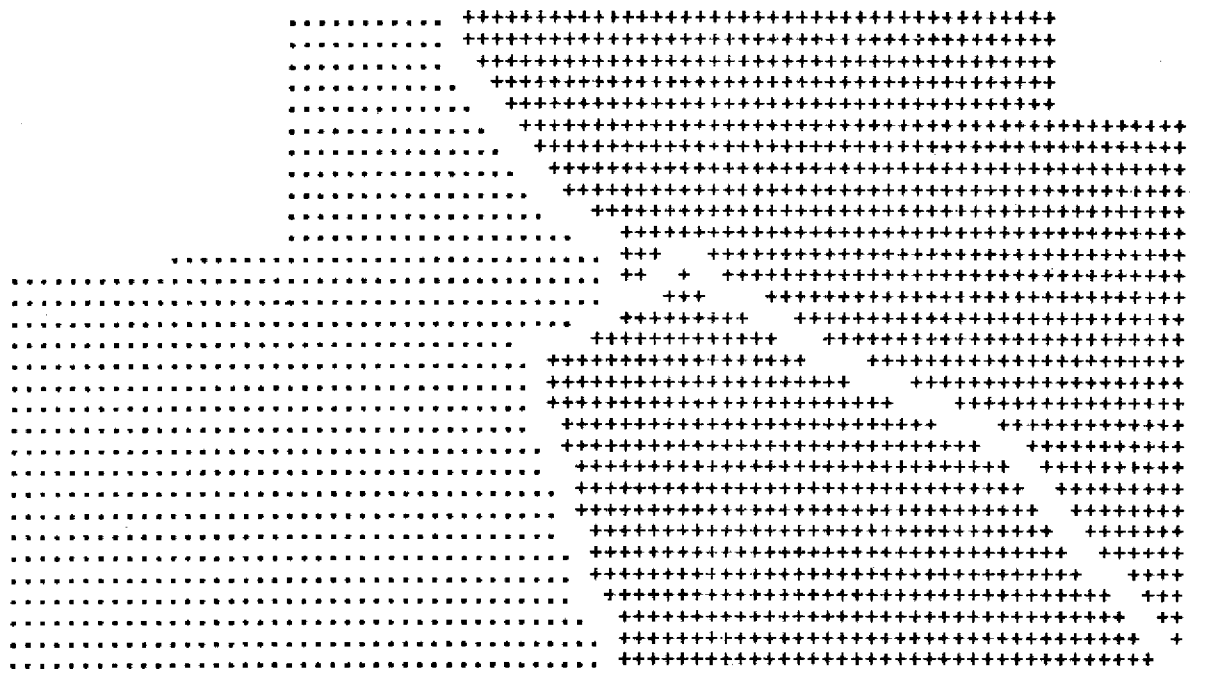


Fig. 10F--Famillism Index

Poplarville



Low  
0-39.99

Low-Medium  
40-47.99

High-Medium  
48-54.99

High  
55+

Fig. 11F--Social Disorganization Index

Poplarville

Low

0-9.99

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

Low-Medium

10-17.99

++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium

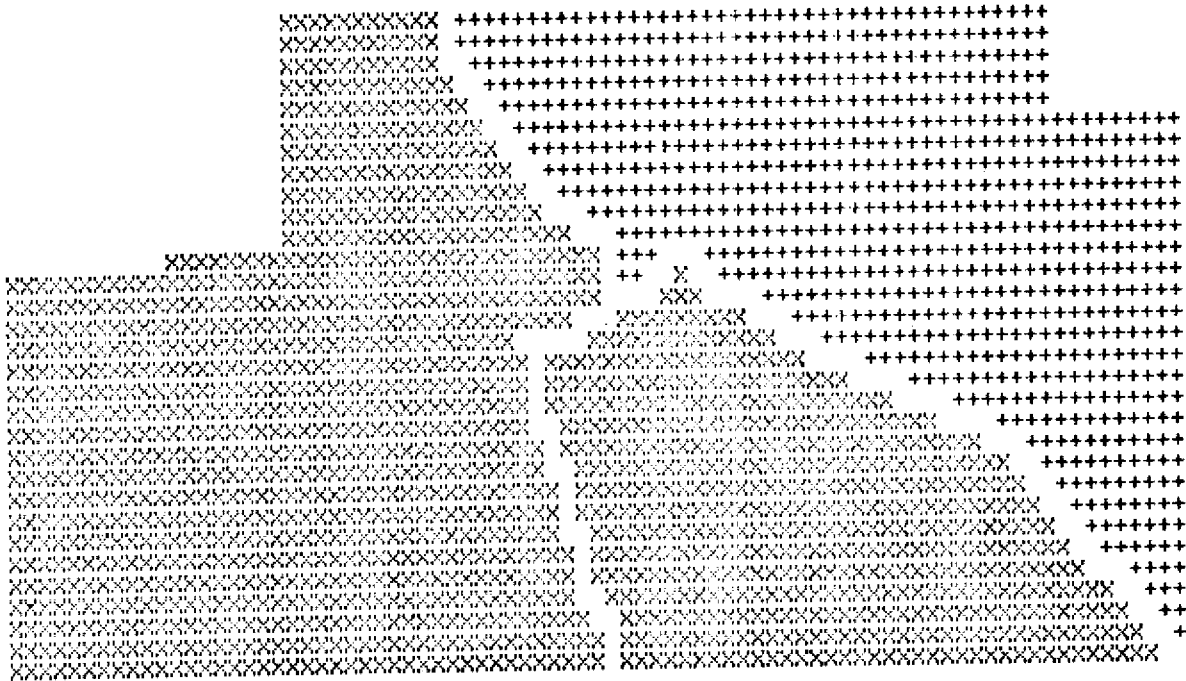
18-25.99

XXXXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

26+

#####  
 #####  
 #####  
 #####



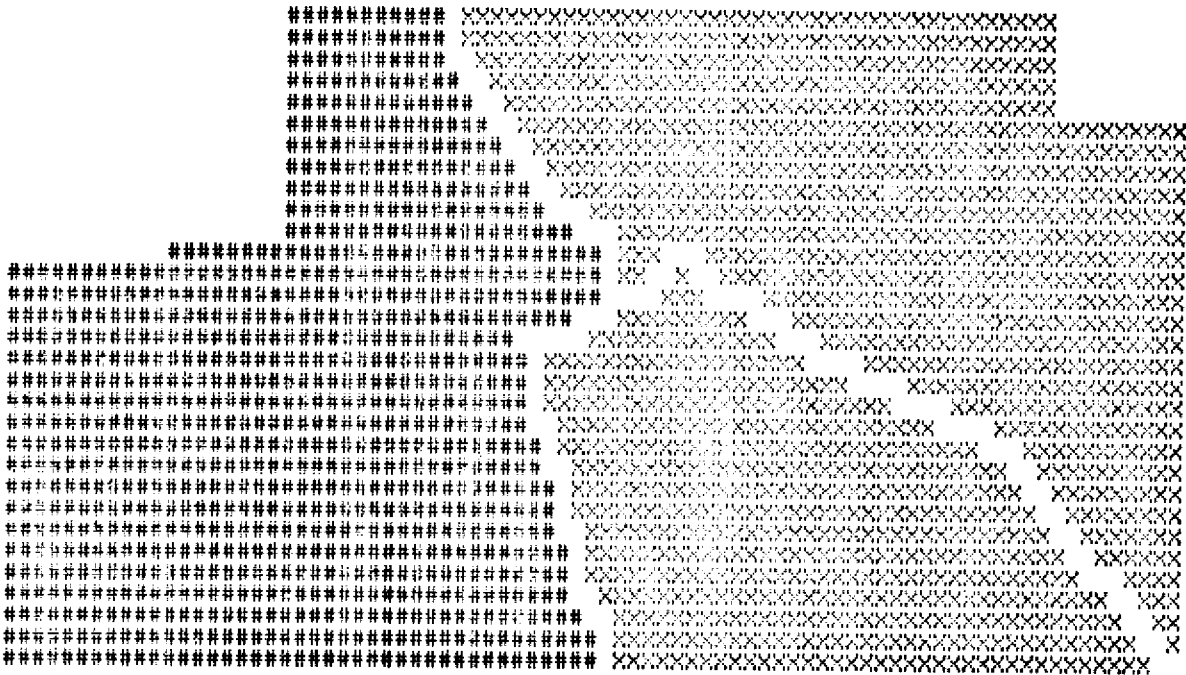
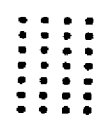


Fig. 12F--Labor Force Index

Poplarville

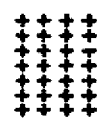
Low

0-33.99



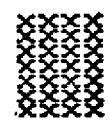
Low-Medium

34-39.99



High-Medium

40-47.99



High

48+

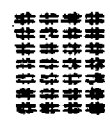


Fig. 13F--Industrial Lag Index

Poplarville

Low  
0-3.99  
.....  
.....  
.....  
.....

Low-Medium  
4-6.99  
++++++  
++++++  
++++++  
++++++

High-Medium  
7-13.99  
XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
14+  
#####  
#####  
#####  
#####

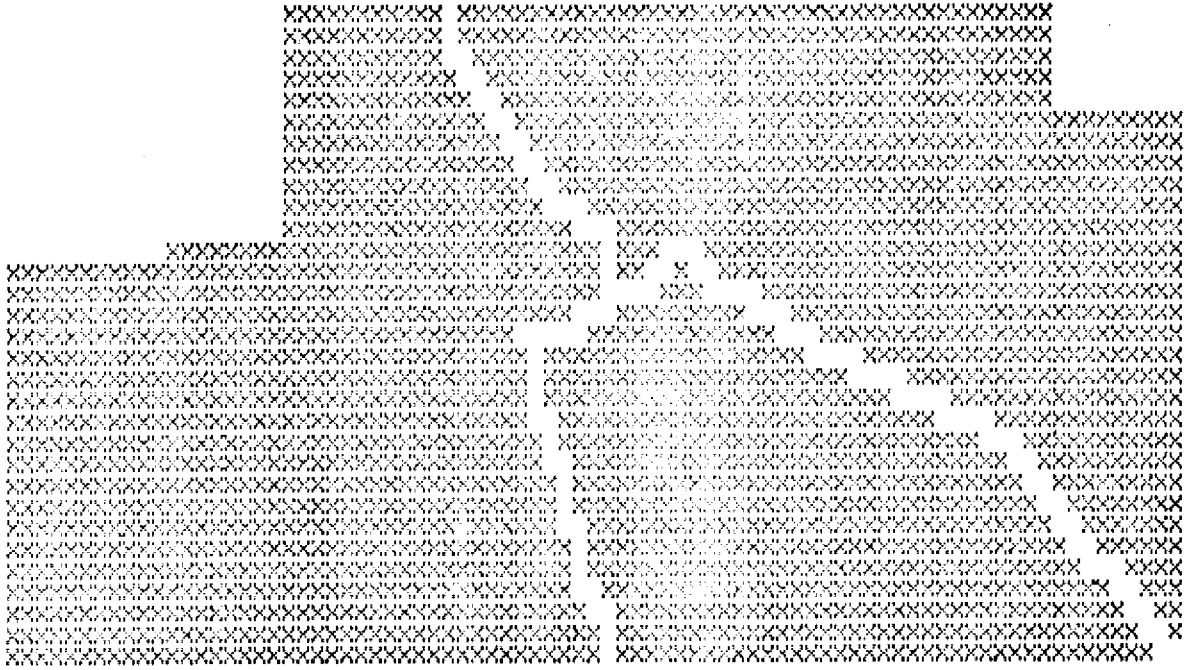


Fig. 14f--Poverty Index  
Poplarville

Low  
0-5.99

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

Low-Medium  
6-14.99

++++++  
++++++  
++++++  
++++++

High-Medium  
15-24.99

XXXXXXXX  
XXXXXXXX  
XXXXXXXX  
XXXXXXXX

High  
25+

#####  
#####  
#####  
#####

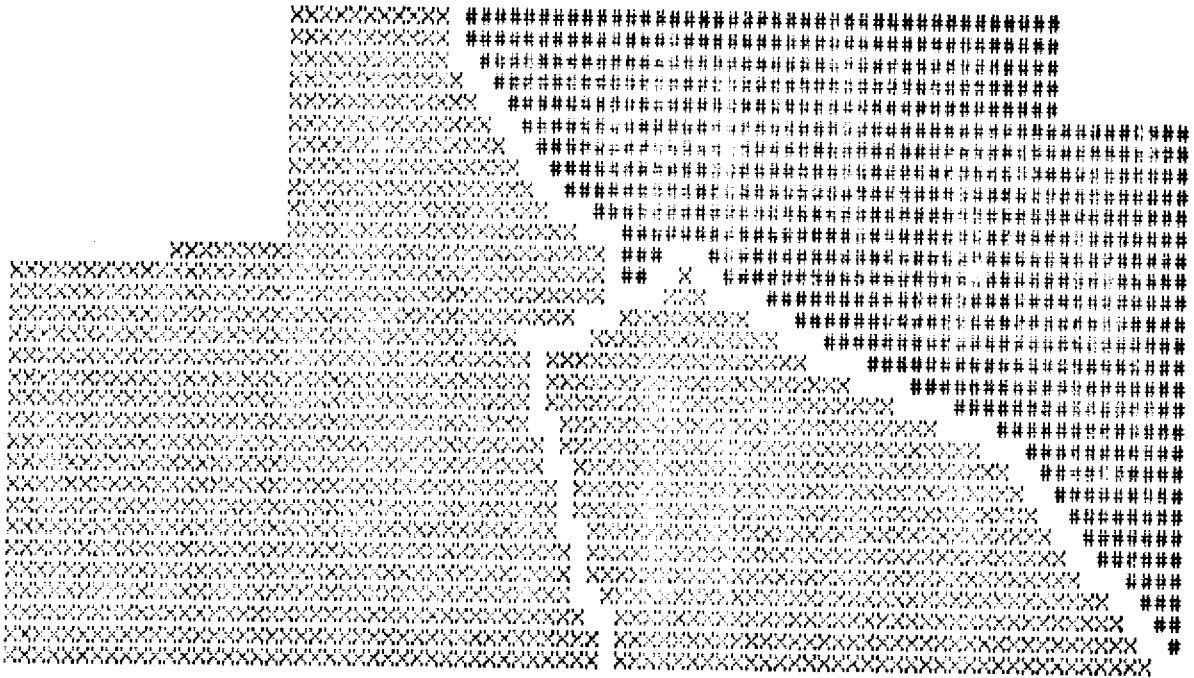


Fig. 15F--Housing Affluence Index

Poplarville

Low  
 0-14.99  
 .....  
 .....  
 .....  
 .....  
 .....

Low-Medium  
 15-29.99  
 ++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium  
 30-39.99  
 XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High  
 40+  
 #####  
 #####  
 #####  
 #####  
 #####

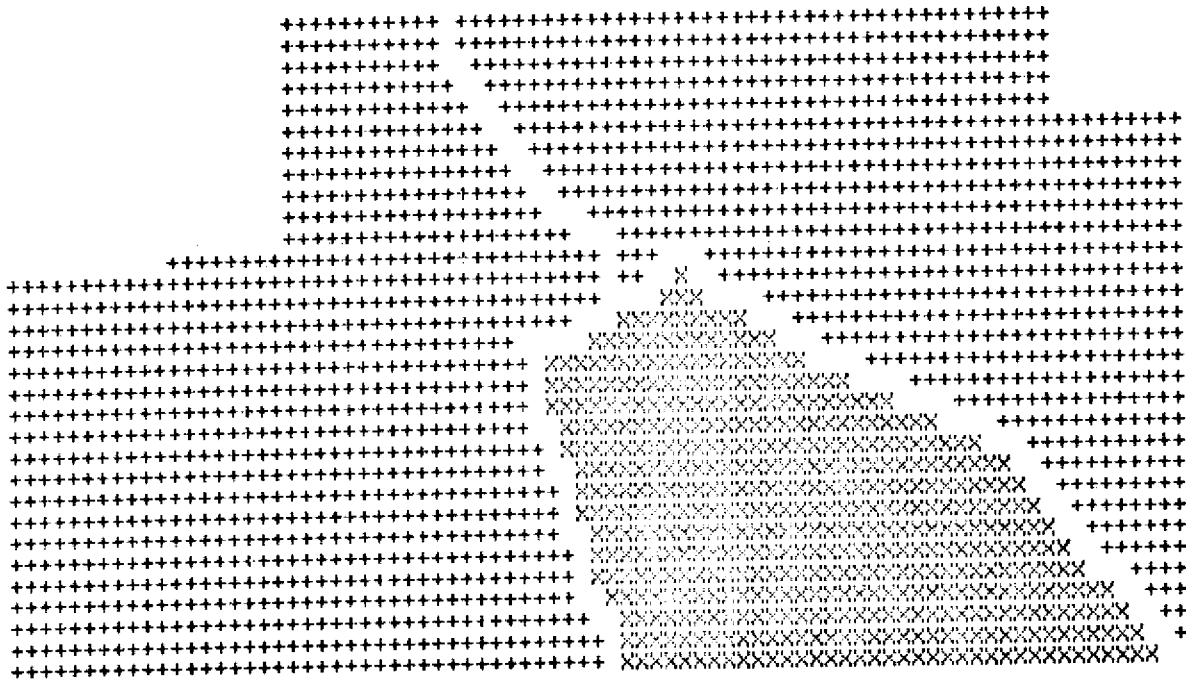


Fig. 16F--Housing Inadequacy Index

Poplarville

Low  
0-1.99

Low-Medium  
2-4.99

High-Medium  
5-9.99

High  
10+

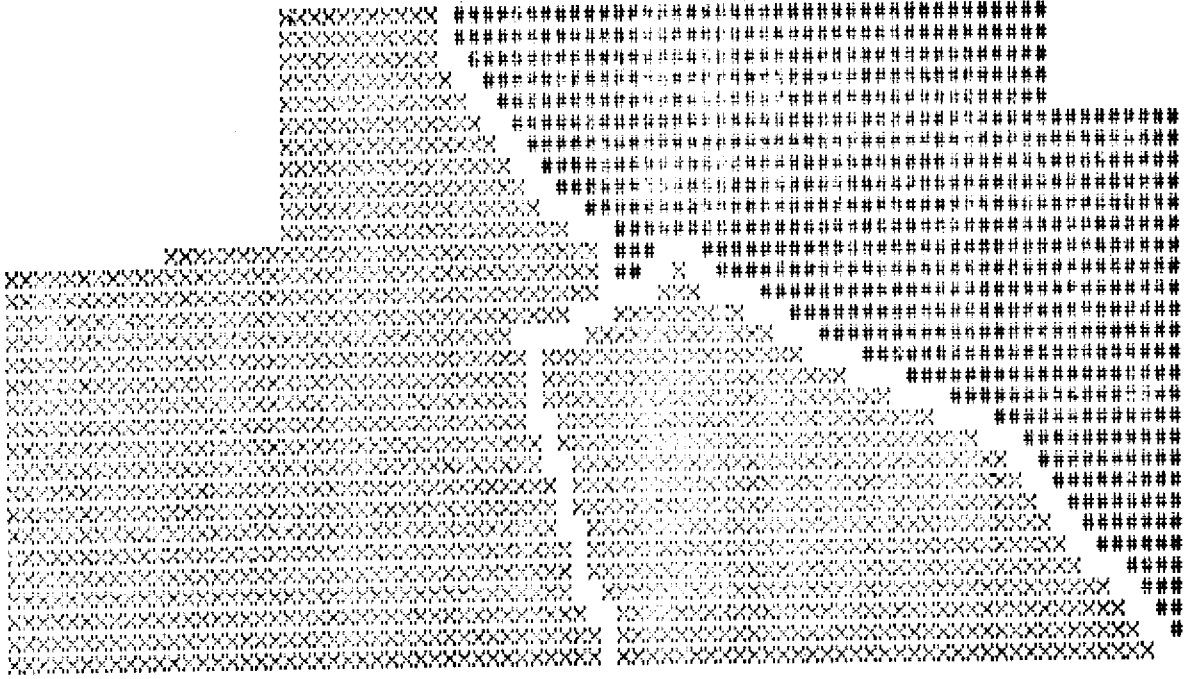
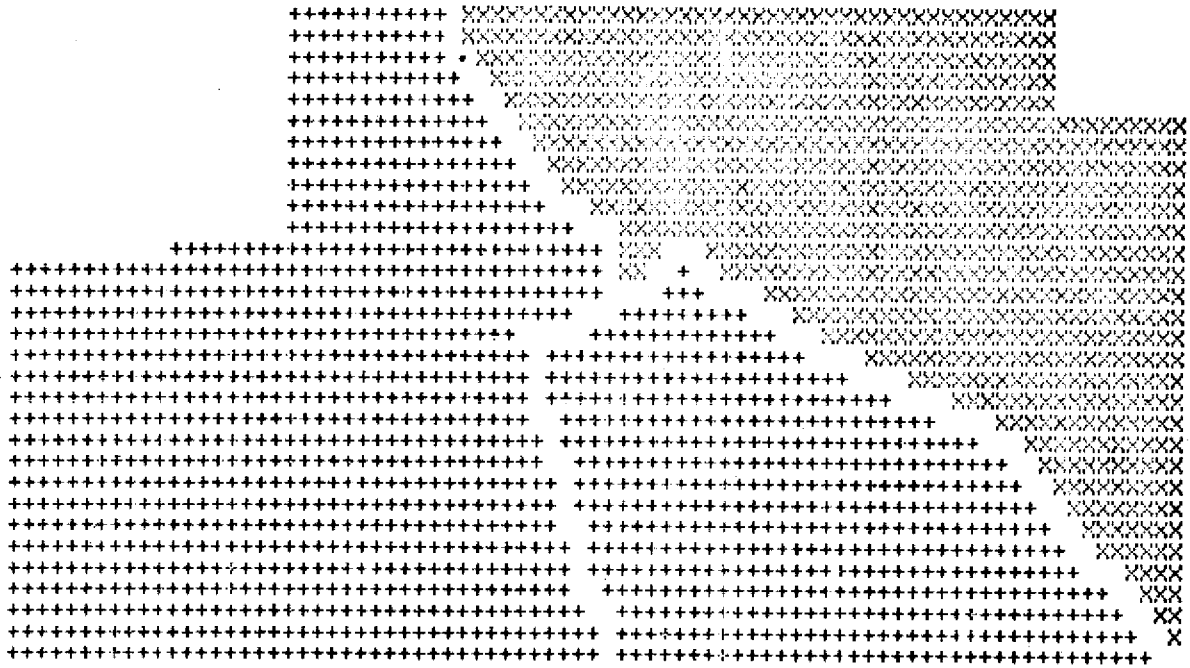




Fig. 17F--Incipient Housing Demand Index



Poplarville

Low  
0-24.99

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

Low-Medium  
25-39.99

++++++  
++++++  
++++++  
++++++

High-Medium  
40-54.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
55+

#####  
#####  
#####  
#####



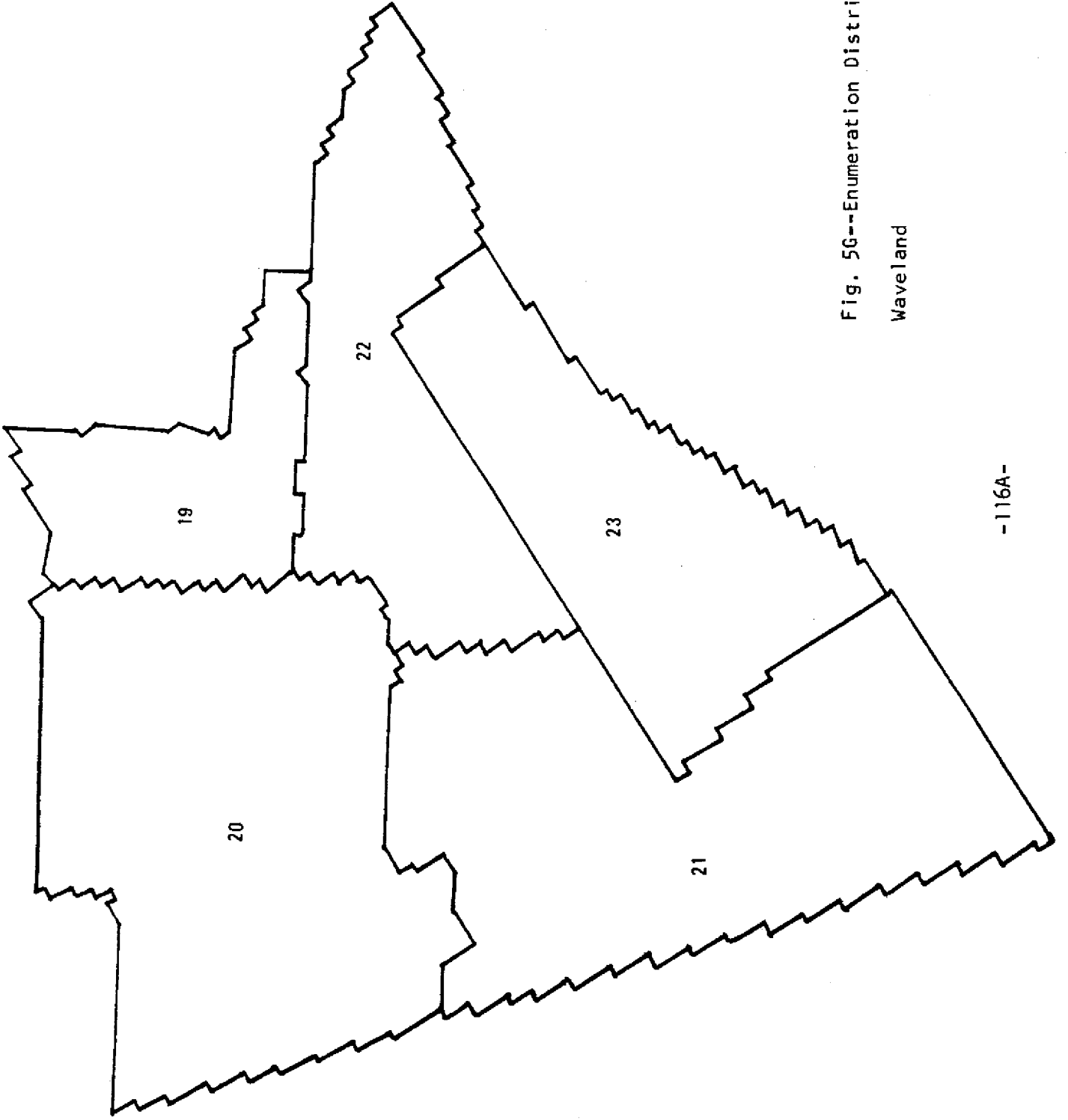


Fig. 5G--Enumeration District Outline  
Waveland







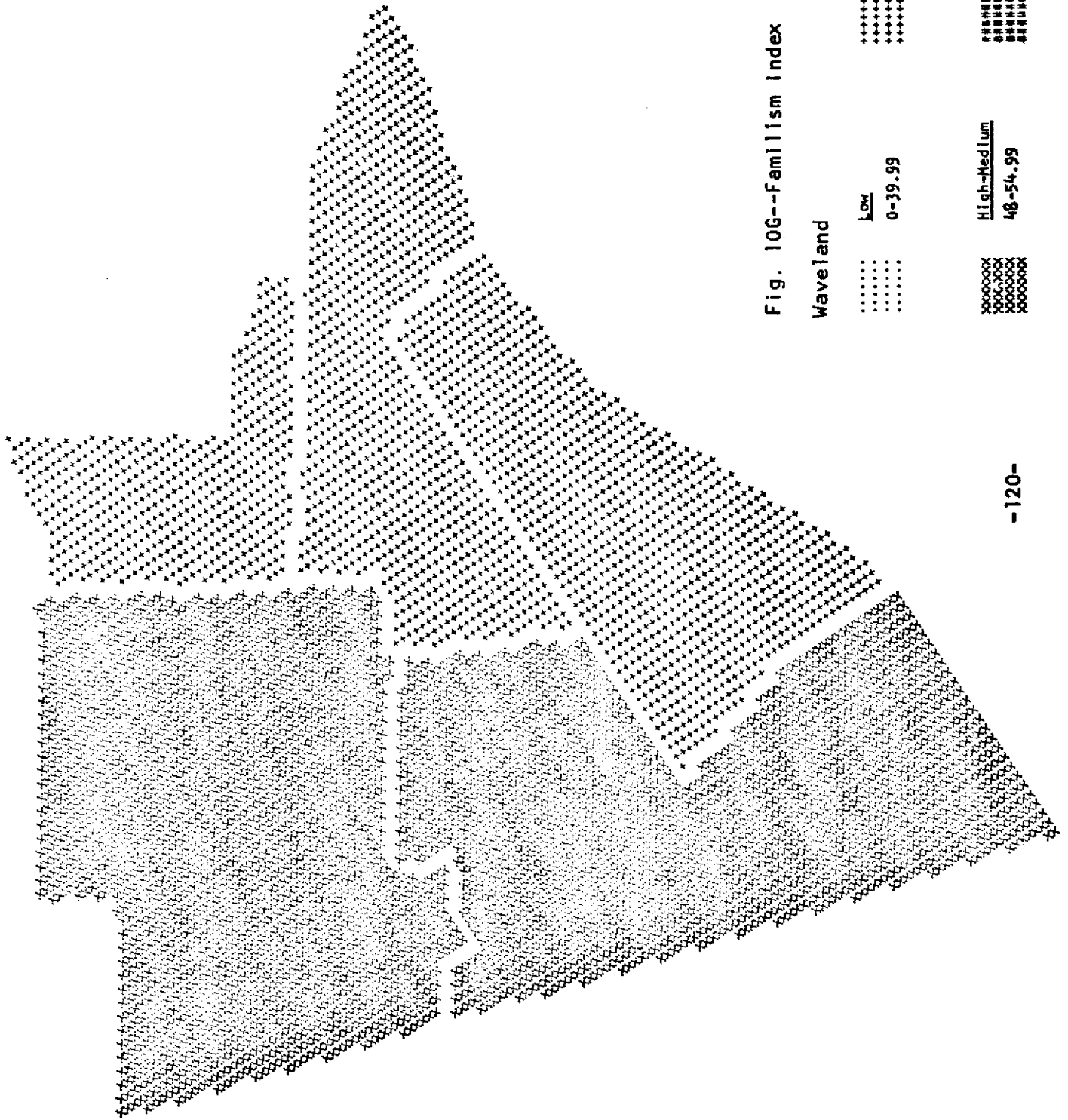


Fig. 10G--FamIism Index

Wave land

..... Low .....  
 ..... 0-39.99 .....  
 ..... Low-Medium .....  
 ..... 40-47.99 .....

XXXXXXXX High-Medium .....  
 XXXXXXXX 48-54.99 .....  
 XXXXXXXX .....  
 XXXXXXXX High .....  
 XXXXXXXX 55+ .....

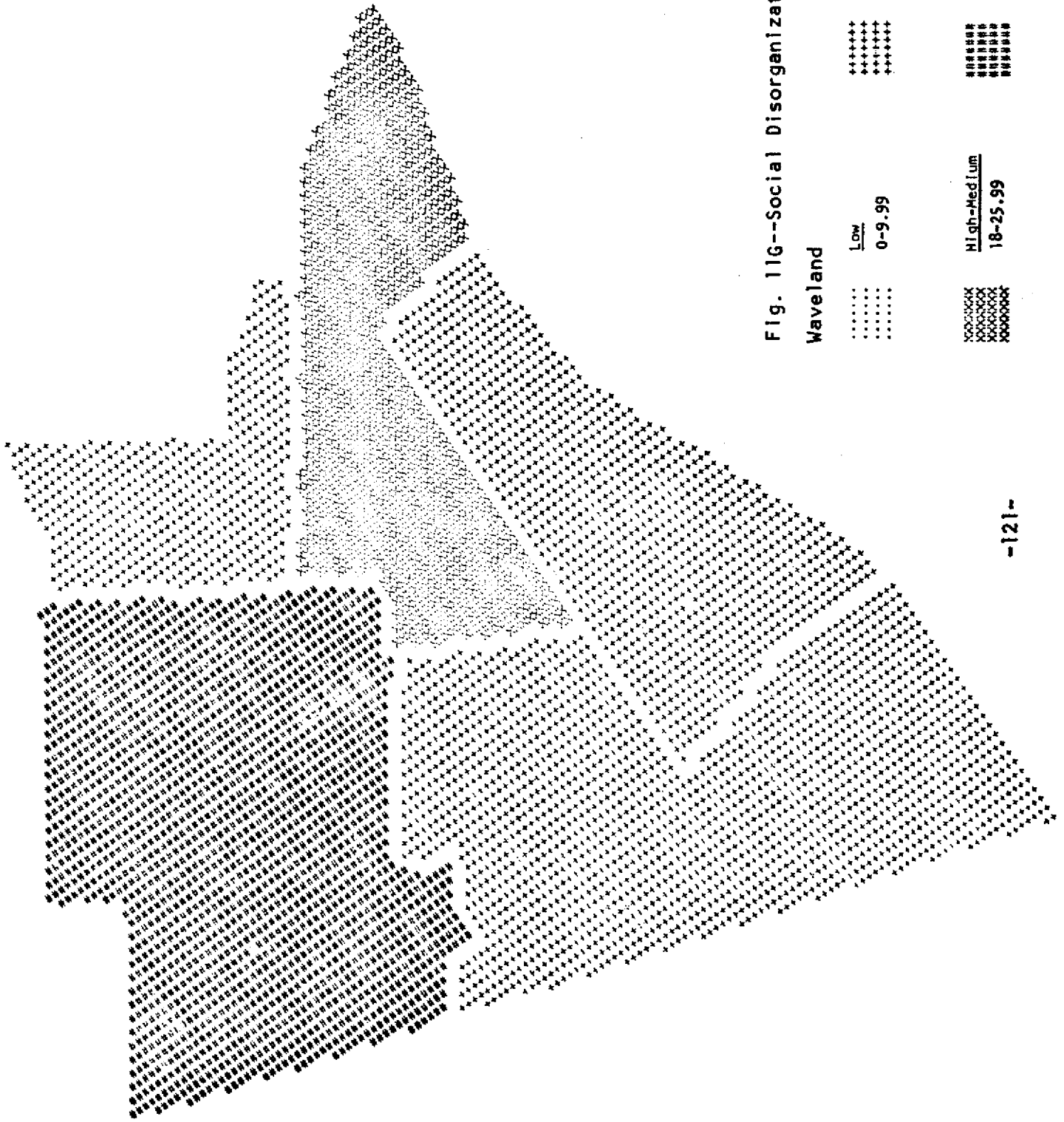


Fig. 11G--Social Disorganization Index

Waveband

..... Low  
 0-9.99

+++++++ Low-Medium  
 10-17.99

XXXXXXXX High-Medium  
 18-25.99

##### High  
 26+



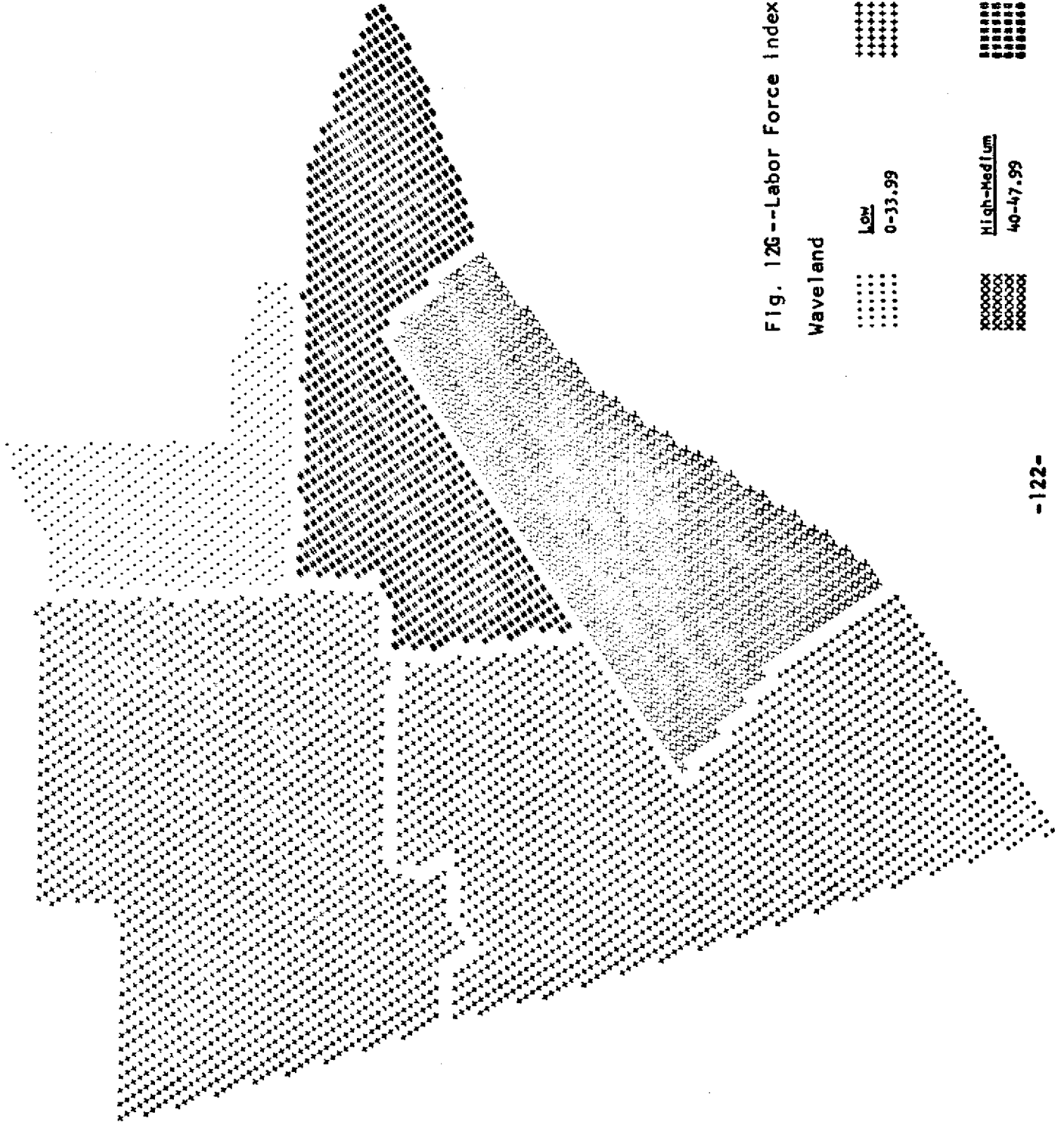


Fig. 126--Labor Force Index

Wave land

.....	<u>Low</u>	+++++	<u>Low-Medium</u>
.....	0-33.99	+++++	34-39.99
.....		+++++	
XXXXXXXX	<u>High-Medium</u>	XXXXXX	<u>High</u>
XXXXXXXX	40-47.99	XXXXXX	48+
XXXXXXXX		XXXXXX	
XXXXXXXX		XXXXXX	









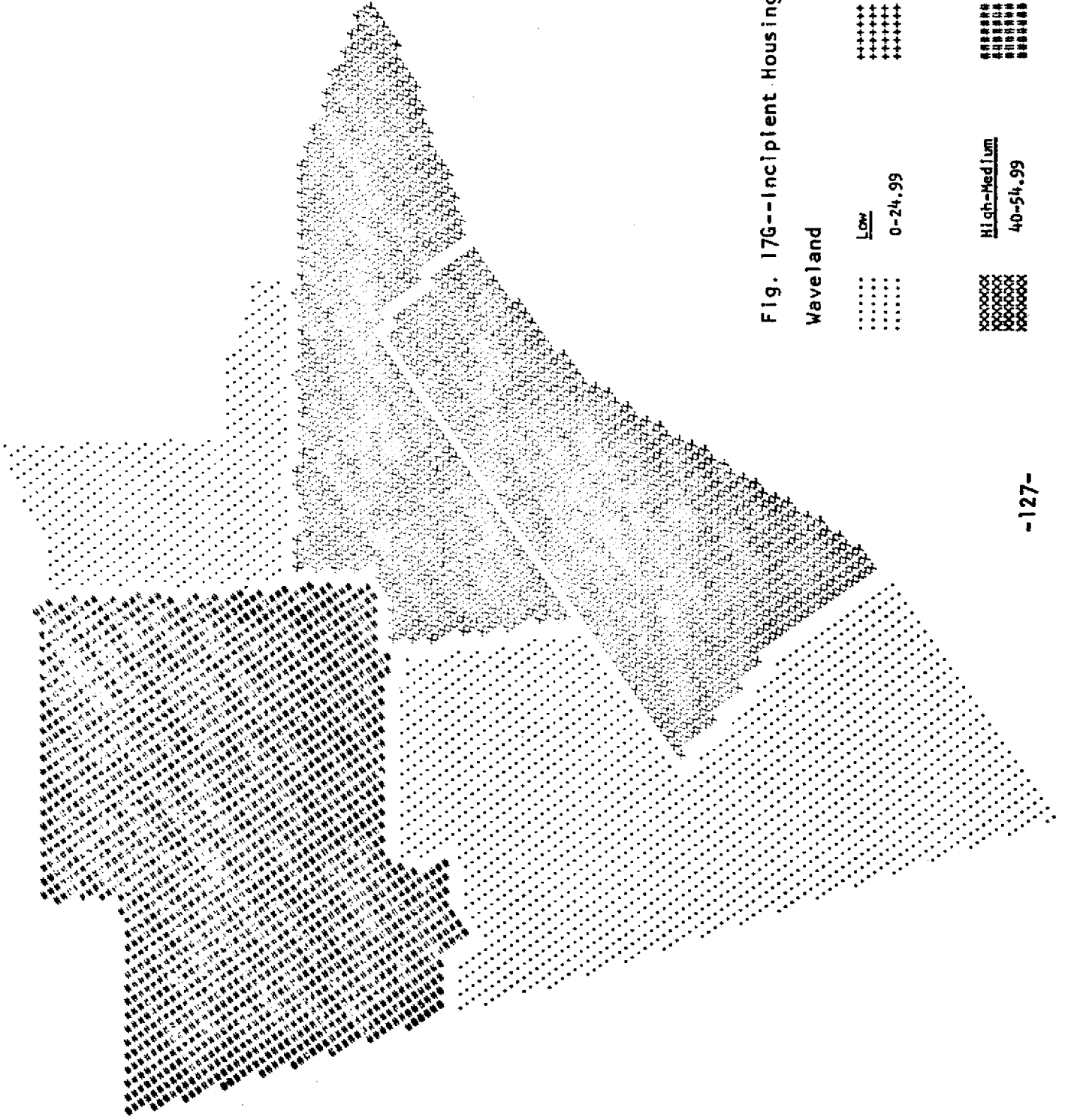


Fig. 17G--Incipient Housing Demand Index

Waveband

.....	<u>Low</u>	+++++	<u>Low-Medium</u>
.....	0-24.99	+++++	25-39.99
XXXXXX	<u>High-Medium</u>	XXXXXX	<u>High</u>
XXXXXX	40-54.99	XXXXXX	55+

Fig. 6H--Population Stability Index

Wiggins

Low  
0-16.99

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

Low-Medium  
17-33.99

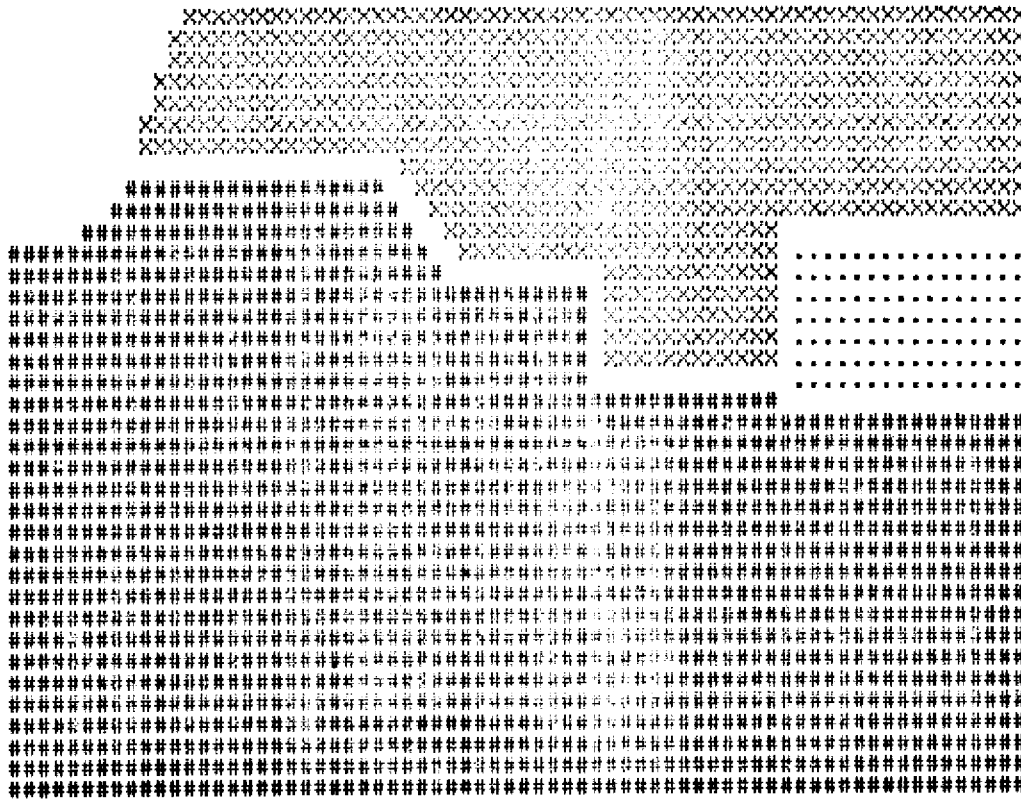
++++++  
++++++  
++++++  
++++++

High-Medium  
34-50.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
51+

#####  
#####  
#####  
#####



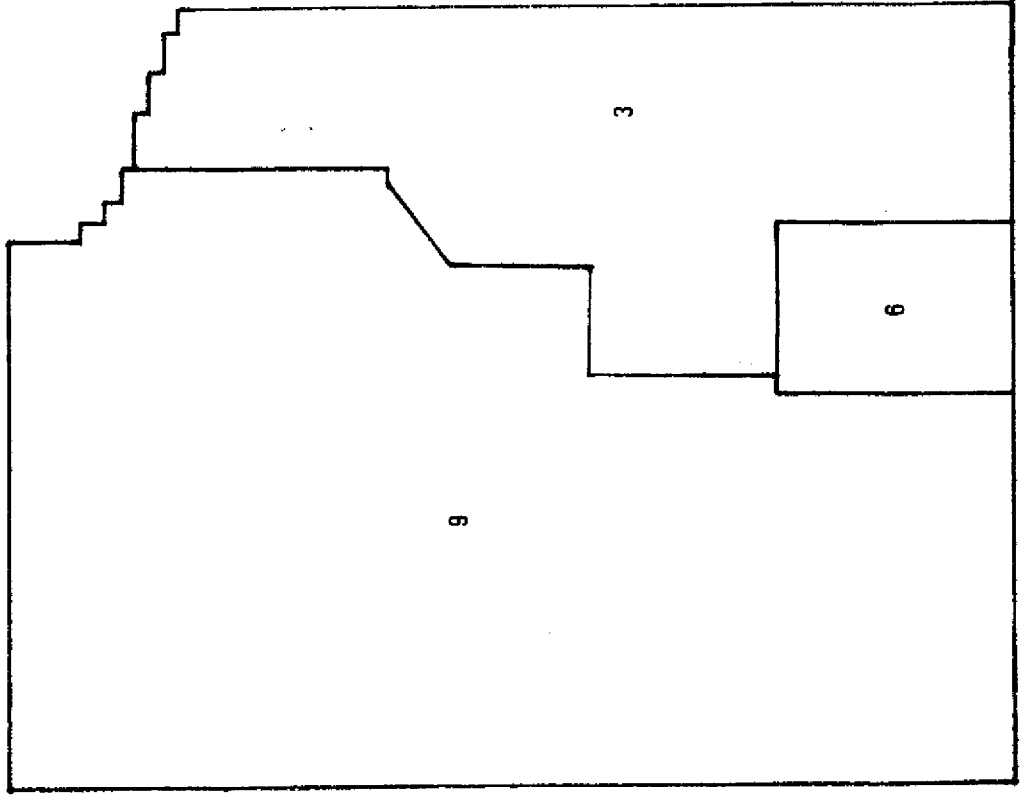
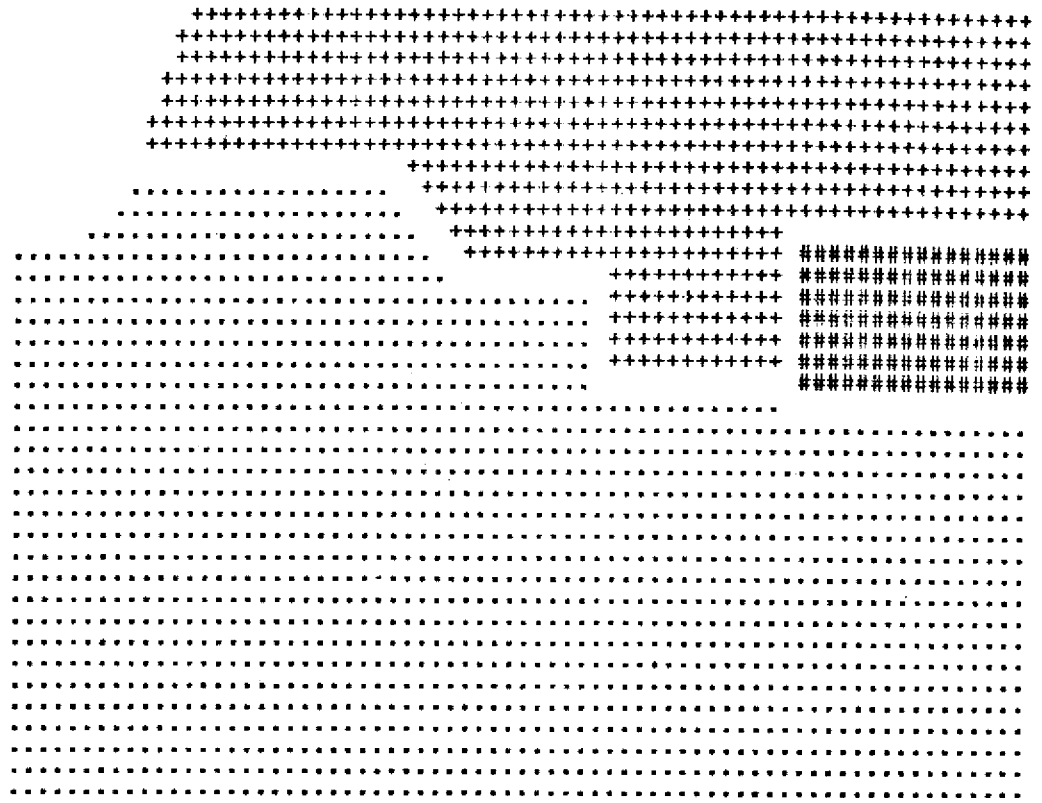


Fig. 5H--Enumeration District Outline  
Wiggins



Fig. 7H--Population Heterogeneity Index



Wiggins

.....  
Low  
 0-5.99

+++++  
Low-Medium  
 6-11.99

XXXXX  
High-Medium  
 12-17.99

#####  
High  
 18+

Fig. 8H--Quality Potential Index

Wiggins

Low  
0-29.99

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

Low-Med Lum  
30-37.99

++++++  
++++++  
++++++  
++++++

High-Med Lum  
38-45.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX

High  
46+

#####  
#####  
#####  
#####

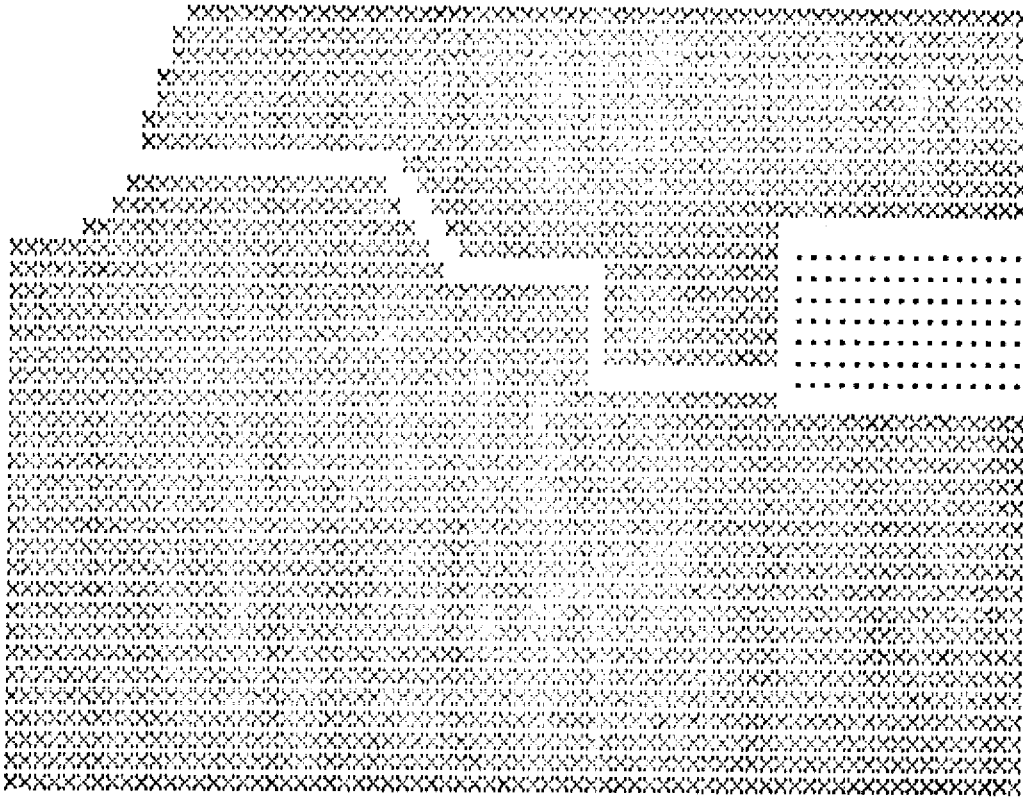


Fig. 9H--Dependency Index

Wiggins

Low

0-19.99

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

Low-Medium

20-24.99

++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium

25-29.99

XXXXXXXX  
 XXXXXXXX  
 XXXXXXXX  
 XXXXXXXX

High

30+

#####  
 #####  
 #####  
 #####

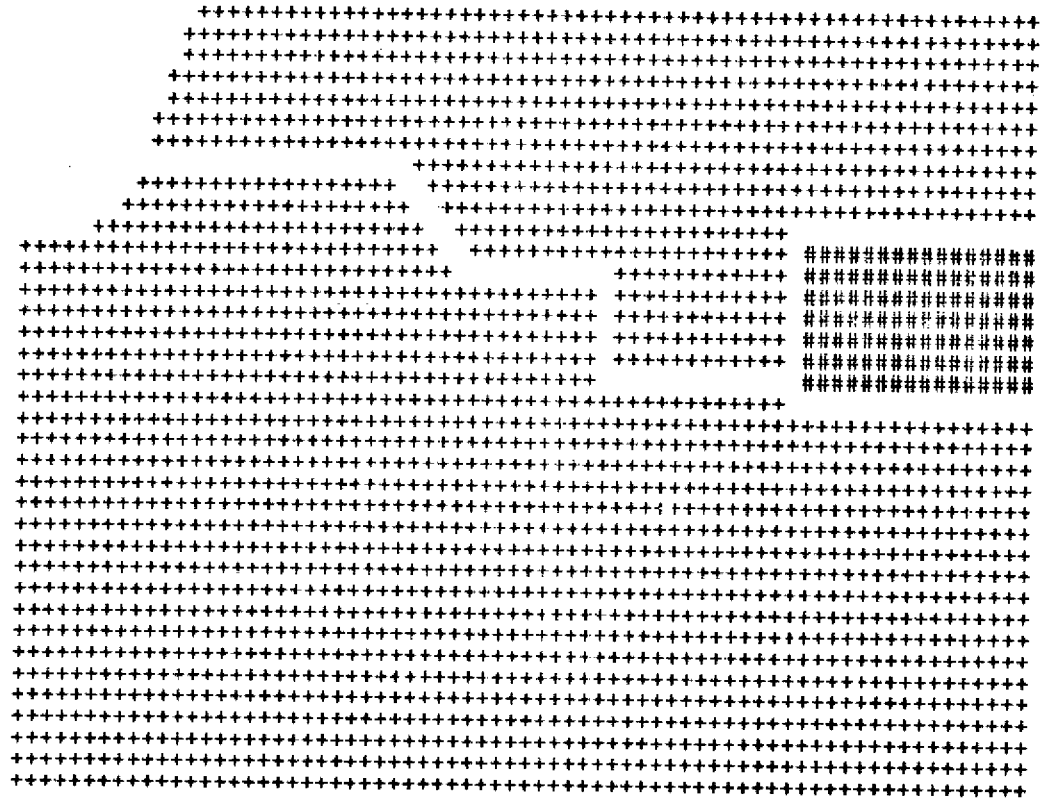


Fig. 10H--Famillism Index

Wiggins

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

Low  
 0-39.99

+++++  
 +++++  
 +++++  
 +++++

Low-Medium  
 40-47.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High-Medium  
 48-54.99

#####  
 #####  
 #####  
 #####

High  
 55+

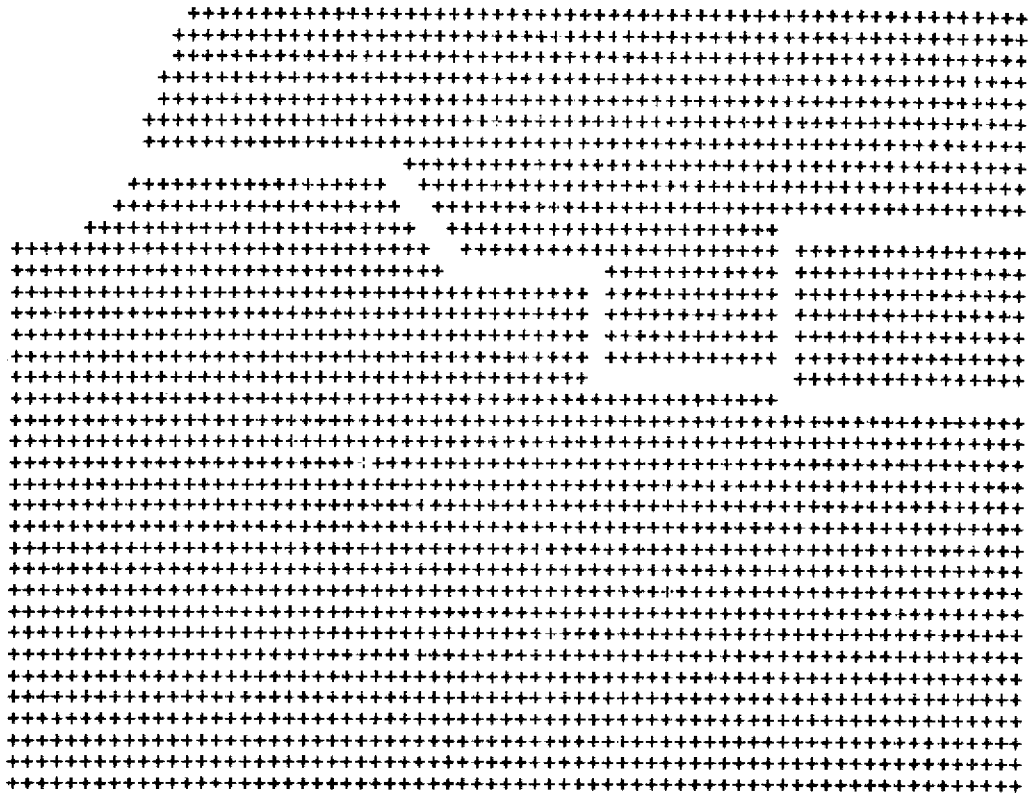
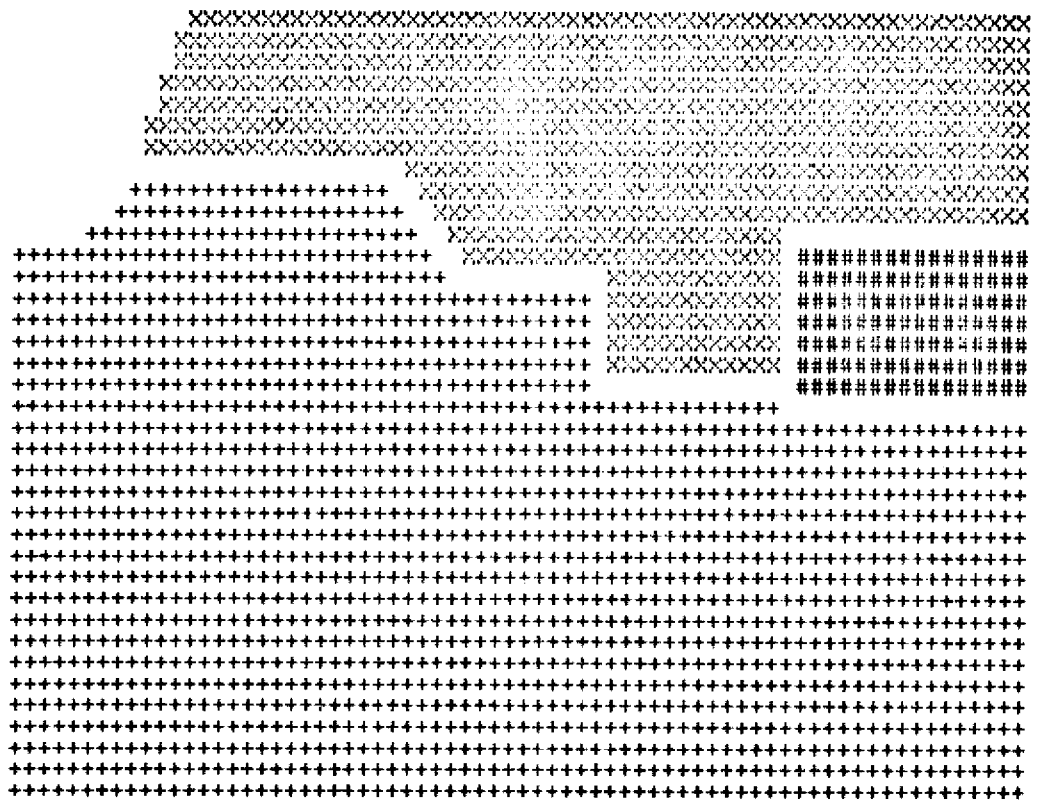


Fig. 11H--Social Disorganization Index



Wiggins

LOW  
 0-9.99

Low-Medium  
 10-17.99

High-Medium  
 18-25.99

High  
 26+

Fig. 12H--Labor Force Index

Wiggins

.....  
.....  
.....  
.....  
.....  
LOW  
0-33.99

++++++  
++++++  
++++++  
++++++  
Low-Medium  
34-39.99

XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX  
XXXXXX  
High-Medium  
40-47.99

#####  
#####  
#####  
#####  
#####  
High  
48+

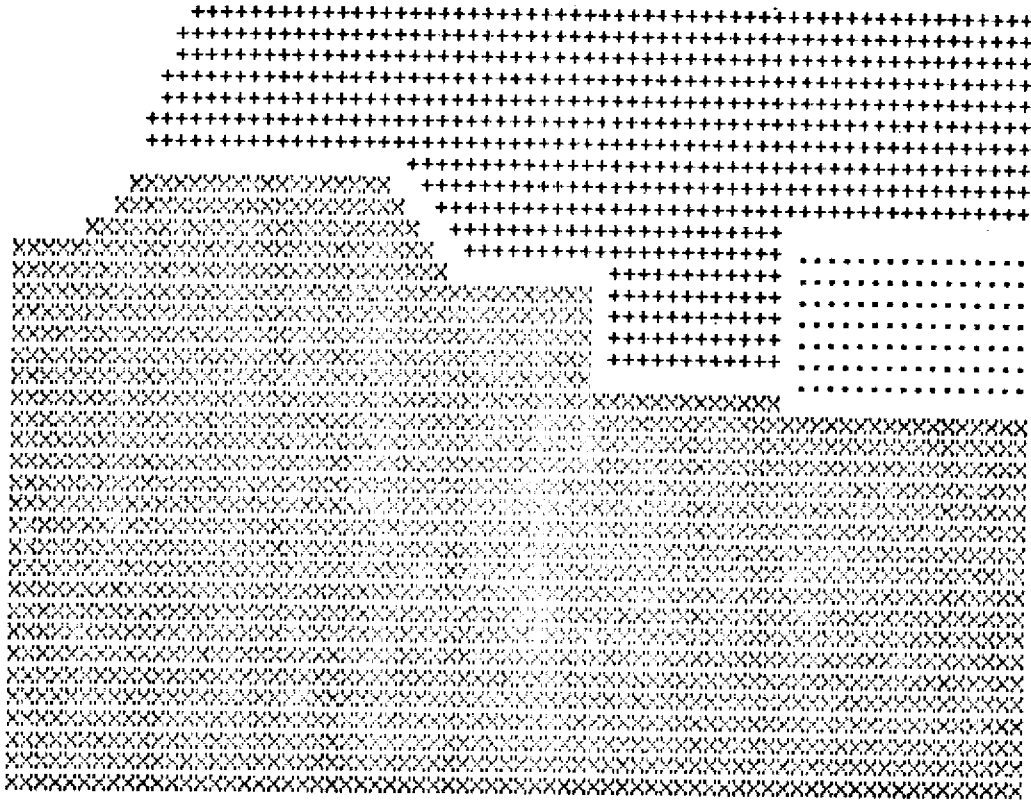


Fig. 13H--Industrial Lag Index

Wiggins

Low  
0-3.99

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

Low-Medium  
4-6.99

++++++  
++++++  
++++++

High-Medium  
7-13.99

XXXXXX  
XXXXXX  
XXXXXX

High  
14+

#####  
#####  
#####

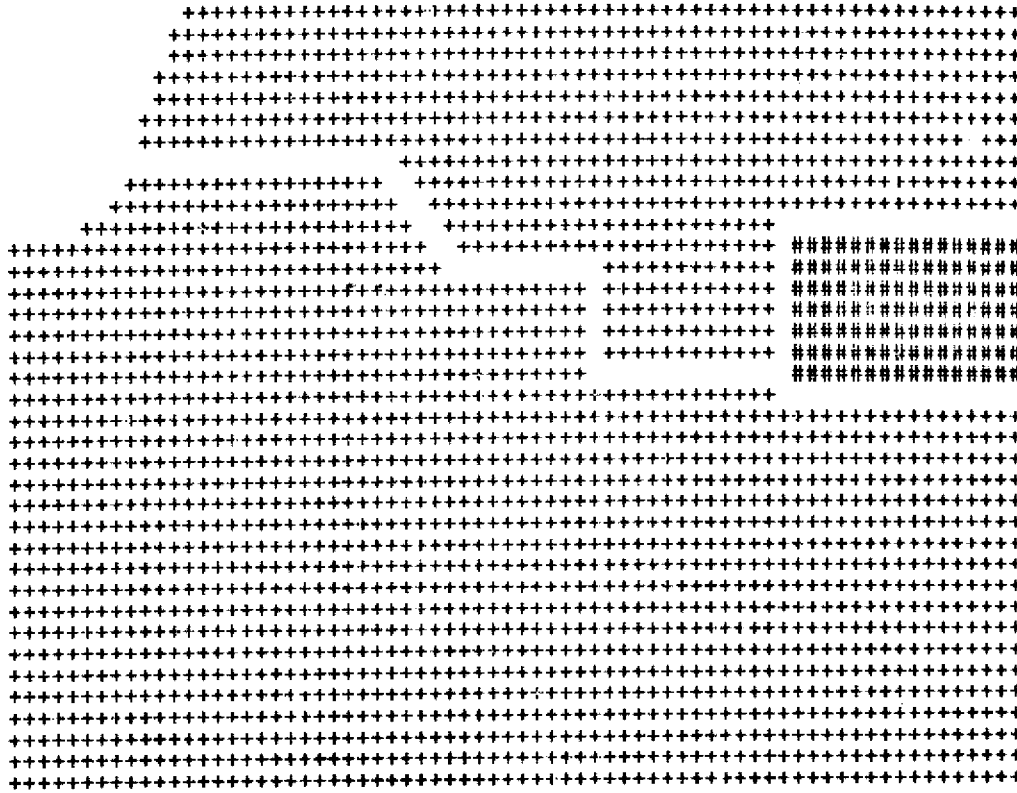


Fig. 14H--Poverty Index

Wiggins

Low

0-5.99

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

Low-Medium

6-14.99

++++++  
 ++++  
 ++++  
 ++++

High-Medium

15-24.99

XXXXXXXXXX  
 XXXXXXXX  
 XXXXXXXX  
 XXXXXXXX

High

25+

#####  
 #####  
 #####  
 #####

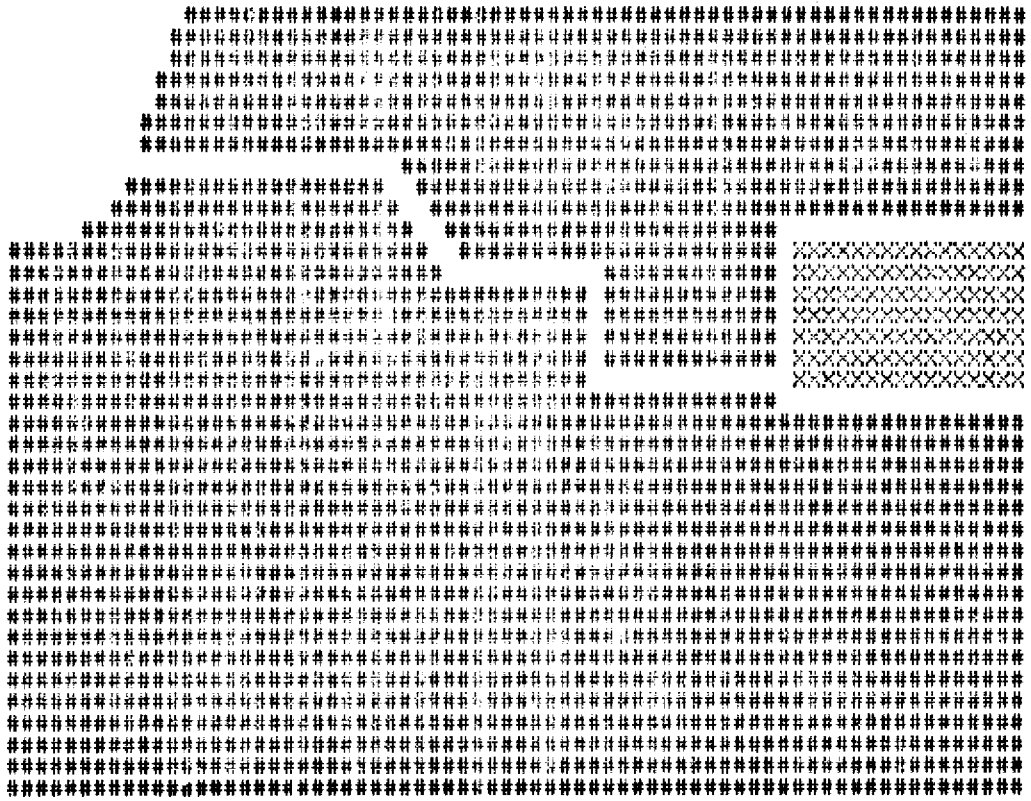




Fig. 15H--Housing Affluence Index

Wiggins

Low

0-14.99

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

Low-Medium

15-29.99

+++++  
 +++++  
 +++++  
 +++++

High-Medium

30-39.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

40+

#####  
 #####  
 #####  
 #####

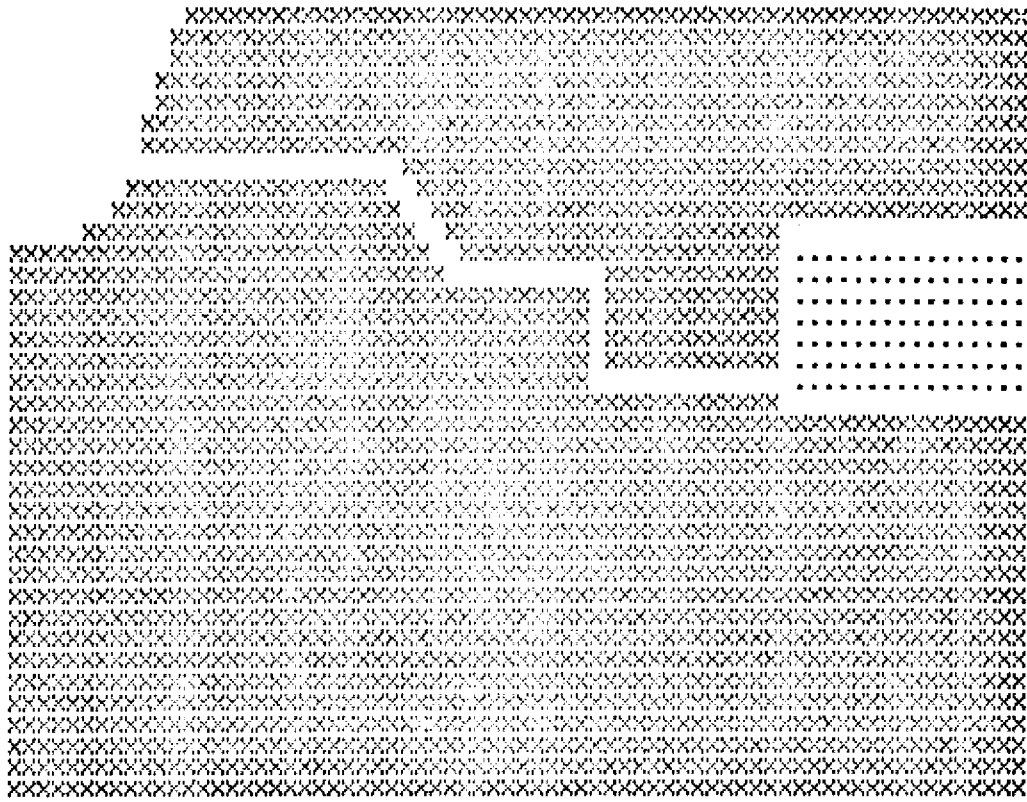


Fig. 16H--Housing Inadequacy Index

Wiggins

Low

0-1.99

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

Low-Medium

2-4.99

++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium

5-9.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

10+

#####  
 #####  
 #####  
 #####

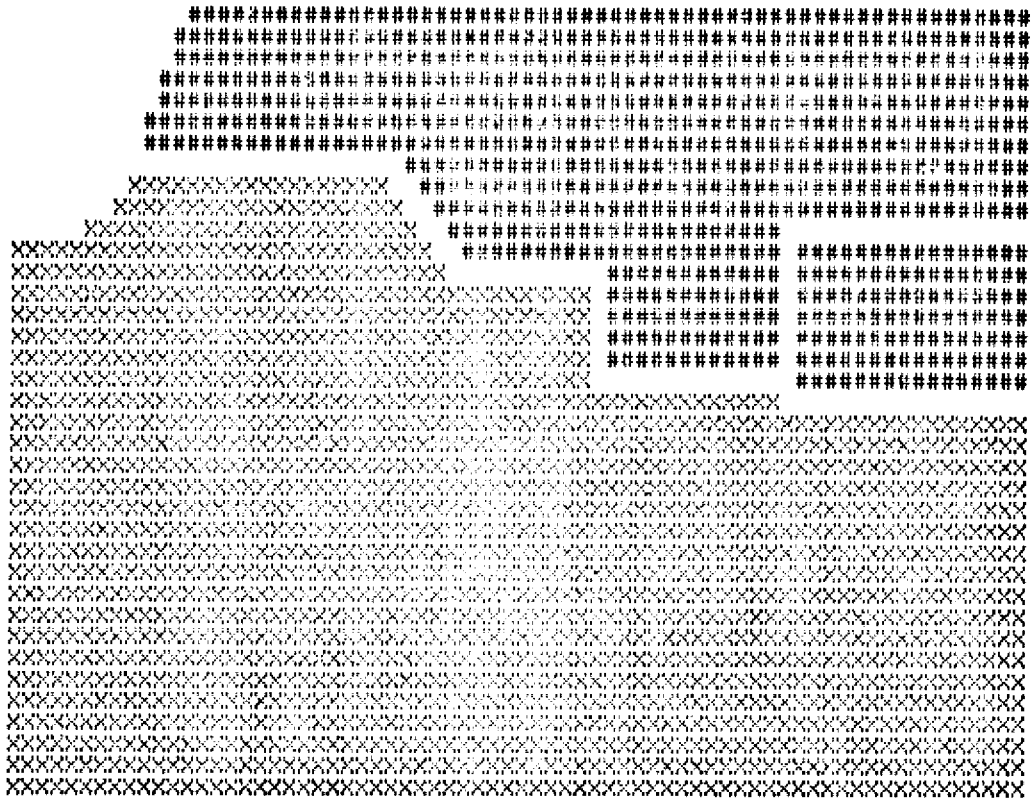


Fig. 17H--Incipient Housing Demand Index

Wiggins

Low

0-24.99

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

Low-Medium

25-39.99

++++++  
 ++++++  
 ++++++  
 ++++++

High-Medium

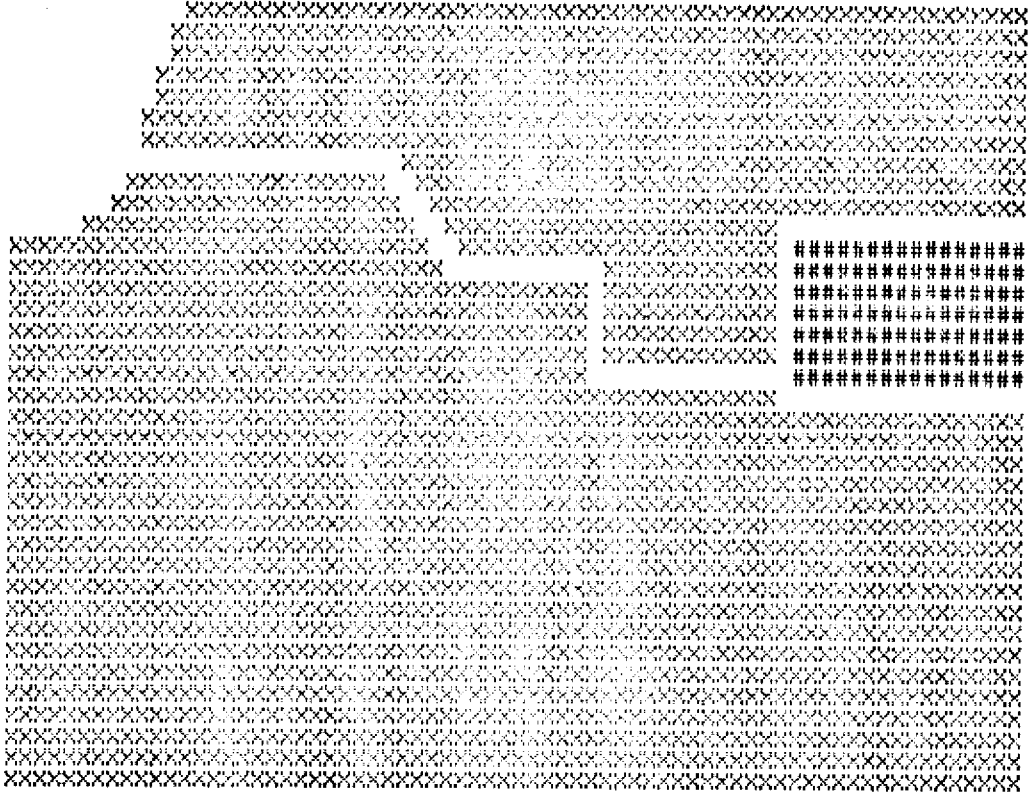
40-54.99

XXXXXX  
 XXXXXX  
 XXXXXX  
 XXXXXX

High

55+

#####  
 #####  
 #####  
 #####  
 #####



#####  
 #####  
 #####  
 #####  
 #####  
 #####