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THE UNIVERSITY OF OKLAHOMA

GRADUATE COLLEGE

THE MUNICIPAL ENCLAVES OF OKLAHOMA CITY: AN ANALYSIS
OF THEIR FUNCTIONAL RELATIONSHIP TO OKLAHOMA CITY

A DISSERTATION

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degree of

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BY

GARY THOMAS WHITEFORD

Norman, Oklahoma

1972

THE MUNICIPAL ENCLAVES OF OKLAHOMA CITY: AN ANALYSIS
OF THEIR FUNCTIONAL RELATIONSHIP TO OKLAHOMA CITY

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CHAPTER I

INTRODUCTION

This study is an attempt to gain insight into the importance of small political entities operating in a spatially confined environment within a larger municipality. The specific areas under scrutiny are the eleven incorporated and seven unincorporated enclaves within the municipal limits of Oklahoma City, Oklahoma. The research objectives are to determine the spatial and socio-economic-political character of these associated political units, and to examine their relationship to the larger, engulfing city. The anticipated result is a greater understanding of the functioning of the enclaves and of their importance within the Oklahoma City metropolitan area. It is hoped that this study of a particular metropolitan area will facilitate the formulation of sound generalizations concerning the character and functioning of municipal enclaves in other areas.

Most living organisms seem to exhibit some sense of territoriality--that is, a sense of permanent occupation of a specific area

and a need to defend its boundaries.¹ As Robert Ardrey has remarked, "Why the possession of a territory should be a source of extra energy in the proprietor is a mystery...which science may never solve. Some of our best ethological thinkers have analyzed the phenomena in terms of confidence in the familiar and fear of the strange."² Organic associations are held together not only by patterns of social behavior but by the limitations of their physical environment. For human beings, special legal opportunities and restrictions promote the bonds of territoriality. Most of those who have studied political territoriality have attempted to conceptualize the associated social behavior in one or both of these ways: (1) as spatial or geographic phenomena, and/or (2) as behavioral phenomena. It seems advantageous here to view territoriality primarily as a behavioral system which is expressed in a spatial-temporal frame of reference.³ Such is the approach which this study will follow.

¹Roger E. Kasperson and Julian V. Minghi (eds.), The Structure of Political Geography (Chicago: Aldine Publishing Co., 1969), p. 71. The authors define territoriality as simply the "... propensity to possess, occupy, and defend a particular portion of space . . ." They also state that the two basic concepts about the relationship between territory and political organization are: (1) Any politically organized group operates within a well-defined area--its political territory. Within this territory there is a political hierarchy which is reflected in a territorial framework. (2) Within and among political units there is a spatial structure to political organization and process.

²Robert Ardrey, The Territorial Imperative (New York: Dell Publishing Co., 1966), p. 105.

³C. R. Carpenter, "Territoriality: A Review of Concepts and Problems," in A. Roe and G.G. Simpson (eds.), Behavior and Evolution (New Haven: Yale University Press, 1958), p. 228.

Within political geography the examination of the enclave, the isolated territory of one political unit completely surrounded by the territory of another unit, has afforded a number of researchers an avenue for analyzing the manifestations of territoriality. Relatively little attention, however, seems to have been focused upon municipal enclaves in urban political geography. The paucity of research of this type has encouraged the writer to undertake this particular investigation. The general research problem is to determine the character of the Oklahoma City municipal enclaves, and to measure the association of these "island communities" with the engulfing city through the study of three dependent variables: (1) the availability of municipal services, (2) acceptability attitudes toward Oklahoma City, and (3) political attitudes and functional orientation within the enclaves. An assessment will be made of the degree to which the character of these municipal enclaves is related to the three dependent variables, thereby facilitating an understanding of the enclaves' functional relationships, both as separate legal entities and as communities with some measure of independence from the larger city.

The Initial Political Act

Urban annexation has often been used to solve certain metropolitan problems, and the process has several advantages. It simplifies the governmental structure by eliminating smaller units, inhibits new incorporations, and consolidates responsibility. It reduces or eliminates duplication of services and commonly raises service standards.

It also may permit the achievement of economies of scale in the provisioning of governmental services.⁴

In New England as a result of the characteristic town structure, annexation can play little part in the growth of a central city.⁵ However, in most parts of the United States, annexation is a relatively simple procedure. Yet, the most common obstacle to corporate city expansion is the presence of smaller incorporated units on the periphery of the larger city. Cleveland, Ohio, apart from the Lake Erie frontage, is completely enclosed in this manner, and there are only one or two points remaining along Chicago's corporate boundary where further expansion is not blocked by smaller incorporated units.⁶ In considering annexation and related urban political patterns, the presence of enclaves, exclaves, and bordering towns just beyond the municipal limit occasions special problems. "The possession of an uninterrupted territory is one of the principal requisites for the smooth functioning of a political entity--so much that any discontinuity in territory must be presumed to raise particularly delicate problems in political geography."⁷

⁴Joseph F. Zimmerman, Government of the Metropolis (New York: Holt, Rinehart and Winston, Inc., 1968), p. 143.

⁵Raymond E. Murphy, "Town Structure and Urban Concepts in New England," The Professional Geographer, XVI (March, 1964), 1-6.

⁶Raymond E. Murphy, The American City: An Urban Geography (New York: McGraw-Hill Book Co., Inc., 1966), p. 417.

⁷G.W.S. Robinson, "West Berlin: The Geography of an Exclave," Geographical Review, LIII (October, 1953), 540.

The Political Problem

Few attempts have been made to understand the significance of territorial discontinuities within municipal units. Melamid briefly considered Yonkers, New York, as illustrating "municipal quasi-exclaves."⁸ Nelson's study of Vernon, California, is an outstanding attempt to analyze the influence of local municipal boundaries on the urban land-use pattern.⁹ Vernon is not a "true" enclave within the municipal area of Los Angeles, however, for Los Angeles does not completely surround it. The analysis of existing enclaves (both unincorporated and incorporated) within the municipal areas of cities, with a view to understanding the nature of their spatial-functional relationships, seems highly desirable.

"Island communities" then are quite evident on the municipal landscape in the United States. According to the 1960 Census of Population, their number when present in a particular metropolitan area may vary from one, as in the Oakland municipal area, to nine as in the Houston area. Table I indicates those United States municipalities which are especially notable in displaying municipal enclaves. This list omits some small unincorporated areas (e.g., one in Albuquerque, New Mexico; two in San Antonio, Texas; two in Tulsa, Oklahoma; and the Stockyards enclave of Oklahoma City). Among the major American metropolitan

⁸Alexander Melamid, "Municipal Quasi-Exclaves: Examples from Yonkers, New York," The Professional Geographer, XVII (March, 1966), 94-96.

⁹Howard J. Nelson, "The Vernon Area, California: A Study of the Political Factor in Urban Geography," Annals of the Association of American Geographers, XLII (June, 1952), 177-191.

TABLE I

MUNICIPAL ENCLAVES OF UNITED
STATES MUNICIPALITIES (1960)

Municipality	Number of Enclaves	Enclave Names
Houston, Texas	9	Bellaire Bunker Hill Hedwig Hilshire Hunters Creek Piney Point South Side Place Spring Valley West University Place
Louisville, Kentucky	9	Audubon Park Kingsley Meadowview Estates Parkway Village Seneca Gardens Strathmoor Gardens Strathmoor Manor Strathmoor Village Wellington
Oklahoma City, Oklahoma ^a	9	Bethany Highland Beach McLemore Nichols Hills Springlake Park The Village Valley Brook Warr Acres Woodlawn Park
Cincinnati, Ohio	4	Arlington Heights Elmwood Place Norwood St. Bernard
Dallas, Texas	4	Cockrell Hill Fruitdale Highland Park University Park
San Antonio, Texas	4	Almos Park Balcones Heights Castle Hills Terrell Hills

TABLE I-- Continued

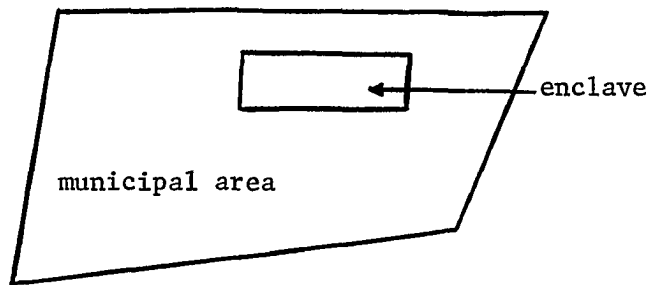
Municipality	Number of Enclaves	Enclave Names
Ft. Worth, Texas	3	Westover Hills Westworth White Settlement
Los Angeles, California	3	Beverly Hills San Fernando West Hollywood
Columbus, Ohio	2	Bexley Whitehall
Detroit, Michigan	2	Hamtramck Highland Park
Mobile, Alabama	2	Chickasaw Prichard
Chattanooga, Tennessee	1	Ridgeside
Denver, Colorado	1	Glendale
Fremont, California	1	Newark
Indianapolis, Indiana	1	Woodruff Place
Monroeville, Pennsylvania	1	Pitcarin
Oakland, California	1	Piedmont
Pittsburgh, Pennsylvania	1	Mt. Oliver

^aThe nine listed here are not the same as the eleven incorporated enclaves under study. The reason for this is that continuing annexation and consolidation changed the geographic pattern between 1960 and 1970. It should be noted that the 1960 census maps are out of date in regard to present incorporated enclaves and the 1970 census maps are not yet available. Following 1960 McLemore and Highland Beach dissolved their town status and were annexed by Oklahoma City. During the 1960's, Mustang, Lake Aluma, Forest Park, and Canadian Country Club became enclaves when Oklahoma City annexed land surrounding these communities. Even though Woodlawn Park is an enclave of Bethany, it is also by definition an enclave of Oklahoma City and therefore is treated as such.

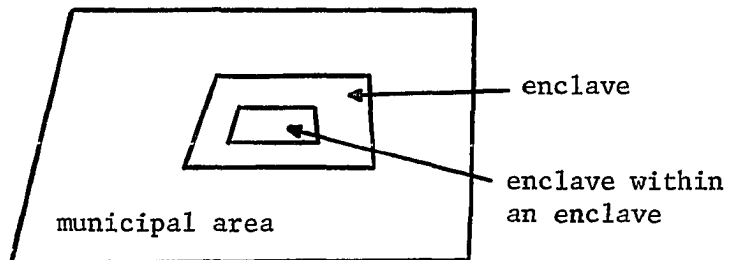
centers, three were especially prominent in 1960 in having nine municipal enclaves each--Houston, Texas; Louisville, Kentucky; and Oklahoma City, Oklahoma. The population of the incorporated enclave units may vary considerably, for example, from some 40,000 in Highland Park (Detroit, Michigan), to eleven in Springlake Park (Oklahoma City, Oklahoma). Most enclave areas tend to be quite small, seldom exceeding six square miles in extent. Occasionally the central city includes one or more pieces of land entirely separate from the main body of the city. Such outliers, or exclaves, are also worthy of investigation and could well furnish the basis for another study somewhat parallel to this one.

Considering the general position of enclaves within the larger municipal areas, four types emerge: (1) the isolated or true enclave, completely surrounded by municipal area (example, Valley Brook in Oklahoma City); (2) the enclave within an enclave, in which case the enclave is completely surrounded by the legal area of two municipalities (example, Woodlawn Park within Bethany, which in turn is entirely surrounded by Oklahoma City); (3) the paired or joined enclave, in which two or more enclaves have boundaries which meet, with the enclave cluster completely surrounded by municipal area (example, Bethany and Warr Acres in Oklahoma City); and (4) the quasi-enclave, in which the municipal area does not completely surround the enclave (example, Yukon, adjacent to Oklahoma City). These four types of enclaves are illustrated in Fig. 1. Within a single metropolitan area all four types of enclaves may be present. For purposes of this study, only the isolated enclave, the enclave within an enclave, and the paired or joined enclave will be examined.

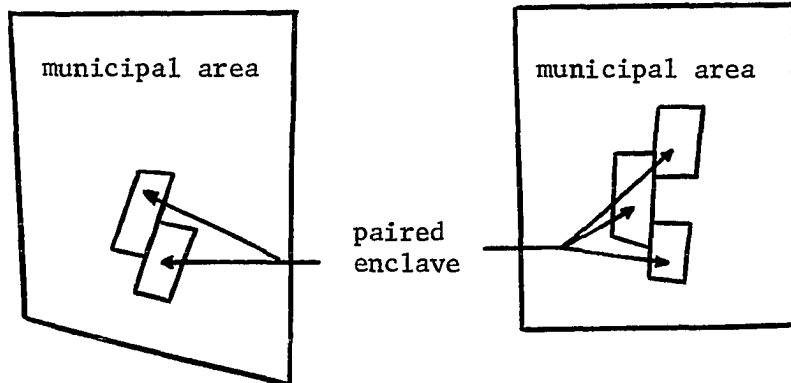
A. Isolated or True Enclave



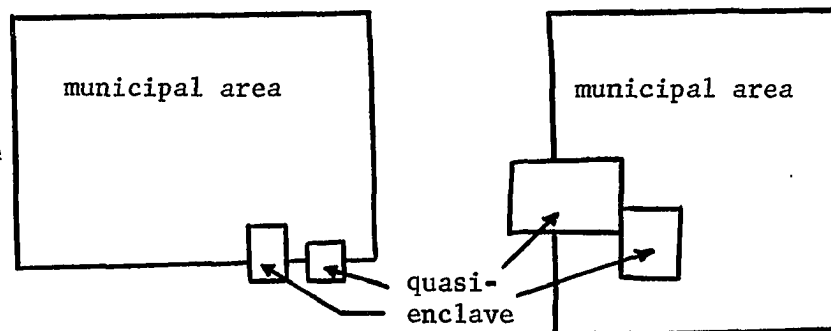
B. Enclave Within An Enclave



C. Paired or Joined Enclave



D. Quasi-Enclave



THE FOUR TYPES OF MUNICIPAL ENCLAVES

Fig. 1

As already noted, Nelson's study investigated fully the situation of one quasi-enclave (Vernon, California).¹⁰

The Principal Objectives

Annexation is a political process which creates areal changes. The process is subject to guidelines as laid down by each state's legal system. For the political scientist, the wording and the intent of the annexation laws may be the major focus of interest. For the political geographer, the primary concern is to observe and explain the areal changes resulting from political acts of annexation. Whether a fair and just procedure has been followed in the act of annexation is a task for the political scientist to establish. To the geographer, an understanding of how existing enclaves have survived and how they have avoided the annexation process is particularly important. Of no less concern is the influence which the enclaves have upon the engulfing municipal area and whether such influence inhibits the smooth functioning of metropolitan activities. By examining the nature and role of the enclaves in a particular city, the writer hopes some general understanding will be gained concerning the interrelations of urban political patterns, especially those created by annexation and resistance to it.

The interaction between political process (annexation) and area change (the creation of municipal enclaves) constitutes the geographic framework for this research. The aims are to understand the relationships the enclaves have with the larger municipal area, and hopefully

¹⁰Ibid.

to comprehend some of the functional problems associated with the annexation process.

Selection of the Political Unit

Of special importance in the selection of the larger municipality to be studied was the number of municipal enclaves within it. Being able to study multiple enclaves within the same city, it was thought, would give a sounder basis for understanding the relationship of enclaves to the municipality, since numerous case studies facilitate generalization. Especially desirable for the study was a city with a continuing history of annexation, for it is through the annexation process that municipal enclaves are created.

The choice among urban centers to be studied was quickly narrowed to three--Houston, Louisville, and Oklahoma City. Each of these centers included at the time the investigation was undertaken nine municipal enclaves (Table I), and each had its own unique political pattern. Because of the investigator's residence in Oklahoma, for reasons of convenience, the choice fell to Oklahoma City. In 1971 this city was second in geographical extent among all cities within the contiguous United States, having a municipal area of 647.56 square miles, a figure surpassed only by that of Jacksonville, Florida, which comprises 840 square miles.¹¹ Juneau, Alaska, is first in size in the United States, having a municipal

¹¹U.S. Bureau of the Census, Statistical Abstract of the United States: 1971 (Washington: U.S. Government Printing Office, 1971), pp. 21-23, with further verification by personal phone call on January 31, 1972 to the Jacksonville City Chamber of Commerce, Research Bureau.

area of 3,108 square miles, but it includes only some 13,000 residents.¹² Oklahoma City's areal growth has been impressive, with 327.72 square miles annexed between 1958 and 1962.¹³ As of January, 1972, the city had engulfed eleven incorporated communities; however, only nine of these are given careful analysis in this study since two of the enclaves (Canadian Club and Springlake Park) lack both substantial populations and regular local elections. It is hoped that this examination of the Oklahoma City municipal area, as a case study, will contribute to a better understanding of the spatial political patterns of municipal enclaves in general.

The Research Problem

The first objective of the study is to examine the spatial and socio-economic-political character of the municipal enclaves. What are these political units really like in terms of a number of selected characteristics? Are certain features common to all of them, or do only a few of them possess similar characteristics? Obviously they are not all exactly alike. To clarify the differences, the nine functioning incorporated enclaves under study, after careful analysis, have been grouped

¹²U.S. Bureau of the Census, Census of Governments: 1967 (Washington: U.S. Government Printing Office, Vol. 7, 1970, State Reports, No. 2: Alaska), p. 31. Since there are no counties in the state, and only ten boroughs, Juneau was easily able to merge with the adjacent borough and thus create a very large municipal area.

¹³Very recently, Indianapolis, Indiana, achieved an impressive increase in municipal area, when on January 1, 1970, the city merged with surrounding Marion County, thereby enlarging its municipal area from 81 square miles to 396 square miles. This was the nation's first major city-county consolidation to occur without a popular referendum since modern New York City was formed in 1898.

into two general types based on: (1) their spatial characteristics (i.e., position relative to other enclaves) and (2) their socio-economic-political characteristics.

The second purpose of the study is to investigate the nature of the association that the individual enclaves, and consequently the general types of enclaves, have with the larger city. It is assumed that the relationships with the larger city will be affected by the character of the various types of enclaves. The question is posed as to whether certain types of enclaves have a different pattern of association with the larger city than do others as reflected by (1) the availability of services, (2) acceptability attitudes toward the larger city, and (3) political attitudes and functional orientation. If so, what sort of relationships are involved, and what kind of linkages are associated with the various types of enclaves as they function in a metropolitan setting?

After careful determination of the relationship the enclave groups have with the larger, engulfing city, a final consideration will be to assess whether the relationships with Oklahoma City are dependent or independent of their character (spatial-socio-economic-political). Following this, recommendations will be made as to how the findings of the research study may be applicable to other municipal communities having political enclaves within their legal limits.

The Hypotheses

Several hypotheses are tested. Generally, they concern various facets of the following propositions: the availability of services, the

acceptability responses, and the political attitudes and functional orientation are all dependent upon the character of the enclaves. Basically, therefore, it is assumed that the character of the enclaves influences their relationship with Oklahoma City and that, for example, the social class attitudes and lifestyles affect that relationship.

Data Collection Procedures

The investigator decided to use a sample of the registered voters as the primary source of information about the several enclave communities. It was assumed that registered voters had a greater awareness of the political problems and conditions within their respective communities than non-registered persons. Admittedly, a bias has been introduced by sampling only registered voters. However, it was felt that their opinions give a strong framework for an initial investigation concerning metropolitan relationships. Only the voting group can instigate effective change through the ballot box. The collection of the data presented in subsequent chapters was achieved by personal interviewing, using an open-ended questionnaire.¹⁴ This technique proved satisfactory, since through personal contact with each registered voter questioned the research problem and related questions could be fully explained where necessary. An alternative method using mail questionnaires was considered but not employed since the experience of other investigators is that the return rate from such mailings is usually low. In some instances, the addresses of registered voters were rural route numbers which, with a mail survey,

¹⁴Appendix A is a copy of the questionnaire employed.

would have been impossible to plot accurately on a map. Furthermore, non-registered residents could have received some of the mail questionnaires, and the intention was to exclude them from the survey.

Sample size presented a problem. Since most of the questions asked involved opinions and subjective attitudes, it was impossible to determine the appropriate minimum sample size in that no mean and standard deviation could be calculated.¹⁵ Therefore, the sample size used in carrying out the investigation was generally set at 5 per cent of the registered voters in each city and town. This was admittedly an arbitrary level, but it was felt that it would yield an adequate representative sample. In those organized communities with small populations and few registered voters, however, the 5 per cent sample might have resulted in an inadequate number of respondents. For example, in Springlake Park there would have been only one respondent, in Woodlawn Park five respondents, in Valley Brook twenty-six respondents, and in Forest Park twenty-eight respondents. On the other hand, using the 5 per cent figure the larger cities and towns would have yielded an unnecessarily high sample number. Bethany would have had 528 respondents, the Village 392, and Warr Acres 239. Therefore, it was decided to set minimum and maximum limits, while employing the general 5 per cent criterion. The minimum level for each community was arbitrarily set at 50 registered voters, and the maximum at 150. The levels were considered adequate to establish generalized attitudes for each city and town. Any number above 150, it was felt, would have only

¹⁵Hubert M. Blalock, Jr., Social Statistics (New York: McGraw-Hill Book Co., Inc., 1960), pp. 165-167.

tended to reinforce the obvious consensus.

Another consideration in establishing the sample size was the physical exertion and time required to personally interview even as many as 150 respondents in a single town. Table II presents the number of registered voters actually interviewed in each city and town, while Tables III and IV show a breakdown of these voters by voting ward and by sex. Altogether, 775 registered voters were interviewed in the nine incorporated enclaves. Two incorporated towns were eliminated from the data collection analysis: Springlake Park, which had only nine registered voters and has no local elections, and Canadian Club town, which lacks both registered voters and local elected officials. Table V portrays the governmental characteristics of the incorporated enclaves included as study units.

The ideal method for selecting registered voters to include in this study would have been to use the voter registration list for each city and town, and then to select respondents using systematic sampling, starting with a randomly selected page from each list. The practical problems in trying to employ this method proved to be formidable. In preliminary testing of this rejected procedure, the persons selected were frequently not at home. In some instances, the addresses chosen were simply rural route numbers, which made the residences almost impossible to locate on a street map. In other cases, the houses were not numbered at all.

Finally, an alternative method was employed and found to be practical for the purpose. Since each city and town was divided into wards, the required total sample number could be divided by the number of wards in the community, and approximately equal numbers could be interviewed

TABLE II
NUMBERS OF REGISTERED VOTERS SAMPLED
IN THE NINE INCORPORATED ENCLAVES

City or Town ^a	Registered Voters ^b	Number Interviewed
Bethany	9,963	150
The Village	7,842	150
Warr Acres	4,777	150
Mustang	1,419	71
Nichols Hills	1,152	58
Forest Park	553	55
Valley Brook	506	51
Woodlawn Park	103	50
Lake Aluma	60	40

^aTitle 11, Section 551, of the Oklahoma Statutes states that any town, village, or community of people residing in compact form and having a population of 1,000 inhabitants or more (before 1951 the minimum population was 2,000), and having territory platted into lots or blocks, may become a city. This incorporation is allowed only if the area is five miles beyond the corporate limits of an incorporated city of 200,000 people, or three miles beyond the limits of one having a population of less than 200,000. It should be emphasized that even though the word "village" is mentioned in the statutes, there is no legal definition of such a term, and therefore by Oklahoma law there are only two types of incorporated units, city and town. Further, there is a distinction between types of cities: (1) a statutory city which is under state law, and (2) a home rule city having its own constitution because it has over 2,000 people (Title 18, Section 3).

^bThe numbers of registered voters were compiled from the offices of the Canadian County Election Board in El Reno for Mustang, and the Oklahoma County Election Board in Oklahoma City for the remaining cities and towns, on March 17 and July 23, 1970. It should be noted that being situated in another county, as Mustang is, is no deterrent to annexation in the state of Oklahoma. No separate listing was given for Lake Aluma in Oklahoma County, as it was included as part of Crutch Township, which listed a total of 182 registered voters. Mr. Ralph Adair, an Oklahoma County Commissioner and resident of Lake Aluma for 12 years, estimated that the town had no more than 60 registered voters. Thus, the number sampled from Lake Aluma reached only 40 because there were no other people available in the town to be interviewed during the time period employed.

TABLE III

DISTRIBUTION OF THE SAMPLED REGISTERED
VOTERS BY WARD IN THE NINE INCORPORATED ENCLAVES

	Ward One	Ward Two	Ward Three	Ward Four	Ward Five	Ward Six	Total
Bethany	40	40	35	35	x	x	150
The Village	30	30	30	30	30	x	150
Warr Acres	40	40	30	40	x	x	150
Mustang	10	10	10	22	19	x	71
Nichols Hills	20	20	18	x	x	x	58
Forest Park	19	13	23	x	x	x	55
Valley Brook	9	8	9	9	8	8	51
Woodlawn Park	16	15	19	x	x	x	50
Lake Aluma	21	6	13	x	x	x	40

x = wards non-existent

TABLE IV

DISTRIBUTION OF THE SAMPLED REGISTERED VOTERS
BY SEX IN THE NINE INCORPORATED ENCLAVES

	Male	Female	Total
Bethany	65	85	150
The Village	77	73	150
Warr Acres	76	74	150
Mustang	43	28	71
Nichols Hills	27	31	58
Forest Park	26	29	55
Valley Brook	24	27	51
Woodlawn Park	25	25	50
Lake Aluma	20	20	40

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TABLE V

GOVERNMENTAL CHARACTERISTICS (in 1970) OF THE
NINE INCORPORATED ENCLAVES COMPRISING THE STUDY

City or Town	Form of Government	Number of Councilmen or Trustees	Number of Wards	Method of Choosing Mayor or Board President
Bethany	Mayor-City Manager-Council	8	4	Popular election
Forest Park	Board of Trustees	3	3	President appointed by Board
Lake Aluma	Board of Trustees	3	3	President appointed by Board
Mustang	Board of Trustees	5	5	Chairman appointed by Board
Nichols Hills	Mayor-City Manager-Council	3	3	Mayor appointed by Council
Valley Brook	Board of Trustees	6	6	Chairman appointed by Board
The Village	Mayor-City Manager-Council	5	5	Mayor appointed by Council
Warr Acres	Mayor-Council	8	4	Popular election
Woodlawn Park	Board of Trustees	3	3	President appointed by Board

in each ward (Table III). For example, the Village had five wards and a total of 150 respondents to be interviewed. This meant interviewing 30 registered voters from each ward. A random selection of homes within each ward was used in choosing respondents. Employing a local street map, every street was traversed to insure maximum randomness and minimum bias. However, some bias must be admitted in the selection of the homes where the occupant was to be questioned. Residences with a ferocious dog or some other equally persuasive deterrent were by-passed. To insure maximum validity of the sample, interviewing was conducted both during the usual work week and on week-ends, either during the day or early evening hours, up to about 9:00 p.m. The field work in the towns was accomplished between March 1 and August 1, 1970, during which time daylight was at a maximum. Since in most cases the daytime respondents were housewives, the male viewpoint was sampled during the evening hours. During the week-ends, however, the viewpoints of both sexes could be readily sampled.

The data collected in the interviews was grouped into three categories: (1) socio-economic-political characteristics, (2) acceptability responses, and (3) political attitudes and functional orientation. Each of these groups of data is included and analyzed in forthcoming chapters.

Personal interviews were also conducted with the local elected political representatives (mayor and ward councilmen). For this part of the investigation only about forty-five people were involved, and the interviews were tightly structured since they included only the ten acceptability questions asked of the registered voters.

The Variables

In selecting the variables to be examined, a number of guidelines had to be established. First consideration was given to what may be called the independent character variables (e.g., spatial and socio-economic-political ones) as opposed to the dependent association or relationship variables (e.g., provision of services, acceptance responses, political attitudes, and functional orientation.). Obviously, any information used had to be readily obtainable through personal interviewing.

The spatial character variables were formulated on the basis of the enclaves' position within the larger city's engulfing area and on the enclaves' position relative to each other. The spatial arrangement of the enclaves within the engulfing municipality was considered very important in understanding their relationships and functions. The socio-economic-political variables were chosen to allow some assessment of the enclaves' character as related to the length of their existence within the Oklahoma City area. It was also decided to employ some indicators of the registered voters' knowledge of local community affairs and of the affairs of the larger city, with the thought that the results would show the extent of support for the enclaves' claim of being truly separate from the larger city.

The relationship variables were chosen for a number of reasons. The local availability of services was considered a suitable way to measure how well each enclave supplies the wants and needs of its residents. Many governmental reports make reference to the service availability factor as an indication of the functional reality of peripheral or enclave

municipalities. A second concern involved attitudes expressed by the registered voters toward the larger city. It seemed essential in analyzing the "reality" of the enclaves to determine how the average citizen felt about certain situations. The last objective was to determine the awareness of the registered voters concerning the functional orientation of the enclave communities where they lived.

The Character Variables

To simplify the analysis somewhat, and yet retain significant meaning, the enclaves were divided into two types on the basis of their spatial position: (1) those enclaves which are spatially isolated within the municipal area, that is, are not joined to any other incorporated enclaves; and (2) those enclaves that are spatially contiguous within the municipal area, in other words, are immediately adjacent to other incorporated enclaves. The spatial groupings allow a very important characteristic variable to be identified by itself, thereby giving further understanding and meaning concerning spatial arrangement.

Several socio-economic-political variables were chosen for analysis in order to define the character of the population in the nine incorporated enclaves. Six such variables were selected as useful in portraying socio-economic character: (1) length of residence, (2) place of previous residence, (3) yearly family income, (4) religious affiliation, (5) education, and (6) place of present employment. Each of these variables is discussed in detail in Chapter V. Six political variables were used: (1) political party affiliation, and ability to name (2) the local mayor

or board chairman, (3) the city manager, if any, (4) the local ward councilman, (5) the mayor of Oklahoma City, and (6) the city manager of Oklahoma City. These political variables are also considered in Chapter V.

The twelve socio-economic-political variables just mentioned serve as the major basis for determining the character of the nine incorporated enclaves. Through analyzing this character, an effort is made to understand the nature of the inter-municipal relationships which exist within the metropolitan area of Oklahoma City.

The Relationship Variables

Three measures were employed to determine the type of relationship that the enclaves have with the larger city. (1) A number of municipal service variables were selected, and an investigation was made of the source of these services, whether from the surrounding municipal area or from within the enclave community. This information made possible some assessment of the degree of functional independence of each enclave from the larger city. Three categories of municipal services were recognized: general social services, other public services, and the provisioning of utilities. (2) The subject relationship of the enclaves to Oklahoma City was measured by acceptability responses given by the registered voters in the enclaves. These responses were based on a series of ten questions posed in the questionnaire. The major aim here was to discover whether or not the registered voters within the enclaves readily accept Oklahoma City as a provider of certain services, functions, and activities. Community acceptability attitudes were also solicited from the locally elected representatives in order to discover whether their views reinforced those of

the communities they represented. (3) Selected political attitudes were investigated in a further attempt to provide some measure of the relationship of the enclave to Oklahoma City. The responses to the attitude questions indicate the degree of independence which the enclaves feel they have from the larger city.

In summary, three types of questions were used to determine and measure the nature of the enclaves' relationship to the larger city. An examination and analysis of the variables which appear on the respondents' questionnaires makes possible an evaluation of the actual and perceived dependency of the nine "island communities" on the larger municipality of Oklahoma City.

CHAPTER II

A REVIEW OF RELATED RESEARCH

A considerable body of research dealing with annexation, municipal enclaves, and associated problems is available in books, journal articles, theses, and dissertations. Numerous law cases have been concerned with the mutual rights and relationships of urban enclaves and the associated metropolitan center. Municipal enclaves--the primary focus of this study--seem, however, to have seldom been examined as separate political entities in their functional and attitudinal relationships.

In reviewing the nature of related studies, it is apparent that the major emphasis in most of them is upon suburbs and their connection to the central city within the framework of a metropolitan area. An excellent recent work by Bollens and Schmandt examines the American metropolis in its social, political, and economic setting.¹ In it the stress is on urban form and structure, with an assessment of municipal expansion problems. Other

¹John C. Bollens and Henry H. Schmandt, The Metropolis, Its People, Politics and Economic Life (New York: Harper and Row, Publishers, 1970).

researchers have undertaken somewhat similar studies, often emphasizing the management of the metropolitan area by the various levels of government.² The majority of general works on American cities describe how the metropolitan area is functioning, or trying to function, and relate this performance to existing relationships within the political hierarchy. Often they set forth proposals as to how a smoother working of the various echelons of government could be accomplished.

Several writers examining the metropolitan framework have devoted their primary attention to the suburbs.³ As a rather typical example, Gilbert's study of suburbs focuses upon the standard social, political, and economic themes.⁴ His principal concern is with political theory and municipal organization, and his aim is to suggest reform proposals relating to local political democracy. Much of the related research focuses upon the functional role of suburbs and their desire to survive as political entities in their own right.

²For example, see Robert C. Wood, Fourteen-Hundred Governments: The Political Economy of the New York Metropolitan Region (Garden City: Anchor Books, Doubleday and Company, 1961); Scott Greer, Metropolitica: A Study of Political Culture (New York: John Wiley and Sons, Incorporated, 1963); and Roscoe E. Martin, Metropolis in Transition: Local Government Adaptation to Changing Urban Needs (Washington, D.C.: Housing and Home Finance Agency, 1963).

³Robert C. Wood, Suburbia: Its People and Their Politics (Boston: Houghton-Mifflin Company, 1969).

⁴Charles E. Gilbert, Governing the Suburbs (Bloomington: Indiana University Press, 1967).

Various facets of the conflict and cooperation dimension within a metropolitan setting are brought out in the series of readings edited by Dye and Hawkins.⁵ Of particular interest are the ideas concerning better political area organization, and the arguments for local government reorganization, urban integration, and annexation. The role of municipal enclaves as political entities in their own right, however, has seldom been explored, and these usually are treated simply as part of a suburban ring within which there is interaction between the periphery and the central city.

The objective of this chapter is to indicate the direction and emphasis that most investigations follow by calling attention to representative works in the field of metropolitan area studies. Prominent among them are studies emphasizing the regional planning activities of a metropolitan area. Levin's approach is generally typical of planning studies, although his focus is upon the economic (cost/benefit) sphere.⁶ A classic study of a single city, with an approach somewhat similar to Levin's, is Martin's investigation of Syracuse, New York. Although not exclusively oriented to the planning function, Martin's work does involve an assessment of the various decision makers who direct growth in the Syracuse metropolitan community.

⁵Thomas R. Dye and Brett W. Hawkins (eds.), Politics in the Metropolis: A Reader in Conflict and Co-operation (Columbus: Charles E. Merrill Books, Incorporated, 1967).

⁶Melvin R. Levin, Community and Regional Planning (New York: Frederick A. Praeger, Publishers, 1969).

It identifies the principal participants in the planning process, and schematically suggests the components of action.⁷

A recent provocative work by a British geographer is Freeman's inquiry into regional administration.⁸ Although his examples are confined to British towns, counties, and boroughs, his investigation displays a methodology for examining the hierarchy of political boundaries in a manner that is applicable to any setting.

Mandelker's textbook is a compendium work, stressing the management of the urban environment and utilizing actual problems as reflected in court cases.⁹ Topics considered include intergovernmental conflict, local government organization, aspects of environmental management, and all phases of planning. The approach is like that of traditional casebooks, with a concentration on legal problems as they arise in urban settings.

In summary, the existing literature on the metropolitan area emphasizes the planning of and complex interrelations within such an area, usually focusing on the problems that arise between various levels of government. Suburbs, both singly and collectively, have received considerable scrutiny, but almost invariably the approach

⁷ Roscoe C. Martin, et al., Decisions in Syracuse (Bloomington: Indiana University Press, 1961).

⁸ T. W. Freeman, Geography and Regional Administration (London: Hutchinson University Library, 1968).

⁹ Daniel R. Mandelker, Managing Our Urban Environment: Cases, Text and Problems (New York: The Bobbs-Merrill Company, 1966).

has been to relate the suburbs to their metropolitan setting. Making the enclave itself, in its unique geographical setting, the principal subject of inquiry is to follow an avenue that is virtually unexplored. In examining the enclaves within greater Oklahoma City, the writer has chosen to portray in some detail their individuality as well as the linkages which bind them to the larger metropolis in which they are engulfed.

Numerous attempts have been made to understand the significance of urban annexation, both theoretically and practically. In addition to studies of annexation statutes in individual states, and excellent texts of a more general nature such as those of Sengstock and Scott and Keller,¹⁰ there are several good studies of individual states or cities. For example, Bain's study of annexation in Virginia is typical of the single state approach.¹¹ His emphasis is upon the judicial process and the use of this process to readjust city and county boundaries. Consideration is given to the resultant improvements in administration and law enforcement in the annexed areas. Throughout the Bain study there is a strong legal orientation. Little attention is paid to the specific areal changes or their consequences for the separate political entities involved.

Two unpublished master's theses concerning the Oklahoma City

¹⁰Frank S. Sengstock, Annexation: A Solution to the Metropolitan Area Problem (Ann Arbor: Michigan Legal Publication, 1960); and Stanley Scott and Lewis Keller, Annexation? Incorporation? A Guide for Community Action (Berkeley: University of California Press, 1959).

¹¹Chester W. Bain, Annexation in Virginia (Charlottesville: The University Press of Virginia, 1966).

area should be mentioned. One is a detailed annexation study of the years 1958-1963, and the other is a more general investigation of municipal annexation in Oklahoma.¹² Both studies suggest improvements in future municipal expansion programs, while assessing the implications of current programs. Ballentine's thesis on Oklahoma City's annexations between 1958 and 1963 relates how and why the city expanded its boundaries. The basic premise, it seems, was

that property must be within the city limits in order to achieve and to maintain a high and uniform level of control over urban development on it.¹³

Ballentine concluded that

one important objective of the annexation program was to prevent the formation of any more municipalities in central Oklahoma. Collaterally, territorial growth of established towns would be discouraged.¹⁴

However, the writer pointed out, a major reason for the continued existence and growth of other, smaller cities and towns within Oklahoma City's municipal area was the economic opportunities created by the central city. His analysis of the legal methods by which municipal expansion had been achieved in the past was supplemented by suggestions for planning criteria to be followed in the future to facilitate and regularize the expansion process. In

¹²Thomas McClellan Ballentine, "The Oklahoma City Annexation Program, 1958-1963: Purposes, Processes, and Planning Implications" (unpublished M.R.C.P. thesis, University of Oklahoma, 1964), and David N. C. Yang, "Municipal Annexation Policies and Methods As Related to Orderly Urban Development in Oklahoma" (unpublished M.R.C.P. thesis, University of Oklahoma, 1967).

¹³Ballentine, Ibid., p. 22.

¹⁴Ibid., p. 28.

Ballentine's thesis little attention is given to the municipal enclaves, and they are considered only as part of the total Oklahoma County setting. No attempt is made to differentiate the enclaves from other surrounding suburban communities. His study is exhaustive, however, in its analysis of the city's vast annexation program during the period studied, and his discussion of the planning implications of annexation is most enlightening.

The later study of Yang is an effort to link existing Oklahoma annexation laws to the problem of planning functional municipal communities. There is an in-depth discussion of the laws, including their legislative, popular, municipal, and judicial determination. Yang's analysis of the general application and deficiencies of Oklahoma annexation laws is supplemented by the use of Oklahoma City as an example. He concludes by suggesting various principles that he feels should guide improved annexation law. These would include thinking in terms of regional as well as metropolitan impact, with close attention to the rural-urban fringe areas. A state reviewing agency, Yang suggests, should have regulatory authority and be responsible for safeguarding the annexed area's interests. He urges continuing evaluation of the urban character of the expanding city and the extent of need for boundary changes. The ability of the annexing municipality to provide municipal services to the entire incorporated area is implicit.¹⁵ Yang's study is macroscopic, and his emphasis is upon state law as related to planning considerations.

¹⁵Bollens and Schmandt, op. cit., Chapter 7. The authors outline various aspects of "The Service Challenge."

The two research reports just described are excellent in their evaluation of the annexation process as it operates in the state of Oklahoma, particularly in the way Oklahoma City has applied the state law. The major aim of both authors is to propose an effective planning program that is compatible with the annexation laws.

A related work deserving mention here is the dissertation of Morgan which examines the suburbs of Oklahoma City and considers the feasibility of a metropolitan integration scheme.¹⁶ Bethany, Nichols Hills, the Village, and Warr Acres,¹⁷ along with Midwest City, Norman, Del City, Edmond, Yukon, and El Reno,¹⁸ were included in the study. An investigation was conducted into social stratification among these suburban units, with attention to political attitudes as related to the possibility of metropolitan political unification. The inquiry was carried out using social characteristics of suburban political leaders, and relating these characteristics to the political integration possibility. Although the author's research was quite detailed, and he presented a series of pertinent findings related to metropolitan integration, he made no distinction between the suburbs under study as to whether they were engulfed in or outside the municipal area of Oklahoma City. Morgan's handling of economic relationships was not

¹⁶David Reid Morgan, "Suburban Differentiation and Metropolitan Political Integration" (unpublished Ph. D. dissertation, University of Oklahoma, 1969).

¹⁷These four cities are among the eleven incorporated enclaves that this study will later analyze.

¹⁸See Fig. 3 for location of these cities.

always as careful as it might be. For example, he stated that the Aero Commander Plant provided the bulk of manufacturing employment in Bethany, while seeming not to realize that Aero Commander was also a significant element in the economy of other parts of Oklahoma County.¹⁹ Thus, it appears necessary to this writer to analyze municipal enclaves as separate and distinct political entities.

One outstanding feature of Morgan's research is the attention he gives to the problem of governmental organization in metropolitan areas. Different concepts of the metropolitan area are examined including the traditional one, a reform orientation, an international relations model, a power structure approach, a systems approach, and an urban ecology framework.²⁰ A modified urban ecology conceptual model, with heavy emphasis on cultural influences, was selected to guide the research. This study is particularly important for its penetrating analysis of urban administration in the entire Oklahoma City Standard Metropolitan Statistical Area (SMSA). As the author himself pointed out:

no other substantial study of metropolitan political organization has been encountered which has a setting in the southwestern part of the United States²¹

To gain valuable insights into the socio-economic and political character of the Oklahoma City suburban community, one has only to peruse this pioneer and highly original investigation.

A number of research articles have been published on the subject

¹⁹Morgan, op. cit., p. 110.

²⁰The thirty-six page bibliography is an outstanding merit of this dissertation.

²¹Morgan, op. cit., p. 96.

of municipal enclaves. In most cases, these are short studies relating either to metropolitan area integration or to distinctive suburban features in a metropolitan setting. In 1948, a notably original attempt was made by Spencer to survey and indicate the importance of municipal enclaves in the United States.²² The author called attention to the existence of a number of cities within cities, including both incorporated and unincorporated enclaves. He suggested that the enclave city should probably be included in the study of suburbanism so that the central city would be more aware of such "foreign" areas within it.

Spencer proposed a number of reasons why enclave cities and enclosed unincorporated areas exist: to escape the higher city taxes and yet enjoy metropolitan services, to avoid regulations affecting business enterprises in the primary city, and to perpetuate political jobs that are more attuned to local business interests. All of these considerations were found to be relevant to the existing municipal enclaves within Oklahoma City.

Especially important to Spencer is the view of the enclave city operating functionally in the midst of the engulfing city. The author notes that the engulfing city ". . . may have to cross this inner area with water mains and with arterial streets . . ." and observes that the ". . . inner city often enjoys a favorable bargaining position because of its location"²³-- in effect, it has a privileged status among suburbs.

²²Richard C. Spencer, "Twenty-nine Cities Within Cities," National Municipal Review, XXXVII (May, 1948), 256-258. No map was included to show the types of municipal enclaves.

²³Ibid., 256-257.

At the same time, the writer notes that the enclave city has little or no chance to expand its borders and so is virtually a prisoner in constant need of urban attention. Spencer's terse article is an excellent pioneering attempt to focus attention and interest upon "cities within cities."²⁴ It proposes no technique of analytical approach for considering these cities, but goes well beyond just calling attention to their existence. Such information as is presented provides a useful base for further inquiry.

Howard J. Nelson's study of Vernon, California is another attempt to understand municipal enclaves, but at a more ideographic level.²⁵ Vernon is surrounded by Los Angeles on only three sides, so should be considered a quasi-enclave. The author writes that

There appears to be a present tendency among students of cities to minimize the importance of municipal and county boundaries and to consider the entire occupied area as a single 'geographic' city. Recent census statistics, for instance, are reported for 'Metropolitan Districts' and 'Urban Areas', as well as for the 'political' city.²⁶

Vernon provides a good case study. The author has called particular attention to the sharp differentiation between land use in Vernon and the surrounding areas. In numerous instances a sharp break in the land use pattern coincides with the Vernon border.

Enclaves other than those of the municipal type have also attracted the attention of geographers. Alexander Melamid explored the topic of

²⁴One major drawback is the lack of distinction between municipal and metropolitan enclaves.

²⁵Nelson, op. cit., 177-191.

²⁶Ibid., 177-178.

enclaves, including coastal enclaves, at the international level by examining so-called neutral territories.²⁷ His major concern was to discern whether neutral territories are economically viable in relation to their natural resources and their location. Melamid used a series of examples including Moresnet and Gibraltar in Europe, El 'Arja in the Middle East, and Tangier in North Africa. He suggested that the status of such neutral territories can be (and sometimes has been) altered, and discouraged the creation of additional ones except in special cases. In sum, his survey study contributes some understanding to the perspective and prospects of enclosed political areas.

Melamid has also analyzed the problems of municipal quasi-enclaves, using examples from Yonkers, New York,²⁸ He traced the historical development of these enclaves, and illustrated how problems have arisen concerning the provisioning of municipal services such as police and fire protection. He made no attempt at an analysis of quasi-enclaves elsewhere, but he did cite the existence of such areas, noted their recurring problems, and urged that further research be conducted.

Again at the international level, a thorough research effort was accomplished by Robinson in his examination of political exclaves.²⁹ After classifying these exclaves according to types, he sought an indication of their character by assessing their communications and other

²⁷Alexander Melamid, "Economic Geography of Neutral Territories," Geographical Review, XLV (July, 1955), 359-374.

²⁸Melamid, op. cit.

²⁹G. W. S. Robinson, "Exclaves," Annals of the Association of American Geographers, XLIX (September, 1959), 283-295.

administrative problems, their economy, and their survival capacity within their complex areal relationships. In a comparison of political exclaves with other tiny countries and neutral territories, he concluded that exclaves are

. . . in a position to be thorns in their neighbors' sides and can profit from a situation which places them inside a neighbor's territory but outside his jurisdiction.³⁰

Supplementing Robinson's general analysis of exclaves is Karan's brief ideographic consideration of the India-Pakistan enclave problem.³¹ He used a chronological treatment, tracing the way such enclaves were created and following developments to the time of writing. Karan predicted that disputes over the enclaves would continue unless a change occurs in the emotional attitudes within the two countries.

These various research efforts and inquiries, discovered partly within the geographical literature, encourage further consideration of enclaves at the municipal-political level. Aside from the examples mentioned, curiously little effort has been exerted by geographers in this type of research. The paragraphs which follow call attention to some of the additional research from other disciplines which relates to the municipal enclave problem.

Wheeler, an economist, probed the question of what induces central cities to annex adjacent areas.³² He found that some states have

³⁰Ibid., 293.

³¹P. P. Karan, "The India-Pakistan Enclave Problem," The Professional Geographer, XVIII (January, 1966), 23-25.

³²Raymond H. Wheeler, "Annexation Law and Annexation Success," Land Economics, XLI (November, 1965), 354-360.

"easier" laws than others. A penetrating insight is gained by his examination of the relationship between annexation law and annexation success, and by his study of the degree to which the legal factors can be outweighed by social attitudes and other community characteristics. The author notes that platted land is easier to annex than unplatted territory. A number of measures of annexation success are proposed, which in turn make possible the ranking of state annexation laws--from "difficult" (example, Rhode Island) to "easy" laws (example, Texas). His discussion of inter-city competition takes into account adjacent incorporated places, and it is this last section which is most relevant to a geographic study of municipal enclaves.

Schnore's research on municipal annexation and the growth of metropolitan suburbs was conducted from a sociological perspective.³³ He attempted to show the social-demographic impact of annexation and to demonstrate the extent to which the expansion of city boundaries tends to mask the amount of "decentralization" or "suburbanization." Schnore reminded his readers that territorial changes must be taken into account when examining the growth of differentials within metropolitan areas as reflected in census statistics. If no annexation occurred, he pointed out, then nearly all metropolitan growth would have gone to the outlying suburban rings. Schnore concluded that city-ring comparisons unadjusted for annexations substantially understate the amount of "suburbanization."

From a similar sociological perspective, Putnam studied the

³³Leo F. Schnore, "Municipal Annexations and the Growth of Metropolitan Suburbs 1950-1960," American Journal of Sociology, LXVII (January, 1962), 406-417.

variability of political attitudes within a local community.³⁴ He concluded from a number of studies of voting behavior that majority views in a community have a disproportionate advantage in gaining and holding adherents. Since municipal enclaves are essentially functioning as small communities, it seemed to him pertinent to consider how the community influence is channeled through primary and secondary groups in the community. Such findings are important when considering attitudes within municipal enclaves.

A study by Cottrell contends that in a typical metropolitan area incorporating a number of municipal governments, with artificial boundaries--in many cases, ancient hallowed ones--the legal jurisdictions no longer fit the political realities.³⁵ In these cases, he asserts, the foremost need is for adequate metropolitan regional planning on an overall and long term basis. Nine proposals are submitted as to what should be considered common functions and which services are necessary to satisfy them. These functional services, he suggests, should be carried out by super-authorities working within specially created districts, and by following such procedures forced annexations could be avoided.

Mandelker illustrated one problem of extra-territoriality and the engulfing municipality with his study of the legal case called the

³⁴Robert D. Putnam, "Political Attitudes and Local Community," American Political Science Review, LX (September, 1966), 640-654.

³⁵Edwin A. Cottrell, "Problems of Local Government," Western Political Quarterly, II (December, 1949), 599-609.

Town of Terrell Hills versus the City of San Antonio.³⁶ Terrell Hills is an incorporated community lying in the northern portion of San Antonio and completely surrounded by San Antonio, which extends as much as four miles beyond it. The complaint was that San Antonio was charging residents of Terrell Hills about one-third more for water than it charged its own residents. The court upheld the rate differential by recognizing the fact that the differential was historical and had been in effect earlier when the smaller city acquired its water utility system from a private company. The court noted that municipal areas which have external utility connections often have higher valuations than areas without such connections, and that the city of San Antonio levies and collects its taxes upon this enhanced value. The Terrell Hills case serves as an excellent example of the many problems that can arise between separately incorporated municipal enclaves and the engulfing city.

This chapter has identified some of the types of research that have been accomplished relating to the study of municipal enclaves. It is in no sense an exhaustive treatment of the existing literature. As yet, detailed studies of municipal enclaves are few in number. The purpose of this dissertation is to gain further insight into the character of these rather unusual political entities through an examination of the metropolitan area of Oklahoma City.

³⁶Mandelker, *op. cit.*, pp. 356-357. The case was the Town of Terrell Hills vs. City of San Antonio, 318 S. W. 2d85 (Texas Civil Appellate 1958).

CHAPTER III

OKLAHOMA ANNEXATION LAWS AND THE AREAL EXPANSION OF OKLAHOMA CITY

This chapter describes the methods by which municipal annexation is achieved under the state statutes of Oklahoma. Derwent Whittlesey, a noted political geographer, has suggested that ". . . the interplay of law and region, and the underlying geopolitical forces can and should be studied from every conceivable angle of view."¹ The particular pattern of state statutes has made possible the municipal enclaves of Oklahoma City. The writer here traces the areal growth of Oklahoma City, depicting the expansion of its boundaries, the absorption of some one-time separately existing towns, and the engulfment of the present enclaves. Such consideration reflects the further observation of Whittlesey that "Political geography . . . thrusts strong and deep roots into the past"² and that "Sound political geography therefore must trace these relict forms and procedures to their source."³ The overall purpose of the chapter, therefore, is to describe the methods Oklahoma City employed in expanding its municipal

¹Derwent Whittlesey, The Earth and the State (New York: Holt and Co., Inc., 1943), p. 590.

²Ibid., p. 591.

³Ibid.

territory, and to portray the consequences of this expansion for the surrounding areas.

Annexation Legislation and Procedures

Annexation in the present context can be defined as the absorption of additional territory, whether rural or urban in character, by a city or a town. The municipalities in the state of Oklahoma have no inherent authority to extend their boundaries through the annexation of territory but must acquire such power through legislative authorization. Specifically, the municipalities are guided by Title 11, Sections 481 through 494, of the Oklahoma Statutes; Sections 1042 through 1044 apply exclusively to towns. The earlier Dakota Statutes of 1887 provided a kind of model for the general annexation laws adopted by the Oklahoma Territory Legislature in 1890. With the coming of statehood in 1907, the territorial laws were converted into a body of state statutes. The pertinent statutes have changed little since 1907, although there have been some amendments and language revisions. Few legal problems have arisen concerning the changing of city limits, mainly because annexation challenges are difficult to initiate in the courts, and only the state may question the validity of annexation ordinances.

Municipal territory and its extension can be accomplished through the procedures of incorporation, consolidation, and annexation. Incorporation is the creation by the inhabitants of a prescribed territory of an organized body politic, a body endowed with all the powers of a private corporation for the purpose of local government. Consolidation is the combining of two or more municipal corporations into one. Annexation

is the joining of adjacent territory to a city or other governmental instrumentality.⁴ Of these three methods, annexation is perhaps the most widely employed means for achieving metropolitan expansion. It is the most commonly employed device for extending local governmental boundaries in urban areas.

In the case of adjacent unincorporated land, the initiative rests with the municipal council when it wants to begin annexation proceedings. Action is strictly unilateral, but an outside review may be provided by a court or by a county or township board if requested. Only about ten states provide for some method of consolidation, or bilateral annexation. Within Oklahoma, annexation has been the result of unilateral action. The inclusion of territory within the boundaries of a municipality might or might not be resisted, but ordinarily is not subject to a vote by the inhabitants involved.

Title 11, Section 971 of the Oklahoma Statutes prohibits the incorporation of a new town within a five-mile radius of a previously incorporated city having a population of more than 200,000. It follows that annexation normally involves unincorporated territory which is adjacent or abutting.⁵ No particular concern need be given to the shape or form⁶ of the annexed territory, although it must be a continuous area.⁷

⁴Frank S. Sengstock, Annexation: A Solution to the Metropolitan Area Problem (Ann Arbor: University of Michigan Law School, 1960), p. 7.

⁵City of Ada vs. Whitaker, 202 Oklahoma 249, 212 F.2d 482 (1950). The terms "adjacent" and "abutting" as used here seem to have an identical meaning.

⁶Botsford vs. City of Norman, 226 F. Supp. 258 (1964).

⁷Oklahoma Title 11, Statute 551 (1951).

Intervening space between the city and the territory to be annexed would obviously confront the requirement that the added territory be adjacent or contiguous.⁸ It is sufficient if the parcels of land involved are barely contiguous or adjacent to each other. When all the parcels to be annexed are taken together they must comprise a compact area, some section of which abuts onto the annexing city. As a result of the lack of legal guidelines for urban form or shape, it is possible for municipalities to annex hundreds of square miles of territory whenever they feel that a need for such expansion exists.⁹ "Strip-parcel" annexation allows isolated areas to be surrounded by the city, and these areas may also be included if the other boundaries of the city surround them on at least three sides. To accomplish this, however, consent must be obtained from a majority of the property owners in the area of land making up the strip-parcel.¹⁰ For example, between 1959 and 1963, Oklahoma City used "strip" annexation and the permissible practice of surrounding on three sides to annex the area east of Tinker Field and Lake Stanley Draper.

The Oklahoma annexation statutes make it clear that the changing of municipal limits need not be voluntary in so far as the affected property owners are concerned.

The city council, in its discretion, may add to the city such other territory adjacent to the city limits . . .

⁸Fielding D. Haas, "The Legal and Practical Aspects of Annexation," (Norman: University of Oklahoma Law School, 1964), unpublished paper, p. 6.

⁹Ibid.

¹⁰The courts approved such strip-parcel annexation in two cases-- Sharp vs. Oklahoma City, 181 Okla. 425, 74 P. 2d 383 (1937) and Botsford vs. the City of Norman, 226F. Supp. 258 (1964).

subdivided into tracts or parcels of less than 5 acres with more than one residence thereon, and be added to the city limits without the consent in writing of the owners of a majority"¹¹

When three sides of the territory proposed for annexation are adjacent to or abutting on property already within the city limits, the statutes are explicit that this territory may be added without the consent of the owners. Likewise, the owners' consent is not required when the territory to be annexed is adjacent and is subdivided into tracts or parcels of less than five acres, each with more than one residence. Section 481 thus clearly gives a city power to annex adjoining territory under certain conditions irrespective of the owners' wishes. Section 482 authorizes annexation by petition when approved by three-fourths of the legal voters in the area under consideration who also own three-fourths of the value of the property. Section 483 provides for possible de-annexation through petition by the same three-fourths majority of legal voters and owners. The city council, under Section 485, is obligated to make a real effort to supply to the residents of the annexed areas municipal services commensurate with their density of population.¹²

It would seem from an investigation of the Oklahoma annexation statutes that most annexations can legally occur without the consent of a majority of the people to be included. Some students of annexation feel that the consent of a majority of the landowners should be a mandatory prerequisite. The parcel type of annexation obviously deserves further

¹¹Oklahoma Title 11, Statute 481.

¹²In re Yeargain, 43 Okla. 593, 143 P. 844 (1914).

consideration by the state legislature. Providing the annexed territory with the needed municipal services is not mandatory under the Oklahoma annexation statutes and often proves to be unfeasible in practice.

In summary, Oklahoma state law provides essentially four distinct methods whereby territory may be annexed to a city. These methods are:¹³

1. The consent in writing of the owners of a majority of the acreage of the territory to be added.
2. On petition in writing signed by not less than three-fourths of the legal voters and the owners of not less than three-fourths (in value) of the property in any territory contiguous to the city limits.
3. When subdivided into tracts or parcels of less than five acres with more than one residence thereon.
4. When three sides of a territory are adjacent to, or abutting on, property already within the city limits.

Areal Expansion of Oklahoma City

The origin of Oklahoma City is entwined with railroad history. Continuous settlement began with the establishment of the "Oklahoma" station on the Atchison, Topeka, and Santa Fe Railroad line. On April 22, 1889, the original townsite of Oklahoma City¹⁴ comprised 240 acres between present Reno Avenue and Seventh Street, east of Walker Street.¹⁵

On May 2, 1890, the Oklahoma Territory was established as a government unit by an act of Congress. The federal Congress on May 14 made

¹³James Gurley, "Annexation" (Oklahoma City: Department of Municipal Planning, 1967), unpublished paper, pp. 3-4.

¹⁴The town of Oklahoma became officially known as Oklahoma City on July 1, 1923. It had been the official state capital since June 11, 1910.

¹⁵Berlin B. Chapman, "Oklahoma City from Public Land to Private Property," The Chronicles of Oklahoma, XXXVII (Spring, 1959), 221.

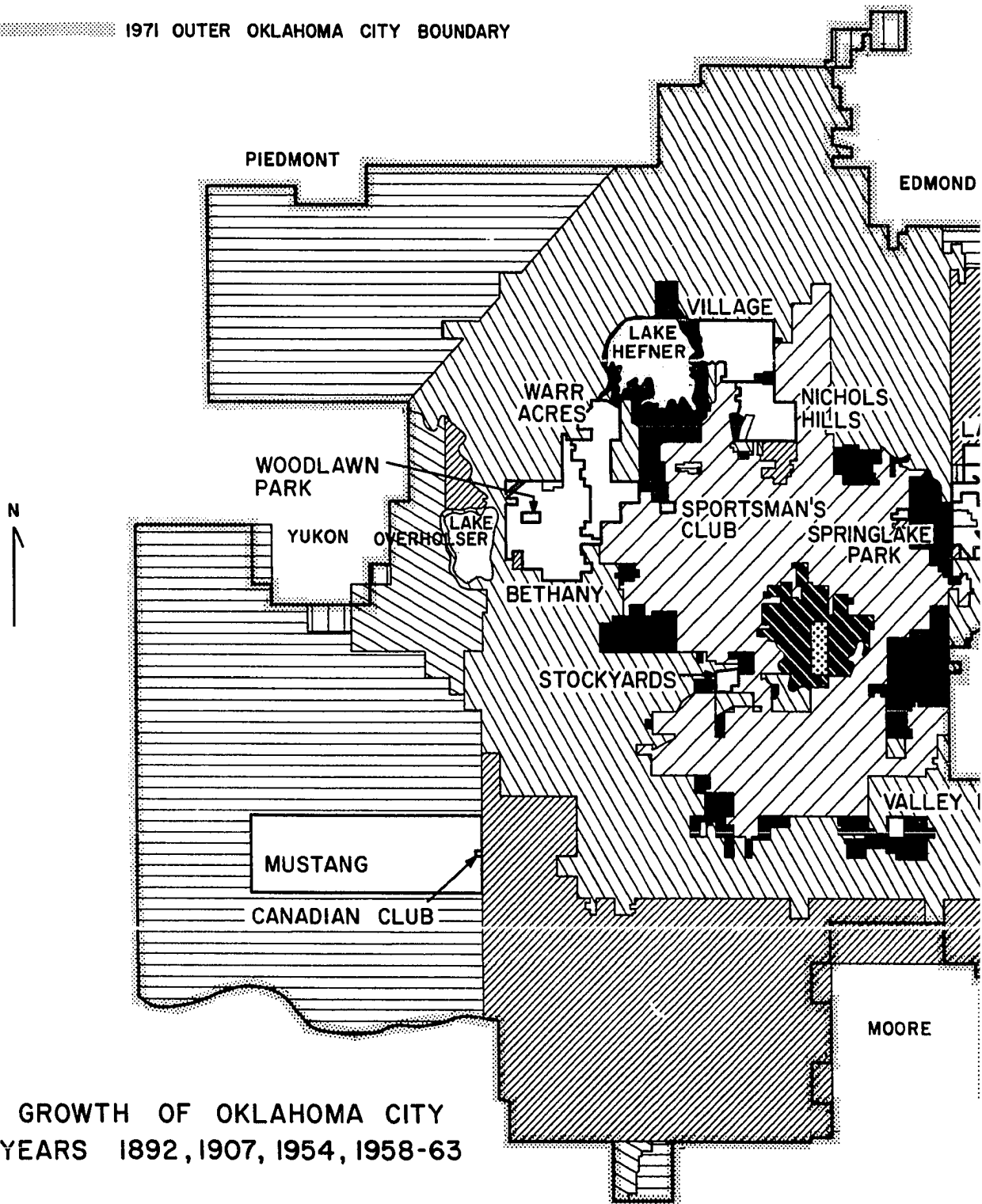
provision for the recording of townsites by trustees appointed by the Secretary of Interior. The taxable inhabitants of the "town of Oklahoma City" petitioned the local board of county commissioners to be incorporated as a village. On July 15 of the same year, the commissioners of "County Second" incorporated the "village of Oklahoma City," which already consisted of some 10,000 people. By then it occupied a rectangular tract of 400 acres including South Oklahoma City, Oklahoma City proper, and 80 acres north of Fourth Street.¹⁶ It should be noted that throughout the city's early development the Chamber of Commerce played a very important role in the political direction of the community.¹⁷

The city's areal expansion, as shown by Fig. 2, proceeded at a fairly steady pace until 1959. Table VI indicates statistically the growth of the city in population and area up to that time. During the first 68 years of its existence, the city's areal extent increased to 80.54 square miles (from an original area of 0.61 square miles). The enlargement rate, therefore, averaged a little more than one square mile per year from 1890 through 1958. The period from 1959 through 1963, however, brought an areal gain of 560.56 square miles, or an average acquisition of over 110 square miles per year. Table VII depicts the stages in this phenomenal growth. The period from 1964 to 1971 shows essentially no further territorial growth, and after 1964 even a slight reduction in the city's areal extent, amounting to a loss of 2.18 square miles. A visual comparison of Oklahoma City as it

¹⁶Ibid., XXXVII (Winter, 1959-60), 440.

¹⁷Personal interview with Stanley Draper, April 24, 1970. Mr. Draper is a former Managing Director of the Oklahoma City Chamber of Commerce, a position he held for over 30 years.

1971 OUTER OKLAHOMA CITY BOUNDARY



AREA GROWTH OF OKLAHOMA CITY
FOR YEARS 1892, 1907, 1954, 1958-63

Source: Compiled from maps and other data furnished by the Oklahoma City Planning Department

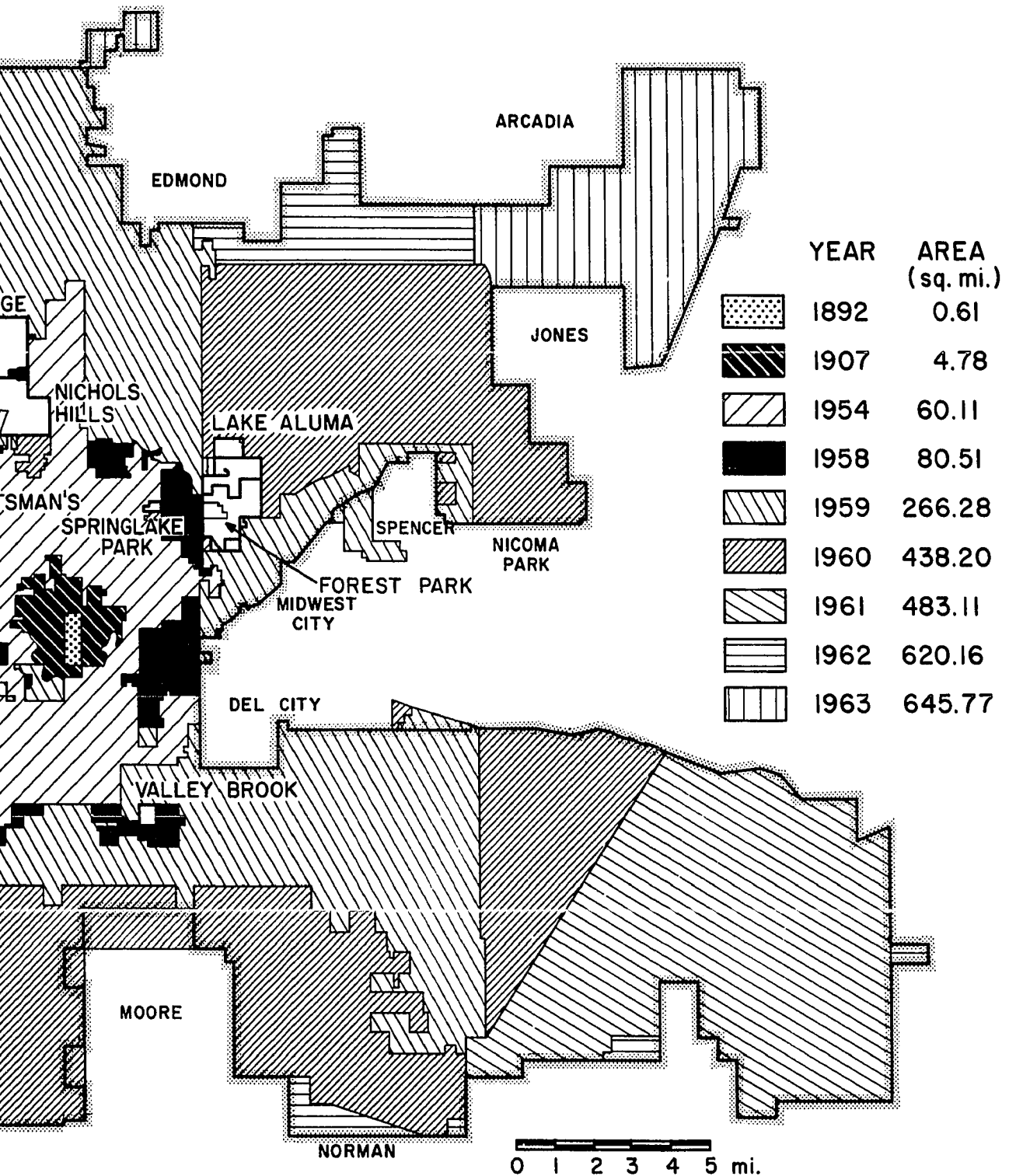


TABLE VI
AREAL GROWTH OF OKLAHOMA CITY
TO 1958

YEAR	POPULATION	AREA IN SQUARE MILES
1890	4,151	1.50
1900	10,037	1.50
1910	64,205	15.60
1920	91,295	17.20
1930	185,389	25.20
1940	204,424	25.90
1950	243,504	46.33
1958	295,000 (est.)	78.81

Source: Oklahoma City Chamber of Commerce

TABLE VII
OKLAHOMA CITY AREAL GAIN
1959-1971

YEAR	AREA IN SQUARE MILES	AREA ANNEXED EACH YEAR (SQUARE MILES)
Jan. 1, 1959	80.54	185.74
Jan. 1, 1960	266.28	148.66
Jan. 1, 1961	414.94	68.17
Jan. 1, 1962	483.11	137.05
Jan. 1, 1963	620.16	20.94
Jan. 1, 1964	641.10	8.64
Jan. 1, 1965	649.74	-0.08
Jan. 1, 1966	649.67	0.05
Jan. 1, 1967	649.71	-0.78
Jan. 1, 1968	648.94	-1.36
Jan. 1, 1969	647.57	-0.01
Jan. 1, 1970	647.56	0.00
Jan. 1, 1971	647.56	--

Source: City of Oklahoma, Department of Planning

was in 1960 and 1971 can be made by observing the city map for these two years (Fig. 2).

No detailed explanation for this irregular growth rate seems necessary here, since Ballentine and other writers have adequately analyzed it.¹⁸ It does seem important, however, to indicate what areas Oklahoma City annexed in the various time periods.

The early expansion period, extending to the late 1950's, was predominantly one of annexation by petition. Most developers felt that it would enhance the value of their tracts to bring them into the city. In addition, potential home buyers wanted the protection against unscrupulous developers afforded by municipal building codes. In the early 1930's Oklahoma City developed a municipal airport, now Will Rogers World Airport, and in 1942 the Oklahoma City Air Depot (now Tinker Field) was opened for use as a military air base (Fig. 3). Since the railroads seemed already fully developed, it was thought that further highway and air route development provided the best opportunities for transportation improvement. In 1940 the municipality bought land for Will Rogers Field from the Oklahoma City Chamber of Commerce for \$250 an acre. The Chamber had acquired the land earlier with this eventuality in view.

More new towns appeared in the area. In 1952 Smith Village, on the eastern margin of the city, was incorporated, and in 1953 nearby Midway Village was incorporated as a town, both joining Midwest City (incorporated in 1943) as organized municipalities near Tinker Field. In 1956 a proposal was set forth to build a broad freeway to Tinker Field,

¹⁸For example, see The Daily Oklahoman, December 14, 1961; also Ballentine, op. cit.

for which the Oklahoma City Chamber of Commerce provided support through land acquisition. However, Midwest City was understandably reluctant to co-operate in this venture. The political complexities were dramatic in that along the five mile routeway from Oklahoma City to Tinker Field there were six municipalities--Midway Village, Midwest City, Carrying Place, Valley Brook, Smith Village,¹⁹ and Del City. To the south, Moore and Midwest City were collaborating in an annexation move which threatened to block further growth of the larger city in that direction. In view of these circumstances, Oklahoma City in 1959 moved to annex Tinker Field and a large adjoining area to the east and south, and began to develop in that area an additional municipal water facility, now Lake Stanley Draper.²⁰

Since World War II, Oklahoma City leaders have been concerned over the development of satellite cities which were thought to be taking the necessary "elbow room" for the larger city's expansion. At times, individuals have charged that the smaller municipalities were making unfair use of the larger city's services.²¹ Political leaders in Oklahoma City have felt the need for better control of such vital installations as water supply reservoirs and major expressways. There has also been

¹⁹Consolidated with Del City, July 1963.

²⁰The Oklahoma City Times, April 8, 1959. About 5,000 acres, or about eight square miles, were added to the city, bringing its total area to over 100 square miles.

²¹In The Daily Oklahoman, December 1, 1968, Oklahoma City taxpayers were pictured as playing the role of "Sugar Daddy"--that is of providing for the suburbanites free services such as libraries, fire protection, street and park systems, and water supply.

concern that some developers were establishing peripheral facilities for activities that were illegal within the city limits. For example, Canadian Club, near Mustang, was established so the so-called Pink Elephant Club could operate gambling activities there. Near the Cowboy Hall of Fame, on the north side, another entrepreneur was attempting to organize "Millwood City" so gambling could take place there. Where it could, the city expanded to block such moves by developers. A peculiar map consequence was the appearance of small projections of Oklahoma City into adjacent counties, as, for example, one into Pottowatomie County to the southeast, added so that undesirable developers would be pushed farther away from the city. It should be recalled here that under state law no new town can be established within five miles of an existing city, but that this restriction does not hold when the new town is situated in a different county from the larger city.²²

With the construction of the Eufaula Reservoir on the lower Canadian River and talk of a possible connecting channel up the Deep Fork River, there was discussion of the eventual need for port facilities being established on the northeastern side of Oklahoma City near the existing towns of Luther and Jones.²³ To ensure future development benefits for the city from a port on the projected barge canal, Oklahoma City in July and November, 1963, annexed an additional 16 square miles on the northeast

²²The Oklahoma City Times, April 24, 1962. Also, conversation with Mr. David Shapard, town attorney for Valley Brook, July 2, 1970.

²³The Daily Oklahoman, July 10, 1963, and The Oklahoma City Times, March 19, 1964.

side in the vicinity of the proposed Arcadia Reservoir on the Deep Fork.

In reviewing the expansion of Oklahoma City's municipal area, it seems desirable to emphasize the historical relationship of the nearby cities and towns. Three essentially different types of towns have developed during the settlement period.²⁴ First, there are those municipalities that have historically co-existed with Oklahoma City and thus, in a sense, have the same right to be a city--for example, Mustang, Bethany, Britton, and Harrah. Secondly, there are those towns that were organized for the exclusive purpose of keeping their residents from being drawn into Oklahoma City. Examples of such towns are Midwest City, Nichols Hills, the Village, Warr Acres, and Forest Park. The third type comprises those incorporated areas which may reasonably be termed "historical anomalies"--that is, those that were organized for some highly specialized reason. Examples of this type are Woodlawn Park, Smith Village, Lake Aluma, Carter Park, Branding Iron, and Springlake Park. The circumstances under which these communities were incorporated will be described in Chapter IV.

While Oklahoma City has been growing to a position of metropolitan dominance in the central part of the state, a number of nearby incorporated units have decided to consolidate with the city. Other incorporated areas have favored continuing their independent status. Capitol Hill²⁵ as a

²⁴Personal interview with George Shirk, April 29, 1970. Mr. Shirk is a former mayor (1964-67) of Oklahoma City and a noted authority on Oklahoma history. At the time of the interview, he was serving as president of the Oklahoma Historical Society.

²⁵At one time, Capitol Hill published a semi-weekly newspaper, The Beacon.

community dates from about 1900 when one small store was located on the banks of the North Canadian River, near the old Santa Fe Railroad. It was incorporated as a municipality in 1904, but in 1909, when it had an estimated population of 2,500, it chose consolidation with Oklahoma City. The consolidation was accomplished by a petition for dissolution. Later, the towns of Britton and McLemore asked for and negotiated consolidation with the city. Britton was incorporated on June 22, 1909, at which time it had a population of 307 people and included an area of 1,443 acres. Located directly east of the present city known as the Village, it added land in 1921 but subsequently, in April, 1950, decided to dissolve its town status and become part of Oklahoma City. McLemore was not incorporated until July 16, 1956, just prior to Oklahoma City's massive annexation drive. Located just to the east of Will Rogers Airport, it included an area of approximately 70 acres. Less than ten years later, however, in June, 1963, it too became a part of Oklahoma City, after a bitter fight on the part of some of its citizens to maintain an independent status.²⁶

A number of unincorporated areas on the periphery of Oklahoma City assumed a town-like setting but were never organized as towns. Smithville,²⁷ southwest of Del City, and Wheatland,²⁸ in the southwest corner of Canadian County, were two such areas, both later annexed to the city.

²⁶The Daily Oklahoman, March 7, 1963, and April 30, 1963.

²⁷Situated at present day 63rd Street and Bryant Avenue.

²⁸The Oklahoma City Times, July 12, 1960. The Wheatland area when brought into Oklahoma City consisted of 23½ square miles with some 300 residents.

Silver Lake, northwest of Lake Hefner, grew from a cluster of cabin-type summer homes in the mid 1940's, but the area lacked vital services and regulations, and on June 23, 1959, was annexed to the city.²⁹ Branding Iron Town, although incorporated in 1927, was consolidated with the city on June 19, 1962.³⁰ It was a private club, incorporated as a town to avoid Oklahoma City property taxes. The management, it appears, had wanted to deal only with the county sheriff's office and preferred to avoid the jurisdiction of the Oklahoma City Police Department.

In summary, Oklahoma City's annexation program has been both unique and dramatic. A result of the rapid expansion has been the creation of a number of enclaves (both incorporated and unincorporated) within the greater municipal area. By July, 1971, there remained eleven such incorporated units and seven unincorporated ones, each having a unique history and relationship to the larger municipal area. It will be the purpose of the next chapter to describe in greater detail the historical origin and present situation of these enclaves, as part of an attempt to understand their existence and functions within the larger municipal area of Oklahoma City.³¹

²⁹Personal interview with Mr. Jess W. Matheny, Manager of the Industrial Division of the Oklahoma City Chamber of Commerce, May 5, 1970. Also letter from Mr. Pat Painter, Director of the Oklahoma City Planning Department, March 11, 1971.

³⁰The club (or so-called town) was located south of the Northwest Expressway and directly east of Portland Avenue, between NW 58th and NW 53rd Streets. The owner, a Mr. Findley, arrived home from a vacation, it is reported, to find that his club had been taken into the limits of Oklahoma City.

³¹Letter from Roscoe H. Jones, Director of the Houston City Planning Department, May 7, 1970. Houston is now first in the nation in municipal enclaves, with twelve separate incorporated units (cities) within its municipal area.

CHAPTER IV

THE MUNICIPAL ENCLAVES OF OKLAHOMA CITY-- EFFORTS TOWARDS INCORPORATION AND RESISTANCE TO THESE EFFORTS

Before discussing in more detail the nature of Oklahoma City's municipal enclaves, it seems desirable to list them, along with certain of their characteristics, in tabular form (Table VIII). Consideration of these enclaves follows a generally chronological order--that is, the older incorporated enclaves are examined first. The organized enclaves are grouped into two time periods, those incorporated before 1930, here designated as "historic remnants," and those formed after World War II. The county (or unincorporated) areas associated with the incorporated units are discussed separately.

Most of the tracts added to the city during the 1958-1964 period consisted of unincorporated land which was part of Canadian, Oklahoma, and Cleveland counties. During this time, a number of neighboring communities were attempting to secure or maintain their own independent status. Even in the very recent period, new towns have been established as their populations struggled to lead an independent course, separate from that of Oklahoma City. Fig. 3 shows the location of the existing enclaves within the municipal area of Oklahoma City.

The Older Incorporated Enclaves

Mustang. Taking its name from a nearby creek, Mustang was

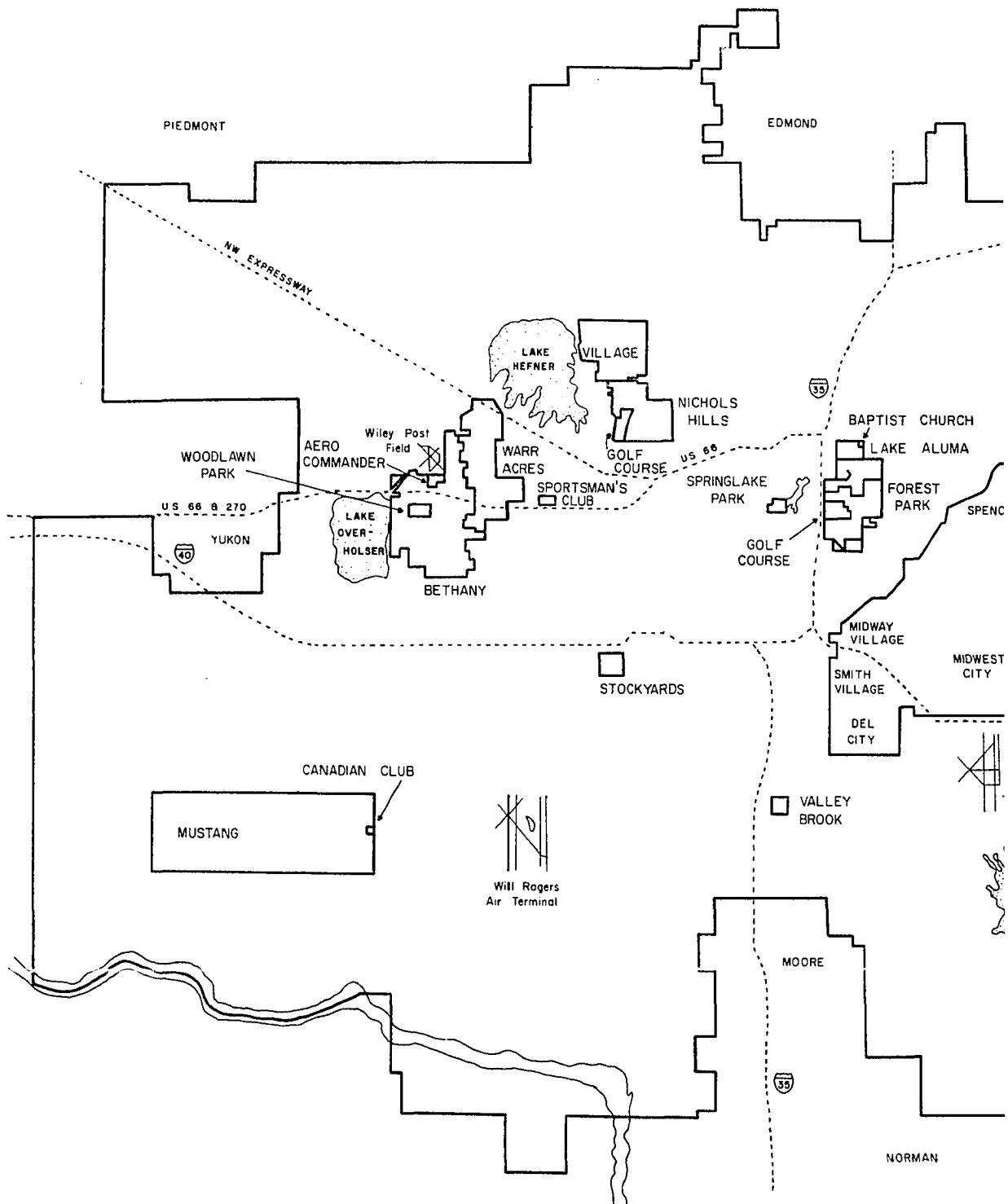
TABLE VIII

THE MUNICIPAL ENCLAVES OF OKLAHOMA CITY, 1970

ENCLAVE NAME	DATE OF INCORPORATION	LEGAL STATUS	FUNCTIONAL CHARACTERIZATION	AREA (SQUARE MILES)	POPULATION (1970) ^a
Bethany	1910	City	Residential/Retail	5.00	21,785
Mustang	1910	City	Residential/Retail	12.00	2,637
Nichols Hills	1929	City	Residential/Retail	1.75	4,478
Springlake Park	1930	Town	Residential/Recreational	.10	14
Warr Acres	1948	City	Residential/Retail	3.50	9,887
The Village	1950	City	Residential/Retail	2.90	13,695
Woodlawn Park	1952	Town	Residential	.10	184
Lake Aluma	1952	Town	Residential	2.00	89
Valley Brook	1956	Town	Residential	.25	2,503
Forest Park	1956	Town	Residential	1.50	835
Canadian Club	1958	Town	Residential	.02	3
Stockyards and associated meat packing plants	unincorporated	county	Wholesaling	.38	--
Aero Commander ^b	unincorporated	county	Manufacturing	.10	--
Sportsman's Club	unincorporated	county	Recreational	.10	--
Meat packing plants outside the Stockyards area	unincorporated	county	Wholesaling	--	--
Oklahoma City Golf and Country Club	unincorporated	county	Recreational	--	--
Twin Hills Golf and Country Club	unincorporated	county	Recreational	--	--
Baptist Rest Pilgrim Church	unincorporated	county	Religious	--	--

^aU.S. Department of Commerce, Bureau of the Census, Census of Population: 1970 (Washington: U.S. Government Printing Office, 1970), PC (V1)-38, Oklahoma, pp. 8,10,11-14. These are official census figures, except for Woodlawn Park, Lake Aluma, and Valley Brook. For these three enclave communities, see explanatory note in Chapter V under: Table X for an explanation of their populations.

^bAnnexed to Bethany on October 5, 1971.



Source: Revised from Oklahoma City Planning Department map

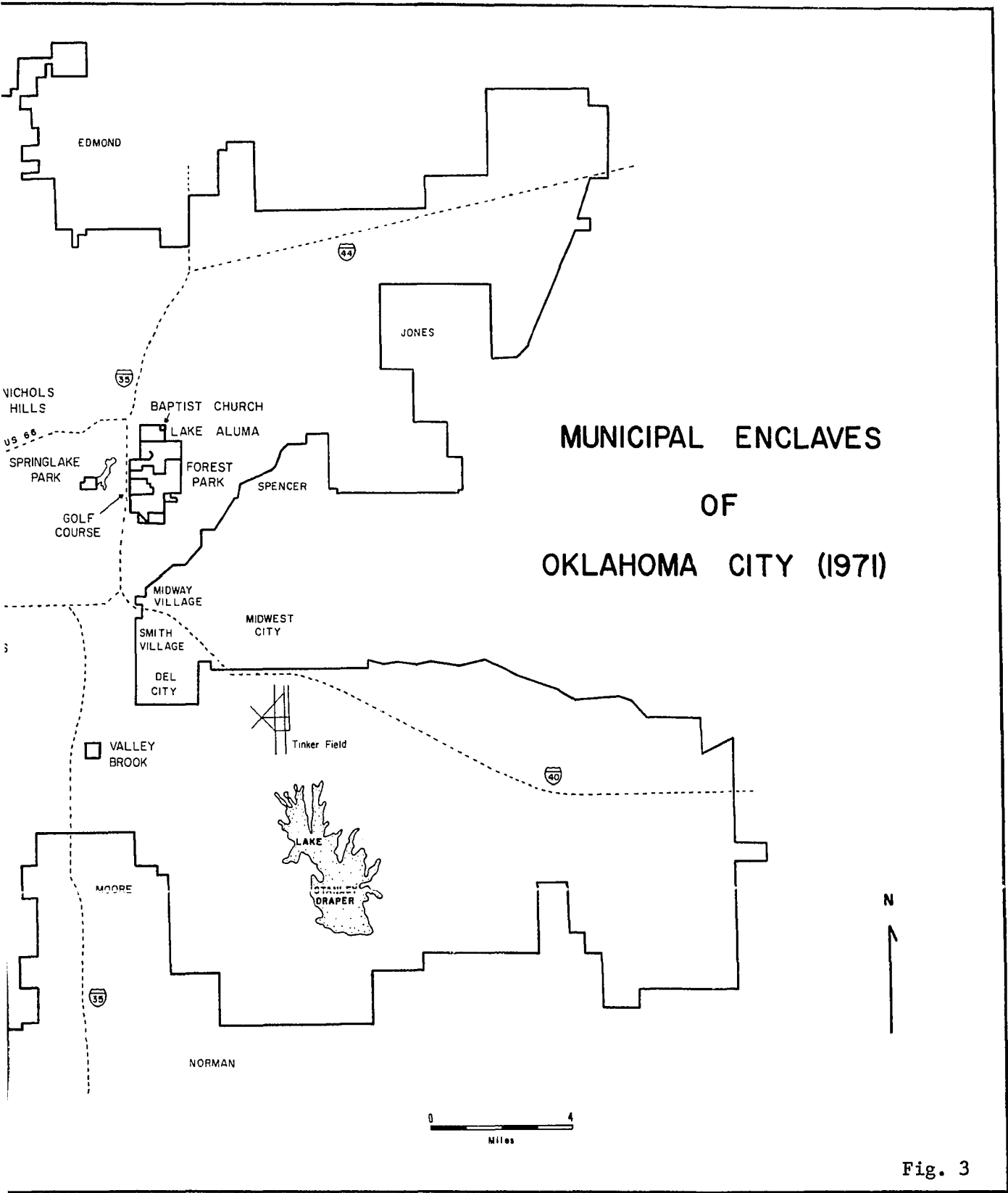


Fig. 3

incorporated as a town in 1910¹ with an initial area of less than one square mile² (Fig. 4). Not until a half century had elapsed did an annexation program appear desirable. In 1960, 12 square miles were added to the municipal area. Two years later, in 1962, the town tried to increase its area by an additional 29 square miles but, in so doing, got involved in a land dispute with Oklahoma City. In October, 1969, Mustang was given the legal status of a city, and plans were made to initiate a council-manager form of government.³

The land dispute with Oklahoma City arose when the seventeen square mile area south of Mustang and north of the South Canadian River was claimed by both cities⁴ at about the same time (Fig. 4). While this area, which has about 350 residents, was in dispute, and a court case was forthcoming, the registered voters in the disputed sector were permitted to vote in both Mustang and Oklahoma City elections.⁵ However, on September 11, 1970, the Oklahoma District Court ruled that Oklahoma City's annexation of the area in question was valid. On January 12, 1971, the Oklahoma Supreme Court upheld this ruling.

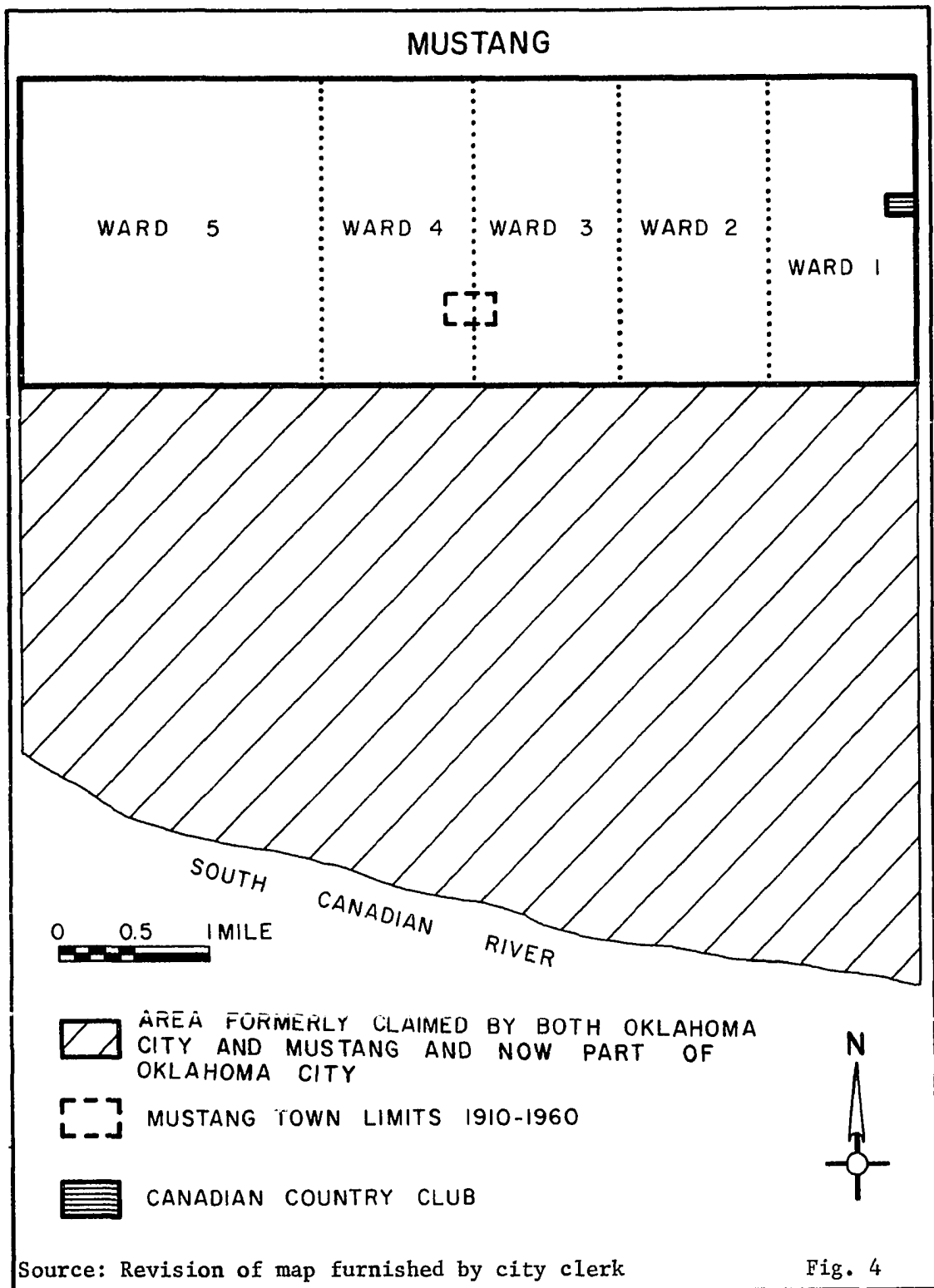
¹Dates of incorporation of the cities and towns were obtained from the Secretary of State's office at the Capitol Building in Oklahoma City.

²Including parts of Sections 33 and 34, T 11 N, R 5 W.

³The Daily Oklahoman, July 30, 1969, and October 18, 1969.

⁴The Daily Oklahoman, June 18, 1963. The dispute began when Oklahoma City annexed land south of Mustang and Piedmont at about the same time as the two smaller communities also annexed the area. The community of Piedmont later released 42 square miles of its claim when Yukon residents owning land there requested the de-annexation.

⁵Personal interview on April 8, 1970, with the Assistant City Clerk of Mustang, Mrs. L. Dunbar, who stated that the voters in this disputed area were actually voting in Mustang elections only.



Homes were first built in the Mustang community between 1890 and 1900, and by the latter year the settlement had some 150 residents. Three major reasons have been suggested for the development of the town: (1) there was a barge crossing just to the south of it over the Canadian River, (2) there was a supply of good grassland (mostly Johnson grass) sufficient to support a local grazing industry, and (3) it was situated along the old Chisholm Trail (now Mustang Road⁶) and served as a convenient point from which to ship cattle on the Frisco railway.⁷ In 1924 the state bank of Mustang had a serious bank robbery,⁸ and in 1927 a tornado nearly devastated the town. These two events, and loss of north-south traffic after the North Canadian River was bridged at Newcastle and Union City, contributed to a sharp decline in Mustang's economic activity. As recently as 1960 there were still only about 200 residents in the town. Between 1960 and 1965, however, a building boom attracting commuter residents developed, and the town experienced a renewed growth which is still evident today.⁹

⁶The Mustang Mirror (published in Yukon), July 26, 1967, carries pictures of this road (Main Street) as it appeared in 1917.

⁷The Mustang Enterprise, August 5, 1910, carried an advertisement telling how the Frisco lines served points west, north, and south. This paper was given second class mailing privileges at the post office of Mustang, under an act of Congress on March 3, 1879. It later ceased publication but was succeeded by The Mustang Mirror.

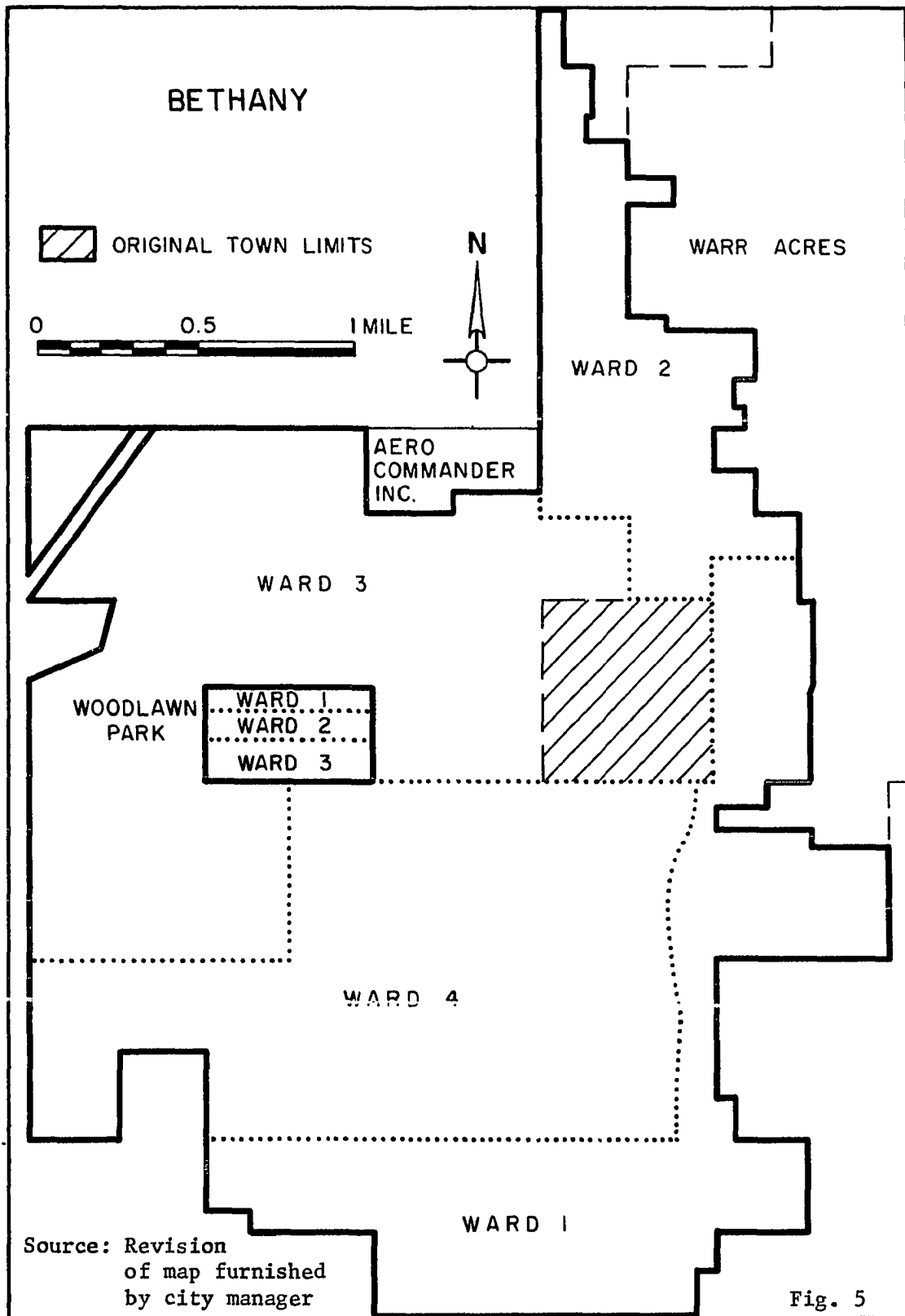
⁸St. Louis Post-Dispatch, June 8, 1924. The population of Mustang at this time was reported to be 175.

⁹The writer received much assistance on the historical development of Mustang from a personal interview on May 25, 1970, with Mrs. Susan Bowlare, who has lived in the community since 1910. Mr. William Floyd Stivers, an 85 year old resident, was also of some help; he served as a section foreman on the old Frisco line at the turn of the century.

Bethany. Bethany, about 20 miles to the northeast of Mustang, was incorporated as a town on August 8, 1910, taking its name from the Biblical community located a short distance east of the city of Jerusalem.¹⁰ A post office was established on March 11, 1913. Bethany had its origins in a strongly religious community called "Beulah Heights" in what is now the northwestern part of Oklahoma City, but later the nucleus of the community was moved four miles to the west. Two outstanding landmarks of early and present-day Bethany are the Nazarene Church, supported by the largest Nazarene congregation in the United States, with over 800 members, and Bethany Nazarene College, formerly Peniel College, founded in 1901. The town has been known, at least until recently, as the strictest "blue law town" in Oklahoma because of various social restrictions--no pool halls, no movie theaters, no beauty parlors, and no liquor or tobacco stores.

The original Bethany townsite of 160 acres (Fig. 5) centered upon four basic and related Nazarene institutions: the church, the college, a home for retired persons, and an orphanage. By 1920 the town had 485 inhabitants, and in the early 1930's it officially became a city. Annexation of adjacent land has been a slow and gradual process, with no massive areas added. The area of Bethany in 1971 was approximately five square miles. During the 1960's land was added to the city on the south and west, but the presence of Wiley Post Airport to the northwest blocked

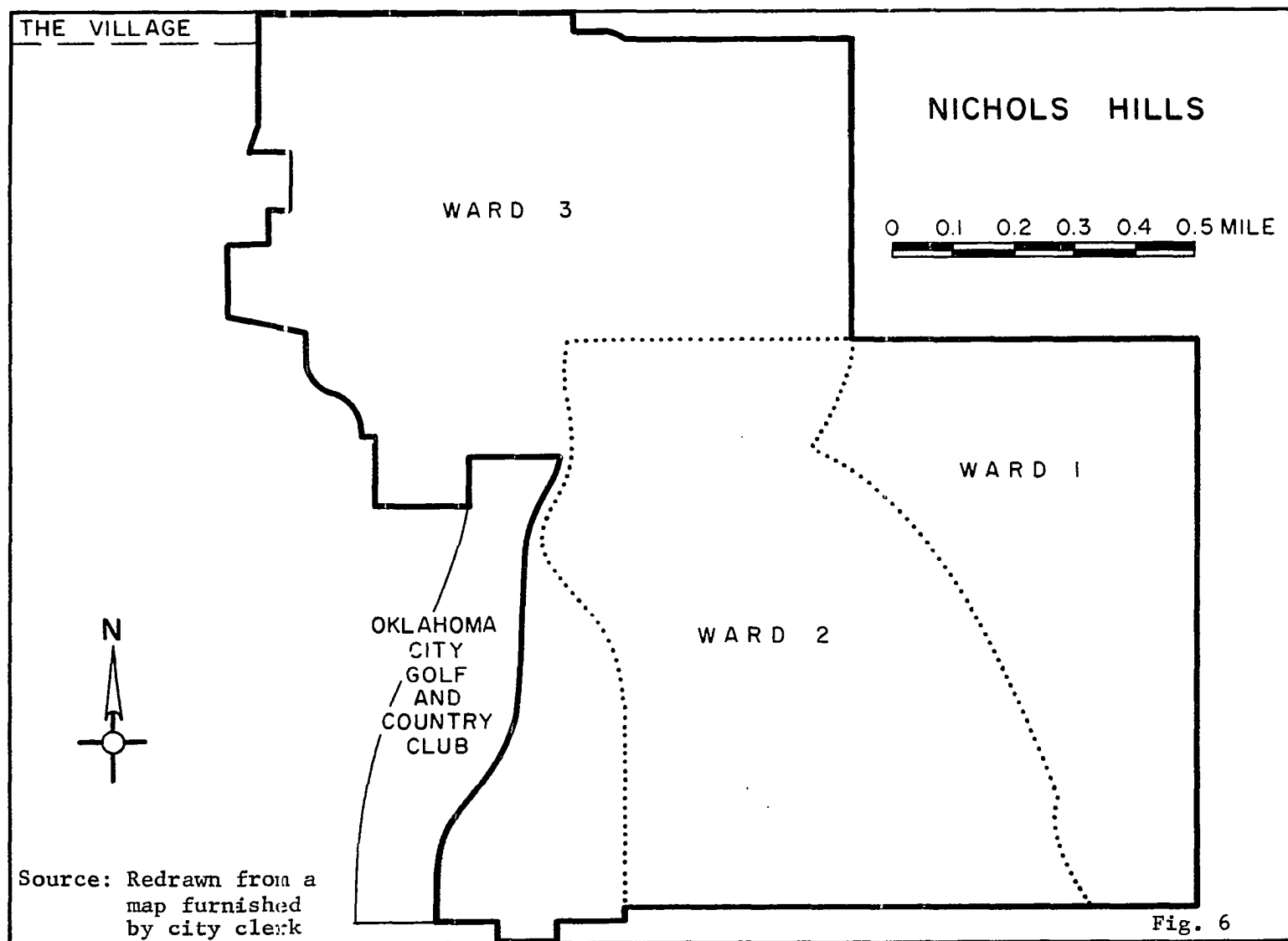
¹⁰George Shirk, Oklahoma Place Names (Norman: University of Oklahoma Press, 1968). This book was of major assistance in tracing the origin of the names of Oklahoma communities.



further annexation in that direction. With close to 22,000 people in 1970, Bethany is now first in population among the Oklahoma City enclaves.¹¹ Woodlawn Park is a small enclave within it.

Nichols Hills. The third oldest incorporated enclave is Nichols Hills (Fig. 6), situated a few miles to the north of Oklahoma City. In 1929, Dr. G. A. Nichols filed a plat for some 168 acres, later expanded to 350 acres, and on September 9, 1929, incorporated the area as a town. The settlement was officially named Nichols Hills in 1931. The purpose of forming the community was to develop a high class residential neighborhood, with three types of homes: the most imposing ones on large lots in the northern section, other two-story homes in the central section, and somewhat smaller single-story homes in the southern and eastern portions of the town. The reason for separate incorporation was to obtain improvement bonds without having to deal with the larger municipality. Oklahoma City leaders at the time thought that a new residential area seven to eight miles away from the downtown business district was not needed, and delayed any improvement action for the area. Nichols Hills, once organized, began to plan its own rather spectacular course of development, trying to create aesthetic beauty with long winding streets instead of the usual grid pattern blocks. By 1932 about 60 homes had been erected in the community, generally large, impressive ones, some of whose owners had benefited from the recently opened Oklahoma City oil field. Between 1932 and 1945, development in Nichols Hills was

¹¹Personal interview with Mr. Paul W. Rice, City Manager of Bethany, May 5, 1970. Also U. S. Bureau of the Census, Census of Housing, 1970 Block Statistics (Washington: U. S. Government Printing Office, 1971, Final Report HC(3)-191 Oklahoma City, Oklahoma Urbanized Area), p. 1.

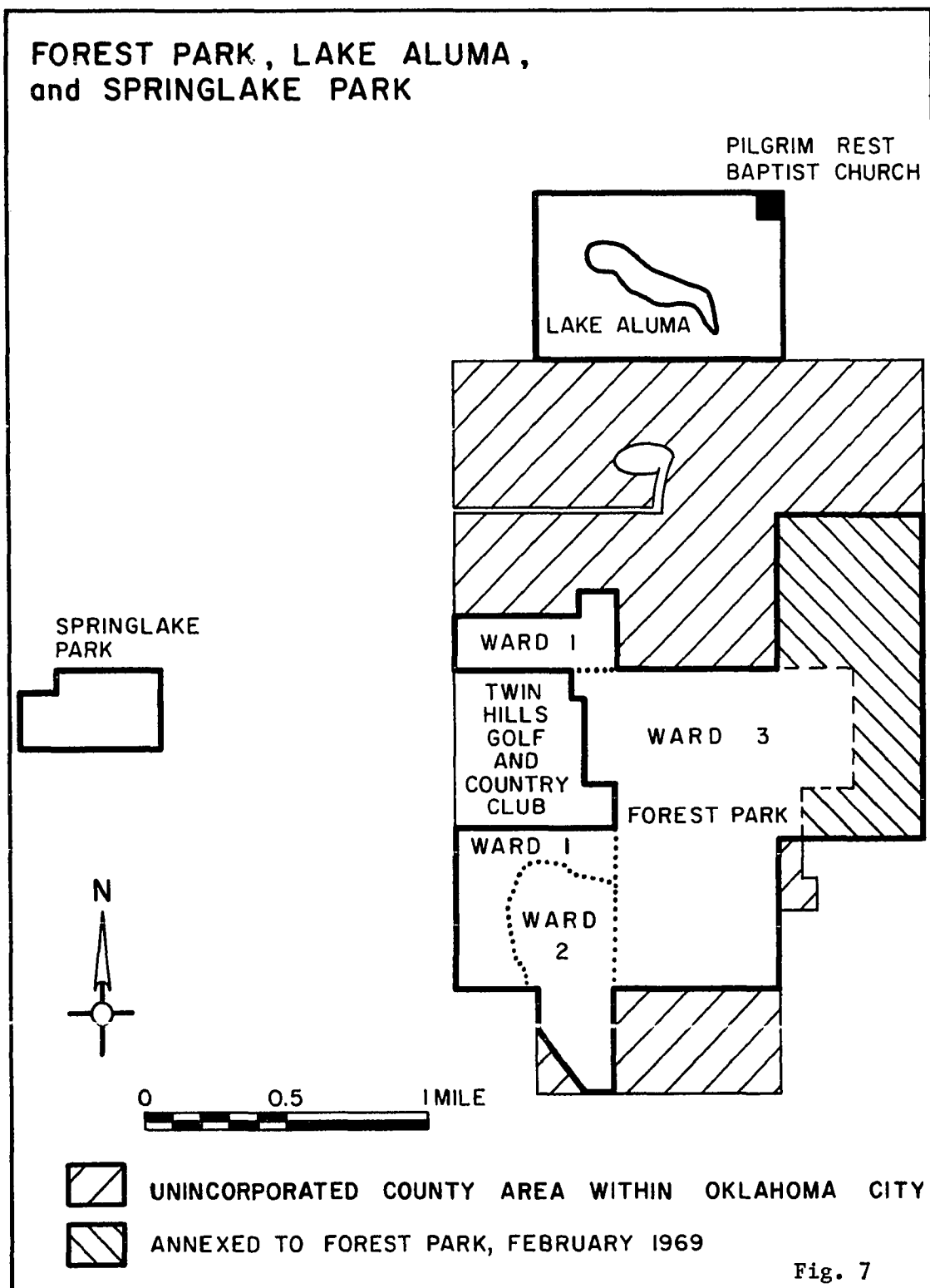


slowed by the economic depression and World War II. After 1945, however, there was a new spurt in growth, including an annexation on the southwest in 1948 and another on the northwest (the Wilshire section) in 1952. On April 21, 1959, Nichols Hills officially became a city. The first commercial development appeared in 1965, but it has been confined to the extreme southeastern part of the community.¹² In 1970 the total area of Nichols Hills was 1.75 square miles.

Springlake Park. Approximately one year after Nichols Hills was incorporated, on September 25, 1930, Springlake Park (Fig. 7) was incorporated as a town. Its present area is only 70 acres. Originally the town had six or seven homes, but of these only four remain, along with the amusement park and an adjacent parking lot, which together occupy nearly all of the available space. During the 1930's a grocery store was established within the town limits in order to serve picnickers and the immediate needs of the surrounding community. The original purpose of the Springlake Park development was to establish a recreational area for picnickers, fishermen, and campers. At present, the only activity in the town is the private amusement park which is open from April through September, with perhaps 400 people employed in the 135 to 140 seasonal businesses.¹³

¹²Personal interview with Mr. John W. Coyle, July 6, 1970. Mr. Coyle, one of the original developers of Springlake Park, is a resident of Nichols Hills, living there since 1932. He was one of the original members of Nichols Incorporated, and is now associated with the J. W. Coyle Company, located in Nichols Hills.

¹³Personal interviews with Mr. Marvin Staton, May 13, and July 2, 1970. Mr. Staton, the owner and operator of the amusement park, is a son of the original developer of the town.



Source: Based on map supplied by Oklahoma City Planning Department

Thus, of the eleven incorporated enclaves under discussion in this study, only four were established prior to 1931, Mustang, Bethany, Nichols Hills, and Springlake Park. Only the first three of these actually function as towns, with elected representatives serving significant numbers of people.

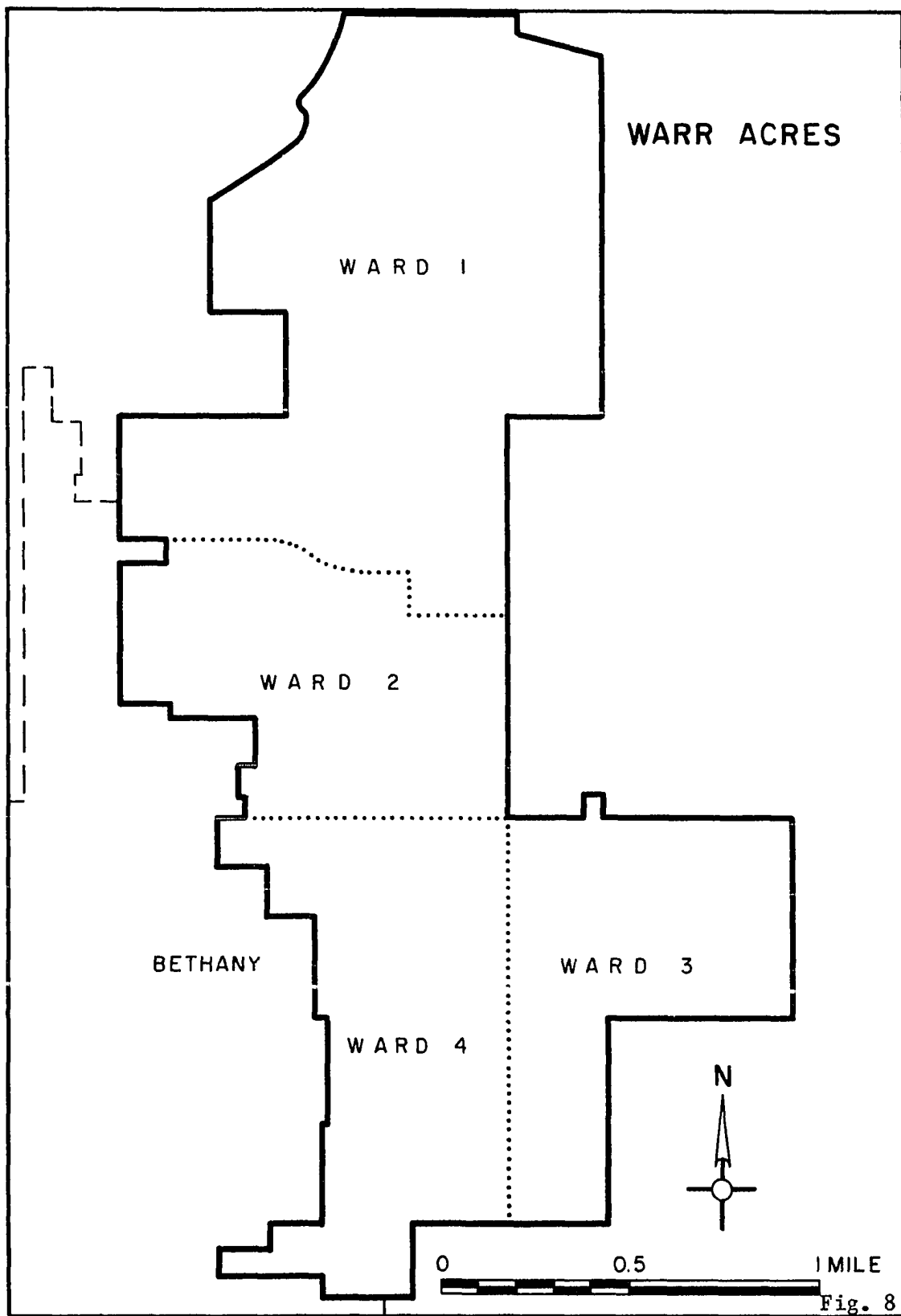
The Newer Incorporated Enclaves

In the period following World War II, a number of new incorporated units were formed on the urban fringe which later became enclaves of Oklahoma City. The new incorporations came in an era of rapidly increasing metropolitan population, during which clustered settlements were trying to acquire adequate urban services and still remain outside Oklahoma City. Through separate incorporation, the community leaders saw a way to block annexation by the larger city, perhaps hold down taxes, and hopefully achieve certain other advantages.

Warr Acres. The new town of Warr Acres was incorporated on February 26, 1948, but its legality was not fully established until 1949¹⁴ (Fig. 8). Named for Mr. C. B. Warr, an Oklahoma City developer and civic leader, the new community was incorporated to avoid possible annexation by adjacent Bethany and the imposition of Bethany's famous "blue laws."¹⁵ Although Warr Acres was several miles outside Oklahoma City's legal boundary at the time, the mayor, Ray Maxwell, was in favor of joining Oklahoma City. This proved to be not feasible, however,

¹⁴In 1949, the Oklahoma Supreme Court upheld the right of Warr Acres to exist as a municipality. The challenging lawsuit filed by the city of Bethany was lost when the court ruled that only the state can challenge a city's validity.

¹⁵Putnam City-Northwest News, August 22, 1968.



Source: Revision of map furnished by city clerk

because of the intervening distance involved. Having fewer than 2,000 residents, Warr Acres had to annex some surrounding areas in order to become a town with its own charter. In some instances, new residents were promised deannexation after incorporation.¹⁶ In 1961, Warr Acres was rechartered as a city. The prime goal of the residents at this time was to further fortify their community against unwanted annexation by the larger metropolis to the southeast. With a present area of 3.50 square miles and almost ten thousand residents,¹⁷ the "Courteous City," as Warr Acres calls itself, has maintained its existence with few territorial changes since incorporation. In May, 1969, it received from Oklahoma City some 22 acres of land, part of which had belonged to a gun club, in exchange for a nearby tract of approximately the same acreage.¹⁸

The Village. Development of the Village started in 1949, when Clarence A. Duffner purchased 135 acres from Dr. G. A. Nichols and began to build homes on 80 acres of it. Later he purchased another 80 acres. By early 1950, 150 lots had been developed, and the possibility of annexation by Oklahoma City or Nichols Hills was being explored. The predominant concern of the local residents was to avoid annexation by Britton, a town directly to the east. Oklahoma City's limits, however,

¹⁶Incorporation was approved by an 857 to 40 vote. Title 11, Section 558 of the Oklahoma Statutes states that any city or town containing a population of more than 2,000 inhabitants may frame a charter of its own government.

¹⁷The Daily Oklahoman, June 11, 1970.

¹⁸The Daily Oklahoman, April 25 to May 7, 1969. Oklahoma City was permitted to annex 21.5 acres of Warr Acres, and in return Warr Acres received 22.5 acres of Oklahoma City's area. The property belonging to the Twin Lakes Gun Club became a part of Warr Acres, while other property south of Wilshire Boulevard and west of Mac Arthur Boulevard was annexed to the larger city. This action was effective May 27, 1969.

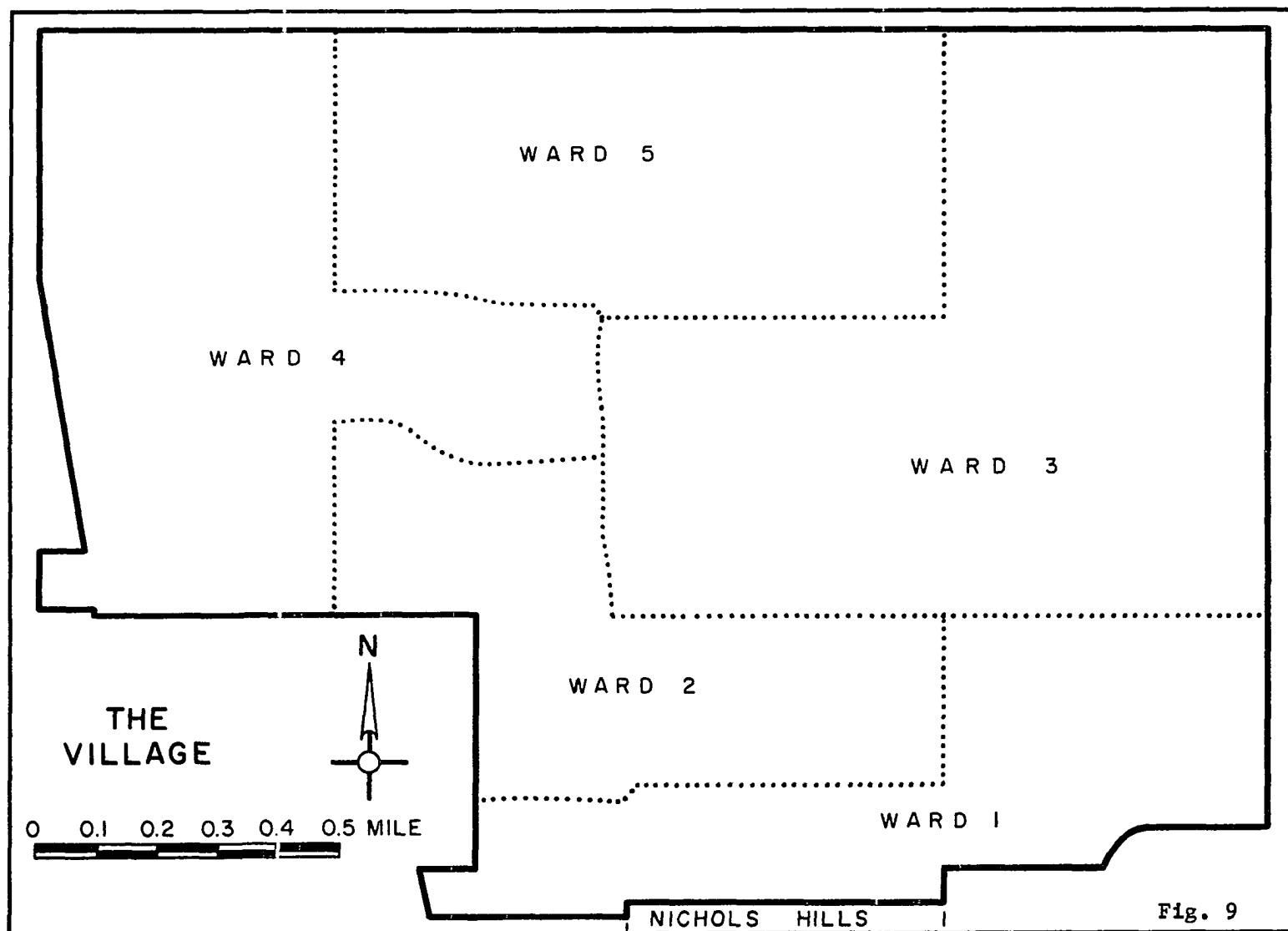
were too far to the south, and Nichols Hills decided that it did not want "wartime houses" of the sort then being financed by the Federal Housing Administration and Veterans Administration. The political leaders of the latter community considered these "wartime houses" incompatible with the finer Nichols Hills homes. An incorporation petition was then filed in the Oklahoma County Commissioners' office, and on January 24, 1950, the Village was incorporated as a town. The first election held in the three wards brought forth a total of only 13 votes, although at this time there were some 25 to 30 homes in the community. Three years after incorporation, large scale development got under way, and soon commercial establishments appeared in numbers, as, for instance, at Casady Square beginning in 1953.¹⁹ In 1959, with an area of 2.50 square miles, the Village became a city (Fig. 9). By this time both the Village and Nichols Hills were surrounded by Oklahoma City's municipal area. Some minor additions of territory in the 1960's have enlarged the area of the Village to 2.90 square miles.²⁰

Woodlawn Park. Surrounded by the city of Bethany (Fig. 5) is the town of Woodlawn Park,²¹ with an area of 80 acres, or a little more than .10 square miles. About 30 years ago, the residents of the community had

¹⁹Personal interview with Mr. Floyd A. Harrison, July 8, 1970. Mr. Harrison, along with Mr. Duffner, was an early developer of the Village area. He was instrumental in forming the petition for incorporation and since 1948 has lived in the area where he manages his own investment company.

²⁰Personal interview with Mr. Eugene L. Bumpass, City Manager and Clerk of the Village, April 17, 1970.

²¹According to Stanley Draper, former Manager of the Oklahoma City Chamber of Commerce, Woodlawn Park exemplifies the philosophy of "Here I run the show, but in Oklahoma City the developer is run by others."



Source: Revision of map furnished by city clerk

a disagreement with the Bethany Nazarene Church. Deannexation from Bethany followed, and for some years Woodlawn Park functioned as an unincorporated area within the Bethany city limits. On July 28, 1952, the enclave community was incorporated as a town, and by 1960 it had some 130 people. Its present population lives in 51 private residences and eight small apartment units, on large lots aligned along a rather attractive boulevard. There are fine, big trees in the boulevard-park. Originally the area was part of a timber reserve used to supply Fort Reno. Soldiers from the fort were stationed here to guard the area which at that time was known as "Council Grove."²²

Lake Aluma. North of the larger community of Forest Park, and separated from it by some unincorporated land, is the town of Lake Aluma (Fig. 7). A prominent feature of the town site is the small lake formed by damming an intermittent creek which drains an area between Northeast 50th and Northeast 63rd streets. The land was acquired by a group of local medical doctors with a view to developing the area, and by 1925 the dam was built. Week-end cottages were erected around the lake, and for some years the area was used mainly for fishing and hunting. About 1928, some of the owners formed the Aluma Chulosa Preserve Association, which functioned as a hunting club. By 1930, after the bridge was built over Deep Fork Creek, improving access to the area, several permanent homes were erected. At the time of incorporation as a town, on September 15, 1952, there were still only about 10 families in Lake Aluma. At present

²²Personal interview with Mr. Frank Braniger, May 25, 1970. Mr. Braniger's father was the original developer of the area in 1901. According to Mr. Braniger, who was 85 years old at the time the writer visited with him, roads were laid out by 1923, but development did not take place until 10 to 15 years later.

there are some 30 residences in the area, with a population of about 90 persons.

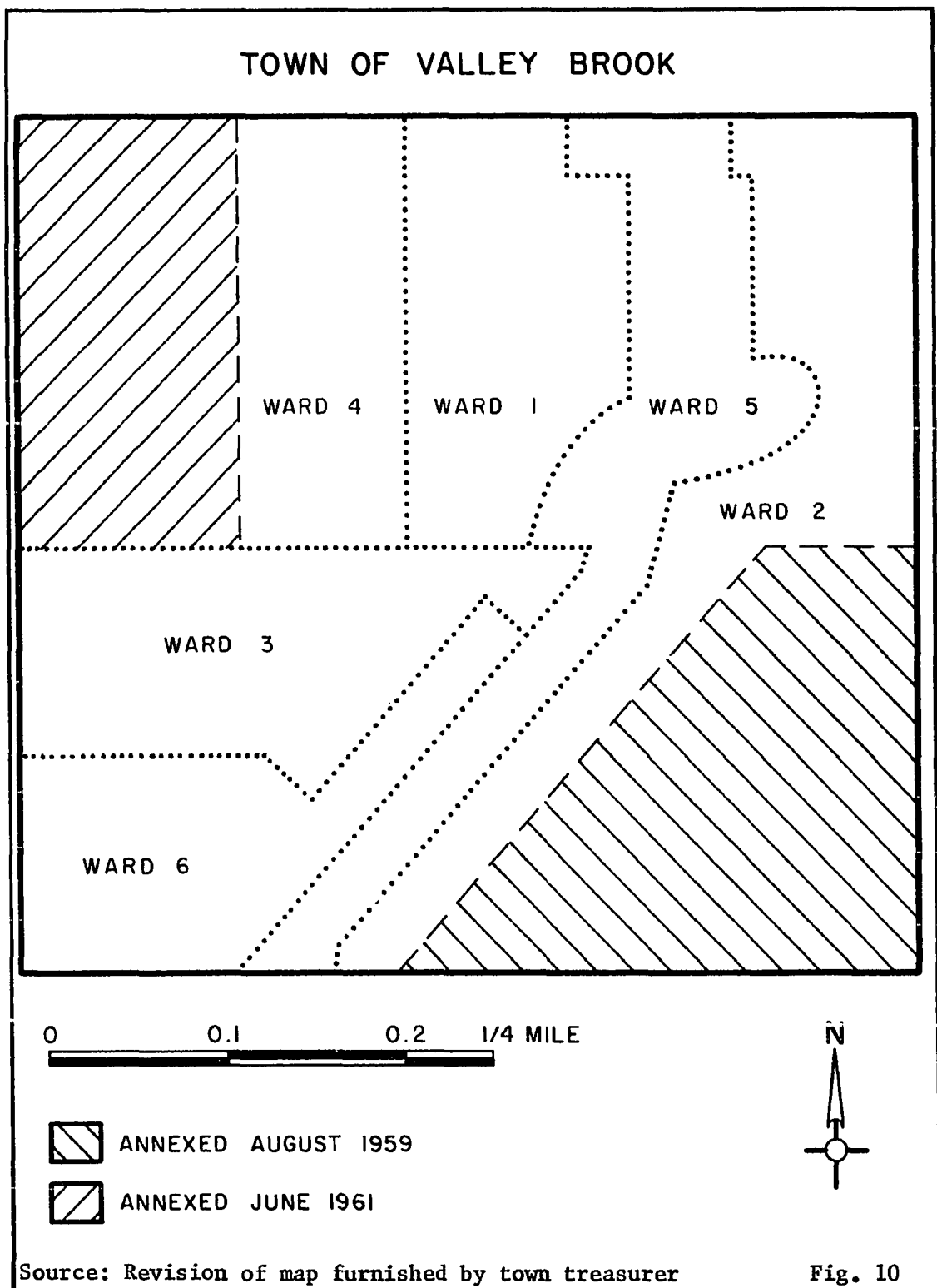
The town of Lake Aluma is not the same as the Lake Aluma Recreational Club. The town includes about 200 acres, of which the club owns 125 acres. In order to enjoy the club's acreage and lake, one must be voted into the club by the members who live in the town. Thus, one may purchase a home in the town but have no access to the club's privileges, the lake, and the adjacent wooded area. However, this possibility of exclusion, the writer was informed, rarely occurs.²³

Valley Brook. Another small community that has resisted Oklahoma City's annexation program is Valley Brook (Fig. 10). When incorporated as a town on May 21, 1956, it had a population of 1,378 people living on about one-quarter of a square mile of land.²⁴ Homes were first built in the district about 1953 by developer Herman Merson. Since the area lay outside of Oklahoma City's jurisdiction, the residents of Valley Brook decided to incorporate, realizing that police protection was poor and coordinated utilities were needed. At the outset, a dense cluster of small homes and a minor shopping center comprised the town.²⁵ Since its incorporation the town has carried out two small annexations, in August,

²³Personal interview with Mr. and Mrs. F. H. Buchanan, June 27, 1970. They have been residents of Lake Aluma for 17 years and are presently living in the first home built in Lake Aluma, in 1924. The house was formerly the home of Mrs. Corre Lynch.

²⁴The Oklahoma City Times, May 3, 1956, and June 3, 1956. The articles include an excellent discussion of the pros and cons of the incorporation question as seen by the residents. Eventually, the vote in favor of incorporation was 183 to 130.

²⁵Personal interview with Mr. David Shapard, July 2, 1970. Mr. Shapard has been the town attorney for Valley Brook since its incorporation.



1959, and June, 1961, and has maintained a strong independent course, as for example, in 1962, when it passed an ordinance which forced delivery truck drivers to park outside the town limits and walk to the homes if the delivery service owners did not obtain a special town permit to make deliveries.²⁶ Valley Brook has had a history of internal dissension, and there have been a number of attempts to dissolve the community and seek annexation to Oklahoma City. So far these efforts have been unsuccessful.²⁷ At present the town has a population of some 2,500 residents.²⁸

Forest Park. Forest Park (Fig. 7), now an incorporated town entirely residential in character, with 835 residents, was first settled in the 1890's. The original settlement extended from Coltrane Avenue to Bryant Avenue between 36th Street and 39th Street, and occupied an area of somewhat more than a square mile. There were about 15 families in the initial community, some of them living on quarter-section farms.²⁹ Not until 1930-1935 did significant urban-type settlement take place, but in that period a number of homes were build along a small unnamed creek on the Schroeder and Smith farms. On July 16, 1956, the area was incorporated as a town so the residents could remain outside the "high tax area" of Oklahoma City. A threat of annexation by Oklahoma City was apparent at

²⁶The Daily Oklahoman, April 4, 1962.

²⁷The Daily Oklahoman, June 11, 1963.

²⁸Personal interview with Mr. R. L. Greb, town treasurer of Valley Brook, May 11, 1970. Also U. S. Bureau of the Census, Census of Housing, op. cit., pp. 1, 79.

²⁹Personal interview with Mrs. Freeda M. Skinner, a 76 year old resident of Forest Park, June 24, 1970. Mrs. Skinner was born and reared in the area, and her family was one of the original '89ers, staking a claim at NE 36th and Sooner Road, one mile east of Coltrane Avenue.

the time. Subsequently, several additional areas have been added to Forest Park, including an irregular tract in the south, the Coltrane Estates in the northeast, the Starwood area, and, in February, 1969, a new tract on the extreme northeast. The incorporated area of the town is now about 960 acres.³⁰ In the 1960's the people settling here were mainly of the professional class, including a number of lawyers and doctors. During the past three years or so, there has been a substantial influx of Negro residents. About 25 per cent of the present population of Forest Park is black, while the other enclaves under study are "lily-white." Integration seems to have been achieved with no significant social problems or out-migration of white residents.

Canadian Country Club. The final incorporated enclave to be considered is unique within the greater metropolitan area. Located on the eastern margin of Mustang, just outside the Oklahoma County line, is the Canadian Country Club (Fig. 4). Surrounded on three sides by the city of Mustang, the place was known during the early 1950's as the "Pink Elephant Club." An annexation move by Oklahoma City influenced the incorporation of the club as a town on June 27, 1958.³¹ The present political identity of this night club, which operates from midnight to

³⁰Personal interview with Mr. Raymond E. Poe, Town Clerk of Forest Park, June 29, 1970.

³¹11 O. S., 1961 S1971. Before 1961, under state law an area could incorporate as a town provided there were at least three people living in it. Smith Village and Springlake Park are two comparable examples. Smith Village is now an incorporated enclave of Del City, consisting of a single farm with a family of six people. In 1961, the state law was amended to prohibit new incorporation within five miles of the city limits of a city of 200,000 people or more, and within three miles of a city of less than 200,000 population.

6:00 a.m. on its exclusive urban territory of five acres, can only be dissolved by amending the existing law or by permission of the owner.³²

In portraying the newer incorporated enclaves, a distinction in their character should be noted--only Warr Acres and the Village contain both residential and substantial commercial features. The others are exclusively residential enclaves except for two unusual types: the Canadian Country Club, whose political area contains only the club building and one residence, housing a family of three, and Springlake Park which has recreational facilities open only during the summer.

The Unincorporated Enclaves

The Stockyards. One of the oldest enclaves within Oklahoma City's municipal area is the Stockyards (Fig. 3), located to the southeast of the central business district, on the south side of the North Canadian River. Commercial activities began here around 1910. The developers negotiated a general agreement with Oklahoma City stating that industries would be allowed to establish here, under a promise that the area would never be annexed to the city. The objective of the developers was to avoid city taxes.³³ Packing industries were the first to establish on the 196 acre tract. Morris and Company (later sold to Armour), Schwartzchilds and Sulzburger (later sold to Wilson), and Products

³²Additional information about the club is unavailable because the owner was totally uncooperative in granting a personal interview. No doubt this was a response to the several police raids which have been made at the club.

³³Personal interview with Mr. Stanley Draper, former Director of the Oklahoma City Chamber of Commerce, April 10, 1970.

Manufacturing Company (a soap plant) were the three original industries.³⁴ The packing industries prospered for a time, but eventually encountered some of the problems affecting inner-city locations elsewhere in the country, and in 1963 the Armour packing plant was closed. The major concern in the Stockyards area at present is the Wilson plant employing some 1,200 people, but adjacent to it are the Products Manufacturing Company plant employing about 25 people, and six small related organizations, mostly of a service nature.³⁵ The area lost 20 acres in the southeastern corner when the city annexed the so-called "Industrial Addition" in 1968; this tract had been platted into small lots and had experienced a different type of development than the remainder of the Stockyards area. An important focus of activity in the Stockyards district is the Exchange Building which serves as an office complex for some 25 livestock commission firms employing about 200 people.

Aero Commander Incorporated. Adjacent to the municipal area of Bethany on the north side of that city, is the Aero Commander aircraft plant. Aero Commander is a division of the North American Rockwell Corporation. Originally based in California, where it had been organized as the Aero Design and Engineering Company, the owners of Aero Commander decided to move their operation to Oklahoma. Encouraged by the Oklahoma

³⁴Personal interviews with Mr. O. L. Holderby, President of the Oklahoma National Stockyards Company, May 10 and July 3, 1970. Mr. Holderby has served as president for 27 years.

³⁵Another unincorporated area of some five acres east of the Stockyards contains two small meat processing plants. This area is bounded on the west by McKinley Avenue, on the east by Douglas Avenue, on the north by 15 Avenue, and on the south by 16th Avenue. The two companies are the Oklahoma Pride Meats Company, employing 40 people, and the Canadian Valley Meat Company, employing 70 people.

City Chamber of Commerce, they located at Tulakes Airfield (now Wiley Post Airport).³⁶ By 1951 the move from California was completed, and production of light aircraft was started in the airport hangar building. In 1956-1957, a backlog of orders led to a decision to expand the facilities on the south side of the airport (Fig. 5). In early 1958, however, the initial plant was destroyed by fire. The new plant, now fully developed, produced its first plane in late 1958.³⁷ The present facilities, occupying approximately one-tenth of a square mile, employ about 1,300 people. In 1970, the plant was producing some 120 twin-engine executive planes per year.³⁸

Sportsman's Country Club. Another unincorporated area of Oklahoma County enclosed within the Oklahoma City municipal limits is the 60 acres occupied by the Sportsman's Country Club.³⁹ Originally organized in 1949 as a hunting club with a rifle range, it occupies the site of what was formerly the Dolese Company gravel pit (Fig. 3). It now functions as a social club, having about 600 active members and some 1,100 stockholders.

³⁶Originally, Wiley Post Airport was located at the northeast corner of Britton Road and May Avenue. The building structure there which was employed as a hangar now serves as a shopping plaza in the Village.

³⁷In 1958, Rockwell Standard acquired the Aero Design and Engineering Company and changed its name to Aero Commander, Incorporated. Later, in September, 1967, North American Aviation and Rockwell Standard merged to form North American Rockwell, and Aero Commander, Incorporated became a division of this company.

³⁸Personal interview with Mr. A. F. Balaban, July 7, 1970. Mr. Balaban is Director of Public Relations and Communications for the General Aviation Divisions (Bethany plant) of North American Rockwell. Recently, on October 5, 1971, the plant was annexed to the city of Bethany.

³⁹According to the Oklahoma County Treasurer's Office, the Sportsman's Club Incorporated purchased the land on October 25, 1948.

One can only become a member by purchasing a share of stock. Oklahoma City could annex the club without any difficulty, since it surrounds the club on at least three sides. However, there is a "gentlemen's agreement" which allows the club to remain county area.

Remaining County Enclaves

The remaining unincorporated enclaves include two golf courses and a church. The Oklahoma City Golf and Country Club (Nichols Hills map, Fig. 6) and the Twin Hills Golf and Country Club (Forest Park map, Fig. 7) control the two golf courses. The Baptist Rest Pilgrim Church, with an all-black membership,⁴⁰ occupies a tract of two acres at the extreme northeastern corner of Lake Aluma (Fig. 7). Some additional county land is present between Lake Aluma and Forest Park (Fig. 7), but this area contains only a few homes and no special economic or social activities of an urban type.

In summary, only three of the unincorporated enclaves considered in this study have major economic activities, the Stockyards area, the five acre tract containing the two smaller meat packing plants, and the Aero Commander tract, now part of Bethany. The other such enclaves provide only limited recreational or social functions, but they do play an urban-type role in the total setting of the metropolitan area.

⁴⁰The presence of this church relates to the early Negro settlement in the area.

CHAPTER V

THE SPATIAL AND SOCIO-ECONOMIC-POLITICAL CHARACTER OF THE INCORPORATED ENCLAVES

The purposes of this chapter are to identify the socio-economic-political character of the incorporated enclaves, using the responses to the 775 questionnaires (Appendix A), and to explain the technique employed in grouping the enclaves according to their spatial arrangement or position within the municipal area of Oklahoma City. Through direct examination and computer analysis of the questionnaire data, an effort is made to understand what the nine enclave cities and towns are really like. Are they similar or different according to their spatial arrangement and to selected socio-economic-political variables, and if different, in what way? The evident character of the enclave cities and towns will then be related to the problem of their association with the larger municipality, Oklahoma City. In subsequent chapters, this relationship will be measured by: (1) the extent to which they secure services from the larger city, (2) their acceptability responses towards the larger city, and (3) their political attitudes and functional orientation towards the larger city. Along with analyzing the nature of the relationship of the individual communities, an effort is made to determine whether the spatial arrangement and the socio-economic-political character of the enclave cities and towns somehow correlates with the individual enclave's degree of association with Oklahoma City.

Before processing the data, a question regarding the technique of analysis had to be considered. Should the enclave towns be examined on an individual basis, or would some grouping of the enclaves facilitate analysis and at the same time reveal significant patterns of association? It was decided to group the enclave towns on the basis of similarity in their spatial and socio-economic-political variables. This grouping permitted the analysis to focus more sharply upon the main features of the enclaves and greatly simplified the problems of portraying their structure and relationships with the larger city.

A method of spatial grouping seemed fairly obvious. From Fig. 3, it can be observed that the enclave cities and towns fall into two distinct groups: (1) those that are joined (i.e., are contiguous) with other incorporated enclave towns, and (2) those that are isolated or are joined only with unincorporated areas. On this basis the nine incorporated enclaves were spatially categorized into two distinct groups. Mustang, Valley Brook, Forest Park, and Lake Aluma were considered as one group, all of these being spatially isolated within the Oklahoma City municipal area. It should be noted, however, that Mustang is joined to the incorporated Canadian Country Club. Since the club does not function as a normal incorporated unit with elected officials and registered voters, Mustang can reasonably be considered as functionally isolated. Springlake Park, although an incorporated isolated enclave, was not considered suitable for analysis because only nine registered voters lived there at the time of the field survey, and local elections were seldom held. The second spatial group includes those enclave towns that are joined--that is,

are contiguous with other incorporated enclaves. This second group is comprised of the following centers: Bethany, Woodlawn Park, Warr Acres, Nichols Hills, and the Village. The two major enclave groups, then, were characterized for analytical purposes as those which are spatially isolated and those that are spatially contiguous. Such a spatial grouping, it was thought, would probably affect the nature of the ties with the larger city, in that those which were spatially contiguous would probably tend to pool their resources and join in mutual service projects that would prove feasible because of the communities' close areal proximity to each other. This supposition is tested by analysis in later chapters. No attempt is made to deal with the unincorporated enclaves since they present other kinds of problems for investigation which this study has only briefly considered.

Dealing meaningfully with the socio-economic-political variables proved to be a much more complicated undertaking. Sixteen independent variables were selected as determinants of the socio-economic-political character of the nine enclave cities and towns. The first two socio-economic characteristics examined were the length of present residence and place of previous residence of the respondents in each of the nine enclaves included in the study. The first variable was chosen to determine whether longer, more deeply rooted ties of the registered voters in a town influence the town's relationship with the larger city. Previous residence information would indicate the frequency with which Oklahoma City was the former home of the registered voters in the enclaves under study. It was assumed that former residents of Oklahoma City might well

be more aware of political affairs within the larger city than of those in their present community. Yearly family income, religious affiliation, and level of education were chosen as other useful socio-economic indicators of the character of the local enclaves. Three additional socio-economic variables used are total population, population density, and percentage of registered voters presently working in Oklahoma City. These eight socio-economic variables are listed in Table IX.

Political variables selected for study include party affiliation, a traditional factor in town characterization, and political awareness. The ability of registered voters to name their local elected officials was taken as one indicator of their political awareness, the assumption being that voters who profess strong individuality and claim independence of the larger city would be more acutely aware of their local leadership than of the political leaders of Oklahoma City. The two remaining political variables chosen were the age and area of the town where the respondents lived. The assumption here was that the longer a town had existed as an incorporated unit, the greater its ability to achieve functional independence from Oklahoma City. The size factor, on the other hand, would show how well an enclave town had asserted its own right to grow and mature. The eight political variables, along with the socio-economic variables, are listed in Table IX.

The sixteen variables selected for analysis were not the only ones that could have been employed. In light of the personal interview technique used for the data collection, however, they seemed to represent an adequate sample of important and useful information applicable to the

TABLE IX
VARIABLES USED IN THE
FACTOR ANALYSIS TECHNIQUE

Socio-Economic Variables

1. Length of Residence
2. Place of Previous Residence
3. Yearly Family Income
4. Religious Affiliation
5. Educational Level
6. Enclave Population
7. Population Density
8. Per Cent of Work Force Employed in Oklahoma City

Political Variables

1. Political Party Affiliation
2. Ability to Name Mayor of Local Town
3. Ability to Name City Manager of Local Town
4. Ability to Name Local Councilman
5. Ability to Name Oklahoma City Mayor
6. Ability to Name City Manager of Oklahoma City
7. Age of Enclave (from date of incorporation)
8. Area (in square miles)

study problem, and also information of a type that would be given quite freely by the registered voters.

After some consideration of the best method for handling the sixteen variables, it was decided to employ factor analysis. This technique seemed most applicable to the research problem, for it can be used to reduce a large number of variables (in this case, sixteen) to a smaller number of conceptual variables.¹ The underlying assumption is that if there is a large number of interrelated variables, the relationships between them may be due to the presence of one or more underlying variables, or "factors," which in turn are related to the primary variables. According to Blalock,

Perhaps the main value of factor analysis is that it enables one to replace a large number of variables which may have very little theoretical meaning with a much smaller number of conceptual variables which may make very good sense theoretically.²

Within geographical literature there are several recent examples of the use of the factor analysis technique.³ A particularly good one is that of Leslie J. King who employed it in describing and analyzing the underlying structure of the Canadian urban system.⁴ He selected some 50

¹Factor analysis is of little value if the factors obtained cannot be identified. Some other drawbacks of factor analysis are considered by R. J. Johnston, "Some Limitations of Factorial Ecologies and Social Area Analysis," in Economic Geography, XLVII (Supplement, June, 1971), 314-323.

²Blalock, Jr., op. cit., p. 384. For a fuller explanation of factor analysis methodology, see Chapter 21.

³For example, see Philip H. Rees, "Factorial Ecology: An Extended Definition, Survey, and Critique of the Field," Economic Geography, XLVII (Supplement, June, 1971), 220-233.

⁴Leslie J. King, "Cross-Sectional Analysis of Canadian Urban Dimensions: 1951, and 1961," The Canadian Geographer, X (December, 1966), 205-224.

characteristics of a demographic, economic, social, and locational nature and applied them to 106 Canadian cities for the years 1951 and 1961. Through factor analysis he was able to assign the 106 cities to eleven different groups. By plotting the so-called factor scores on a vertical X-Y axis, he could not only identify similar groups of cities but could also evaluate the strength of the associated characteristics, or variables, for each of his groups. King's general approach is applicable to this study, although instead of his 106 cities, only nine cities are to be grouped on the basis of their sixteen variable characteristics. Also, Brian Berry and Philip Rees, employing factorial ecology analysis in their study of Calcutta, lend further support to the use of factor analysis as the technique to utilize, as it directly relates to this researcher's investigation.⁵ The following paragraphs will outline the procedural steps followed in the factor analysis technique.

A necessary first step was to simply list the data concerning the sixteen variables (Table X). Most of these data were tabulated from the responses given by the registered voters and shown on the questionnaires. Appendix B lists the various totals and percentages for each of the nine enclave towns. Table XI shows the factor matrix for the socio-economic-political variables after rotation,⁶ and Table XIV lists the factor scores for each of the nine enclaves. On examining Table XI, it appears that there are five factor variables that account for 93 per cent of the total

⁵Brian J. L. Berry and Philip H. Rees, "The Factorial Ecology of Calcutta," American Journal of Sociology, LXXIV (March, 1969), 445-491.

⁶Orthogonal (perpendicular) rotation with a varimax solution.

TABLE X

SOCIO-ECONOMIC-POLITICAL DATA FOR THE NINE INCORPORATED ENCLAVES

Variables	Bethany	Mustang	Nichols Hills	Warr Acres	Village	Woodlawn Park	Lake Aluma	Valley Brook	Forest Park
1. Length of Residence-- Median Years	6.5	4.4	9.0	8.4	6.8	10.1	6.6	6.7	10.3
2. Place of Previous Residence-- Per Cent									
Oklahoma City	31	59	66	37	38	42	75	53	82
Same or Another Enclave	18	17	10	21	9	40	3	4	6
Outside Oklahoma City Area	51	24	24	42	53	18	22	43	12
3. Median Yearly Income-- Dollars	9,000	8,135	16,297	9,916	10,857	11,272	16,862	6,385	20,500
4. Religious Affiliation-- Per Cent Baptist	33	35	9	27	23	48	0	45	20
5. Median Educational Level ^a	3	3	5	3	4	3	5	2	4
6. Enclave Population-- 1970 ^b	21,785	2,637	4,478	9,887	13,695	184	89	2,503	835
7. Population Density-- Per Square Mile	4,357	220	2,258	2,825	4,721	1,800	45	10,012	557
8. Work Force-- Per Cent in Oklahoma City	41	50	35	49	46	40	53	53	53
9. Political Affiliation--									
Per Cent Republican	39	14	47	33	40	34	65	14	26
10. Ability to Name Mayor of Town--									
Per Cent Affirmative	32	41	26	25	6	2	73	39	31
11. Ability to Name City Manager of Town--									
Per Cent Affirmative	68	55	81	31	55	100	80	57	82
12. Ability to Name Local Councilman--									
Per Cent Affirmative	15	20	0	19	8	20	50	20	7
13. Ability to Name Oklahoma City Mayor--									
Per Cent Affirmative	59	51	90	60	71	66	80	55	82
14. Ability to Name City Manager of Oklahoma City-- Per Cent Affirmative	51	45	72	59	61	66	68	39	65
15. Age of Town (since incorporation)-- Years	60	60	41	22	20	18	18	14	14
16. Area-- Square Miles	5.00	12.00	1.75	3.50	2.90	0.10	2.00	0.25	1.50

^a For an explanation of these numbers see Appendix B, Table 1 d.

^b U.S. Bureau of the Census, Census of Housing, 1970 Block Statistics (Washington: U.S. Government Printing Office, 1971), Final Report HC(3)-191 Oklahoma City, Oklahoma Urbanized Area. Most of the above population figures were obtained from this 1971 census report. It should be noted, however, that some figures in this report appear to be inaccurate. For example, the census shows Lake Aluma as having 166 residents, while this researcher noted only 30 homes in the town with an actual population count of 89 people. Also, Valley Brook is listed as having a total population of 2,869 with zero per cent Negro. By adding the head count for the individual census tracts in this town, however, the total population comes to only 2,503. One census tract alone lists 1,415 people of whom 54 per cent are reported to be Negro. Further, when the head count for the individual census tracts is added for Woodlawn Park, the total population comes to 184. However, according to the U.S. Department of Commerce, Bureau of the Census, Census of Population: 1970 (Washington: U.S. Government Printing Office, 1970), PC (V1)-38, Oklahoma, p. 14, the population of Woodlawn Park is listed as 220. But this researcher noted only 51 homes and eight small apartment units. Therefore, errors in the census reports are such that this researcher relied on the two publications only when the figures seemed substantiated by his own field work.

TABLE XI

MATRIX SHOWING ROTATED FACTOR LOADINGS FOR
SOCIO-ECONOMIC-POLITICAL COMPONENTS ^a

VARIABLE	1	2	3	4	5
1. Length of Residence	.26	.35	-.30	.67	-.42
2. Place of Previous Residence					
Oklahoma City	.36	-.49	<u>-.78</u>	.06	.01
Same or Another Enclave	-.31	<u>.92</u>	<u>-.06</u>	-.01	-.02
Outside of Oklahoma City Area	-.20	-.13	<u>-.97</u>	-.06	.01
3. Median Yearly Family Income	<u>.74</u>	-.15	<u>-.53</u>	.24	-.15
4. Religious Affiliation	<u>-.89</u>	.38	.10	.08	-.15
5. Median Educational Level	<u>.95</u>	-.10	-.22	-.03	.01
6. Enclave Population	.06	.11	<u>.85</u>	-.30	-.15
7. Population Density	-.22	.01	<u>.88</u>	.21	-.27
8. Work Force in Oklahoma City	-.36	<u>-.71</u>	-.25	.16	.41
9. Political Affiliation	<u>.88</u>	.16	.15	.12	.41
10. Ability to Name Local Mayor	.20	<u>.55</u>	-.25	-.25	<u>.64</u>
11. Ability to Name Local City Manager	.37	<u>.46</u>	<u>-.52</u>	.24	-.02
12. Ability to Name Local Councilman	.02	-.07	-.15	.04	<u>.98</u>
13. Ability to Name Mayor of					
Oklahoma City	<u>.87</u>	-.07	-.28	.31	-.23
14. Ability to Name City Manager					
of Oklahoma City	<u>.83</u>	.31	-.25	.30	-.09
15. Age of Town	<u>-.00</u>	.19	.15	<u>-.93</u>	-.12
16. Area of Town	-.25	-.09	-.06	<u>-.93</u>	.05

^a

Orthogonal (perpendicular) rotation with a varimax solution.

variance among the nine enclaves in regard to the socio-economic-political variables. In other words, five factors have 93 per cent of the descriptive power, or significance, of the initial sixteen variables. The following figures show the total variance for the first four of these five factors: Factor One accounts for 39 per cent of the variance, Factors One and Two together account for 60 per cent of the variance, Factors One, Two, and Three account for 74 per cent of the variance, and Factors One, Two, Three, and Four account for 86 per cent of the variance.

Each of the five factors is characterized by a factor loading (see Table XI) of varying magnitude for each of the sixteen variables. The term factor loading⁷ refers to the degree to which a given variable is attached to a factor--that is, it measures the correlation of the variable with the factor. The loadings are the basis for interpreting the nature and meaning of the five factors. The loadings on the first two factors are the only ones which will be extracted and discussed. As mentioned previously, the first principal factor accounted for 39 per cent of the total variance, and the first and second principal factors together accounted for 60 per cent of the total variance. It should be recognized that Factor Three has classificatory power and increases the explained variance from 60 per cent to 74 per cent. However,

Normally, in typically complex scientific fields there will be more real influences at work than there are variables, counting all quite small influences, e.g., the influence of temperature and a passing jet plane on examination responses.⁸

⁷The correlation matrix provides the data from which the factors and factor loadings are computed.

⁸Raymond B. Cattell (ed.), Handbook of Multivariate Experimental Psychology (Chicago: Rand McNally and Co., 1966), p. 201.

Thus one can never extract all factors, but only attempt to give

maximum representation to the substantial and real factors while cutting off as much as possible of the error variance as will not simultaneously carry away too much real variance.⁹

As Cattell has indicated there is always a compromise which inevitably leads to a certain degree of arbitrariness,¹⁰ yet even though there is no single cut-and-dried mathematical formula, a decision can be made with some precision. It is apparent that by adding the third factor the significant level of correlation will be weakened. Further, by observing Table XI, Factor Three does deviate from the first two factors and thus detracts from these first two factors, thereby complicating the analysis. A further consideration involved the visual perception of the first two factors when plotted on an X-Y axis to determine clusterings. There is less danger of confusion and complication when the third factor is not displayed. This researcher recognizes the shortcomings of not considering Factor Three, but at the same time asserts that by standardizing the number of factors at two, the analysis is appreciably simplified, while simultaneously the descriptive power is maintained at a level suitable for the purposes of this study. Cottrell has urged this general approach by emphasizing that ". . . by taking the largest variance possible without being forced to an excessive number of factors . . ." one is able to obtain the so-called "comprehensive, nontrivial common variance."¹¹ If such procedure is not followed, then, ". . . one may (with small samples)

⁹Ibid., p. 204.

¹⁰Ibid., pp. 104-105.

¹¹Ibid., p. 205.

be taking in an appreciable amount of common error factors, to be sorted out in the rotation later, but one is also making sure of a very adequate . . . representation of the true factors."¹²

Factor One shows high positive factor loadings for income, education, political affiliation, and the naming of the mayor and city manager of Oklahoma City. This factor also shows a high negative loading for religious affiliation. Loadings associated with the first principal factor (Factor One) are displayed in Table XII. Because of the nature of the highest loading variables, this factor was assigned a summary dimension as "Status." This "status" factor has also been recognized and defined in a number of factorial ecology studies.¹³

The second principal factor (Factor Two) shows a high positive loading when the place of former residence is the local enclave town itself or another enclave, as evident in Table XIII. In addition, there is a significant factor loading of .46 and -.55 showing that with this second factor the tendency is for the residents to be able to name the local city manager but not the local mayor. The high negative factor loading of -.71 for place of work suggests that in the case of Factor Two, employment for the enclave residents is found mainly outside of Oklahoma City. Therefore, this second factor may be described as a summary dimension "Dormitory."

¹²Ibid.

¹³For example, see Wendell Bell, "Economic, Family, and Ethnic Status: An Empirical Test," American Sociological Review, XX (February, 1955), 45-52. The term "factorial ecology" is used to characterize studies involving the application of factor analysis to ecological study (man-environment system).

TABLE XII
LOADINGS ON FACTOR ONE

Variable	Loading	Brief Label
Education	.95	Highly Educated
Political Affiliation	.88	Heavily Republican
Ability to Name Mayor of Oklahoma City	.87	Highly Affirmative
Ability to Name City Manager of Oklahoma City	.83	Highly Affirmative
Income	.74	High Income
Religious Affiliation	-.89	Non-Baptist

Variance accounted for by Factor One is 39 per cent.

TABLE XIII
LOADINGS ON FACTOR TWO

Variable	Loading	Brief Label
Former Residence in Local Enclave or Other Enclaves	.92	Highly Dormitory
Ability to Name Local City Manager	.46	Affirmative Tendency
Former Residence in Oklahoma City	-.49	Long Standing Enclave Residents
Ability to Name Local Mayor	-.55	Negative Ability
Work in Oklahoma City	-.71	Employment Outside of Oklahoma City

Variance accounted for by Factor Two is 21 per cent (60-39).

The final procedural step is to use the factor scores to determine how each enclave city and town scores on the factors. Table XIV lists the various factor scores for each of the nine enclaves, as they were recorded on the print-out after computer analysis. By plotting the factor scores for the first two factors on a Cartesian co-ordinate system,¹⁴ a pattern results that allows a grouping of the enclaves. By observing Fig. 11, which shows the plotting pattern of the first two factors, a clearer understanding can be obtained regarding the clustering of these enclaves. It may be noted that two qualifications of this plot should be recognized. The clusters are based on very few observations (nine), and there is a weak association indicated between Factors One and Two. It is with these reservations in mind that the following observations are made. For the Status Factor (Factor One), the scores range from 2.26 for Woodlawn Park (very high status) to -1.53 for Valley Brook (very low status). However, for Factor Two, dormitory, the scores range from .62 for Bethany (high dormitory), to -1.10 for Valley Brook (low dormitory). Therefore, most of the strong differences occur in the Status Factor (vertical axis). Fig. 11 shows the grouping of the nine enclaves on the basis of their position relative to each other, taking into account the character components of the first two principal factors. No doubt there are other ways to group, especially with such a small number of observations. However, after careful consideration and consultation, the decision was to place the enclaves into three groups for analytical purposes. Inspection of Fig. 11 indicates that

¹⁴The name given to a system of two co-ordinate axes (x-axis and y-axis) perpendicular to each other.

TABLE XIV
FACTOR SCORES FOR THE NINE
ENCLAVE CITIES AND TOWNS

CITY or TOWN	FACTOR				
	1	2	3	4	5
Bethany	.104	.620	1.381	-.983	.063
Forest Park	.233	-.890	-1.383	.679	-1.122
Lake Aluma	1.304	-.552	-.505	.190	2.182
Mustang	-1.046	-.214	-.969	-2.097	.107
Nichols Hills	1.487	.208	-.174	-.330	-1.258
Valley Brook	-1.531	-1.103	.377	.978	.143
Village	.379	-.326	1.345	.319	-.526
Warr Acres	-.381	-.002	.672	.306	.217
Woodlawn Park	2.260	-.547	-.744	.939	.194

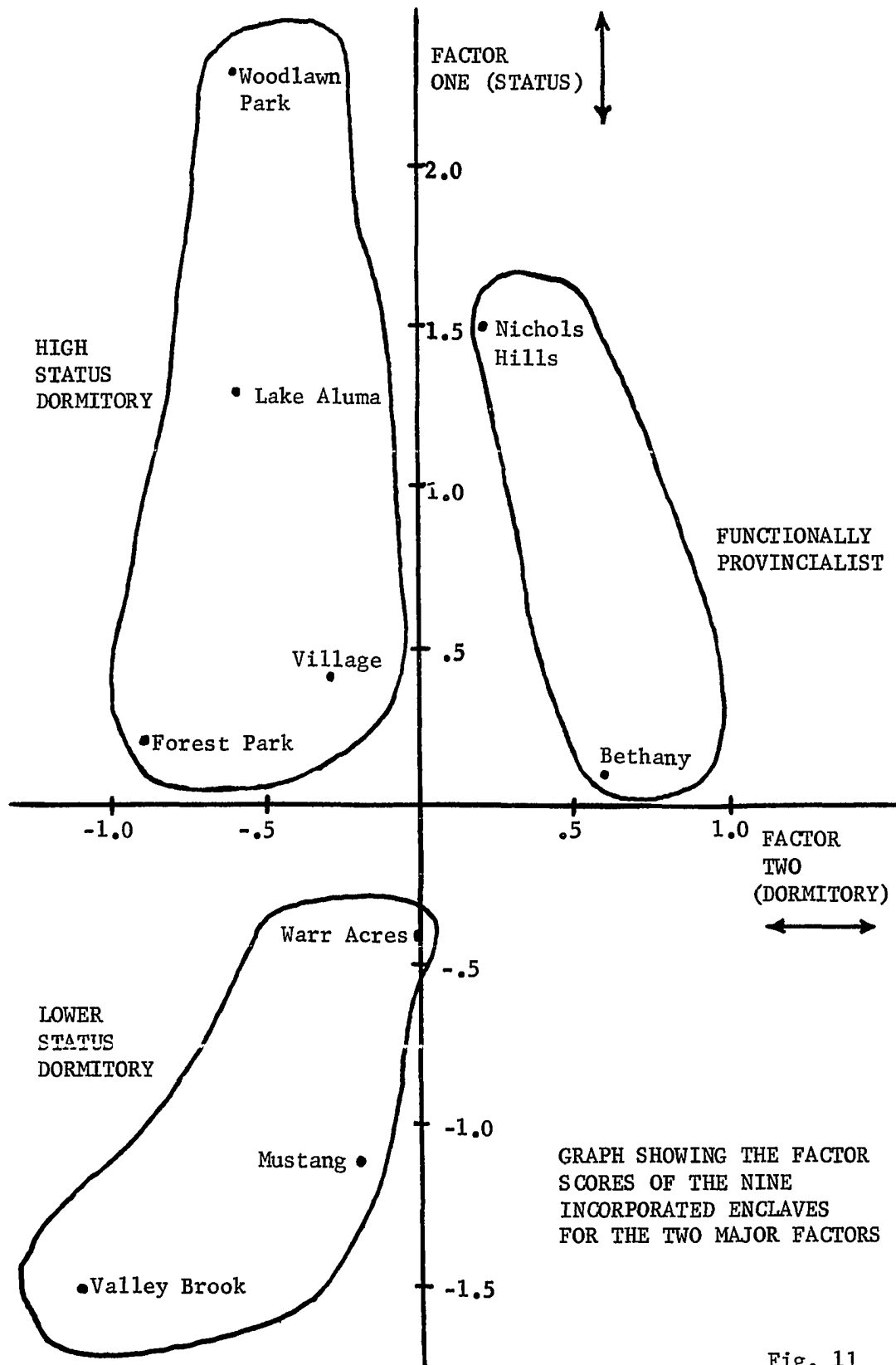


Fig. 11

Woodlawn Park, Lake Aluma, Forest Park, and the Village can be considered as one group, henceforth termed "High Status, Dormitory Enclaves." Warr Acres, Mustang, and Valley Brook are contained within another quadrant and will be designated as "Lower Status, Dormitory Enclaves." The remaining two enclaves, Nichols Hills and Bethany, are contained within a third quadrant and may be termed "Functionally Provincialist Enclaves." The formation of the three groupings is essentially based upon their proximity position within each of the four quadrants. No doubt one could argue for further refinement and realignment.¹⁵ Three groups, however, were finally formulated from the nine enclaves and termed: (1) High Status, Dormitory, (2) Lower Status, Dormitory, and (3) Functionally Provincialist.

A further observation concerning enclave character is revealed in Fig. 12. This figure shows the grouping of the enclaves based on their spatial characteristics (isolated and contiguous), when plotted on the graph using the factor scores for the two major socio-economic-political components (Status and Dormitory). It may be observed that the spatially isolated enclaves tend to cluster as lower status, dormitory, while the spatially contiguous enclaves appear to cluster as high status, functional. Although the pattern is not clear-cut, there is a tendency for the spatially isolated enclaves to be low for both the Status and Dormitory Factors, whereas the reverse is true for the spatially contiguous ones.

In summary, the factor analysis technique resulted in the identification of two major factors from among the socio-economic-political variables. The first was termed a Status Factor and the second a Dormitory

¹⁵For example from Fig. 11, Woodlawn Park, Lake Aluma, and Nichols Hills appear to be clustered as a group.

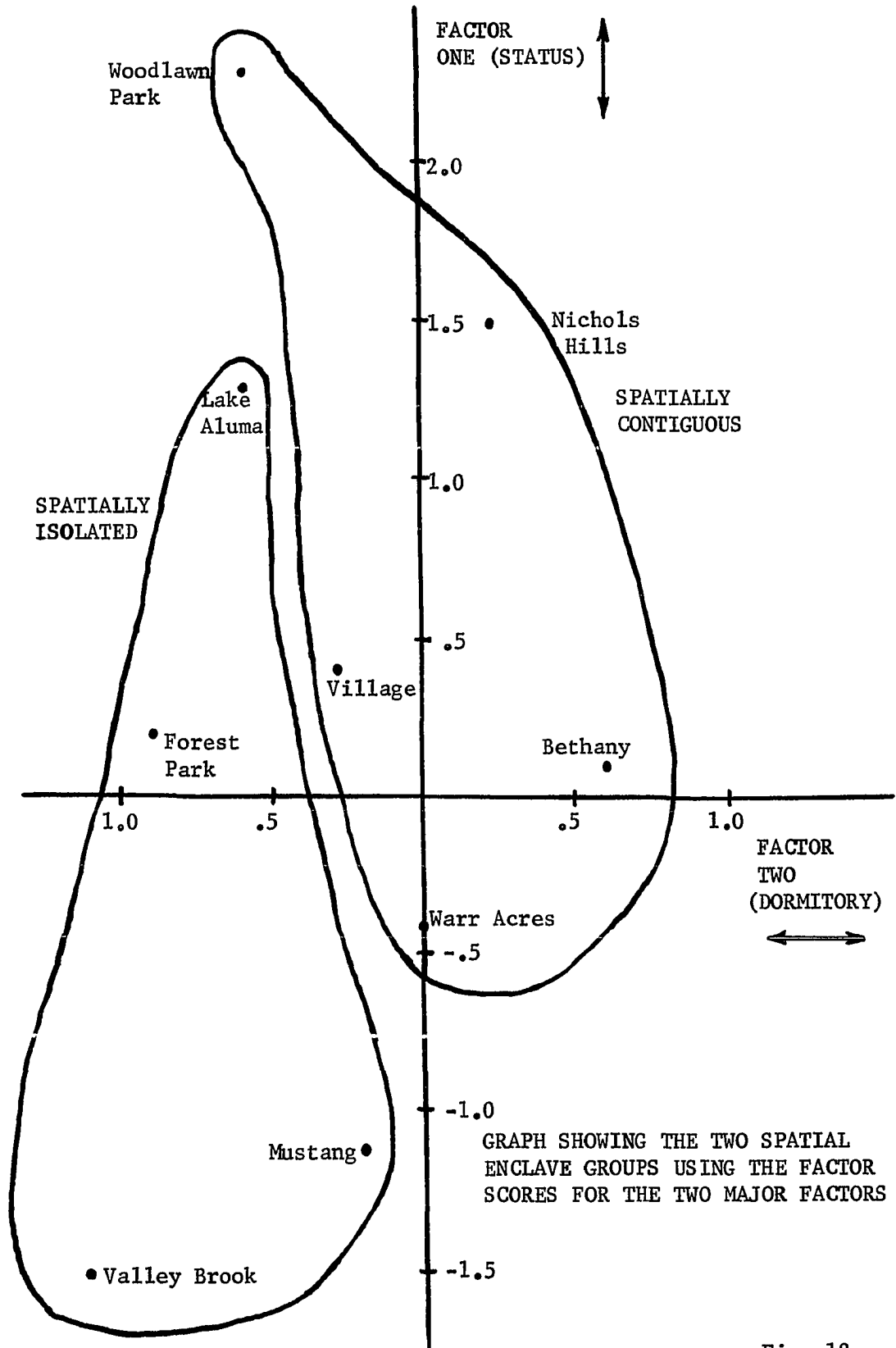


Fig. 12

Factor. After plotting these two factors on a vertical and a horizontal axis, there emerged three major groupings of the enclaves. The general characteristics of these three groupings are identified in Table XV. In the same table, the enclaves are grouped according to their spatial arrangement within the municipal area of Oklahoma City as isolated or contiguous.

TABLE XV
THE ENCLAVE GROUPINGS AND
THEIR CHARACTERIZATION

SPATIAL ARRANGEMENT VARIABLES	SOCIO-ECONOMIC-POLITICAL VARIABLES
I. Isolated	A. High Status, Dormitory
Forest Park	Forest Park
Lake Aluma	Lake Aluma
Mustang	Village
Valley Brook	Woodlawn Park
II. Contiguous	B. Lower Status, Dormitory
Bethany	Mustang
Nichols Hills	Valley Brook
Warr Acres	Warr Acres
Woodlawn Park	C. Functionally Provincialist
Village	Bethany
	Nichols Hills

After establishing the two spatial groupings and the three socio-economic-political groupings, the next task is to determine whether or not these groupings have a distinctive relationship or association with Oklahoma City, and whether the relationship with the larger city is independent or dependent in regard to the spatial and/or the socio-economic-

political character. The next three chapters are concerned with this problem of relationship based on the three previously cited measures:

(1) services available from the larger city, (2) acceptability responses towards the larger city, and (3) political attitudes and functional orientation towards the larger city.

CHAPTER VI
SERVICE AVAILABILITY IN THE INCORPORATED
ENCLAVES OF OKLAHOMA CITY

This chapter examines the relationship of the nine political enclaves of Oklahoma City to the larger city in regard to municipal services. The question is raised as to whether the availability of municipal services to the enclaves is dependent upon their type of spatial arrangement and/or their socio-economic-political character. If there is a dependency relationship between municipal service availability and the enclave types, as these were formulated and identified in Chapter V, what then is the degree of this dependency, and how does it vary among the different enclave types?

Examining the local availability of services is one method of measuring and assessing a municipal government's ability to effectively influence and control its municipal area and assert its independence from other urban centers. When essential service problems cannot be handled locally, the citizens have to look to outside governmental agencies for their solution. To the extent that this practice is characteristic of municipal enclaves, the local political unit no longer operates effectively within its political territory. A method of determining the influence and independence of a local government, then, is to evaluate its ability to perform local public services for the political area over which it has jurisdiction.

A number of previous studies have provided a framework for analyzing this so-called "service challenge."¹ Especially helpful is a report by the United States Government Advisory Commission on Intergovernmental Relations, published in 1963, which ranks a number of urban services on a scale from "most local" to "least local."² The purpose of the Commission study was to identify those services best performed by secondary local governments in the metropolitan area and those best performed by the larger metropolitan government (Table XVI). The ranking of services in the Commission report seems to be essentially a subjective one, but it does provide a usable framework for examining the nine cities and towns in this study. If an enclave is unable to provide a number of the essential services for its own community, and has to rely upon Oklahoma City for these services, then such an enclave can be judged as highly dependent for services upon the larger city. Conversely, an enclave which can supply all or most of the necessary urban services is relatively independent of the larger city.

Although the Advisory Commission report is used here as a guideline, its recognition of local, intermediate, and "areawide" services at times becomes somewhat meaningless because of the wide differences in the area and population of the enclaves under study. Woodlawn Park, for example, has only two per cent of the area of Bethany, with which it is spatially

¹For example, see Werner J. Hirsch, "Local Versus Areawide Urban Government Services," National Tax Journal, XVII (December, 1964), 331-339, and Arthur Maass (ed.), Area and Power: A Theory of Local Government (New York: Free Press, 1959).

²Advisory Commission on Intergovernmental Relations, Performance of Urban Functions: Local and Areawide (Washington: Government Printing Office, 1963).

TABLE XVI

RANK ORDER OF URBAN FUNCTIONS
FROM MOST LOCAL TO LEAST LOCAL (AREA WIDE)

	Rank	Function (Service)
Most	1	Fire Protection
Local	2	Public Education
	3	Refuse Collection and Disposal
	4	Libraries
	5	Police
	6	Health
	7	Urban Renewal
	8	Housing
	9	Parks and Recreation
	10	Public Welfare
	11	Hospitals and Medical Care Facilities
	12	Transportation
	13	Planning
Least	14	Water Supply and Sewage Disposal
Local	15	Air Pollution Control

Source: Advisory Commission on Intergovernmental Relations,
Performance of Urban Functions: Local and Areawide
 (Washington: Government Printing Office, 1963), pp. 9-23.

grouped, and less than one per cent of the population. The ranked list of services offered by the Advisory Commission, however, can be applied to this study and is used with some deletions, modifications, and additions. The purpose of these alterations is to insure: (1) emphasis on those services which best express the idea of local governmental operation, (2) inclusion of those services which exemplify the enclave's ability to promote community identity, and (3) consideration of the measurability of the particular service under study. Table XVII shows the writer's selection and rearrangement of the urban functions in the form used for investigating the enclaves of Oklahoma City. It should be noted that the fifteen services are grouped into three separate categories: social services, utility services, and public services. Such grouping allows greater manageability of the service data and better adaptation to the particular problems of this study. The Advisory Commission report makes use of only two of these categories.³

Modifications of the Advisory Commission's list of services for purposes of this study should be noted. Postal service (that is, whether the enclave had its own postmark) was substituted for libraries, which were not considered a significant factor in this study because of the regional nature of library services in Oklahoma. The presence or absence of a telephone exchange was added to the list. Locally centered postal and telephone service seem to reflect a high degree of identity for a community. It can reasonably be assumed that an enclave loses a significant part of its distinctiveness and singularity if it is absorbed into

³Ibid., pp. 41-44.

TABLE XVII

THE THREE CATEGORIES OF MUNICIPAL SERVICES
USED FOR ANALYSIS OF OKLAHOMA CITY'S
INCORPORATED ENCLAVES

SOCIAL SERVICES

Parks and Recreation
Health Inspection
Planning and Zoning
Traffic Planning and Control
Street Maintenance and Repair
Chamber of Commerce

PUBLIC SERVICES

Public Transportation
Fire Protection
Police Protection
Postal Service
Telephone Exchange
Public Education

UTILITY SERVICES

Garbage Collection
Water Supply
Sewage Collection and Disposal

the Oklahoma City mailing system. This situation was observed in Warr Acres, where approximately three-fourths of the residents had an Oklahoma City mailing address, and the remaining one-fourth were included in the Bethany mailing system. The existence of a chamber of commerce was also added as an item because the chamber, when present, is a prominent local agency for the promotion of the community. A chamber of commerce, as the term is used here, is an organized group of individuals in a town which uses the name "Chamber of Commerce," and meets on a regular basis. Excluded from consideration in the marginal case of Mustang was a businessmen's (social) group. Still other additions to the Advisory Commission's list are street maintenance and repair, and traffic planning and control, because these services also reflect a town's ability to maintain its municipal identity. When locally available, these two services involve municipal workers who are actively employed by the local town and provide visible evidence that the town is "doing something" for its residents.

Even though the Advisory Commission report does not explicitly define the remaining functions considered in this study, the investigator found it necessary to establish certain working definitions. Fire protection, as the term is used here, includes the presence of a fire truck, a fire station, and firemen either employed by the municipality or working as volunteers. Public education involves the presence of at least one elementary or high school within the territory of the municipality. The presence of a school within the municipal enclave is a significant community identity factor, even though school districts are separate, autonomous units functioning with little regard for other types of political areas. Garbage collection is defined as workers employed by the

municipality, using one or more refuse trucks, who collect garbage on a regular schedule. Police service is defined as the presence of one or more uniformed officers, hired by the municipality and operating a marked police car. As thus defined, police service does not include the "bouncer" employed by the Canadian Club, but does include the Pinkerton security men employed by Springlake Park. Health inspection is defined as the examination of public facilities by an official of the city-county Health Department located in Oklahoma City. In the case of Mustang, which is located in Canadian County, a non-local public health official operates out of an office in El Reno. Health inspections are conducted on a regular basis in all those food-dispensing establishments which are frequented by the public. The health inspection item does not involve the presence or absence of hospitals or doctors' offices. Parks and recreation services, as an item, include individuals employed by the enclave to maintain park areas and recreational facilities. This item includes, for example, the family employed full-time by the town of Lake Aluma to maintain the park and lake areas within the town. Public transportation is defined as the presence in the town of one or more public service vehicles (buses) operated by uniformed drivers. It does not include school buses which carry only school age children and do not cater to the general public. Taxis are also excluded because they are operated by private individuals or companies for private profit, as contrasted with public buses which are operated for the general public convenience and often show a deficit. Planning and zoning refers to whether there is a distinct set of regulations concerning the development of the local community. For example, Woodlawn Park has a specific law which precludes any form of commercial

development, even a gasoline station. Obviously, the milk retailer referred to earlier is an approved exception. Water supply involves the provisioning of water by the town to its inhabitants, or, as in the case of Woodlawn Park, the obtaining of water from private wells. Sewage collection and disposal refers to the presence or absence of waste-handling facilities operated by the local municipality for its citizens. To simplify the analysis, as already noted, the fifteen different services are classified and placed into one of the three categories: social services, utility services, or public services.

The next consideration was to decide how to assess the importance of the individual services and service groupings. An arbitrary decision was made to employ a simple number system to designate each town's degree of independence from Oklahoma City. The question as to which governmental unit provides the services was considered quite important. If the government of the local enclave does not provide a certain service function for the residents of the enclave, then who does, and how can this condition be given a value relative to the provision of services in the other enclaves? There are not many possibilities, however. If the enclave is not able to provide itself with a particular essential service, either Oklahoma City furnishes the service, or it is performed by a non-Oklahoma City agency such as the county, another nearby enclave, or a private contractor. In certain instances, a particular service may not be available at all. It was decided for purposes of the study to use a four-point numbering system in measuring the independence of a town or, conversely, its dependence on Oklahoma City for its services, with independence assigned a high number and dependency assigned a low number. If the enclave

was found to be performing the service itself, showing a high level of independence, it was assigned four points. If a non-Oklahoma City agency was performing the service for the enclave, three points were awarded, as in this case the community showed somewhat less independence. Two points were awarded in each instance where the service was non-existent in the daily activity of the enclave, for then there was neither dependence nor independence. If an enclave was dependent upon Oklahoma City for a service in any one of the three categories (social, utility, or public), however, it was awarded one point. Using this system, dependence on Oklahoma City is indicated where a high frequency of low numbers is observed. The numbers simply reflect a method by which the municipal services can be quantitatively measured for use in the subsequent analysis.

An important question to be investigated was whether the availability of municipal services was independent of or dependent upon the spatial arrangement of the enclaves and/or their socio-economic-political character. The two hypotheses under consideration can be stated as follows: (1) there is a significant difference in the ratings of services between the two spatial groups, and (2) there is likewise a significant difference in the rating of services between the three socio-economic-political groups. If these hypotheses are shown to be true, then the analysis of the political enclaves will include an investigation of the degree and direction of the differences.

A final point concerning the inquiry pertains to the analytical procedures that are employed. In social science research, some of the most useful statistical tests are those which may be applied to distributions based on rankings, as compared with those based on specific

computed values. In some cases, there is an uncertainty of the accuracy of specific measurements but more certainty of rank order. A problem for this study is to compare the ratings of the availability of municipal services for the various groups of enclaves and to assess their degree of correlation. The test which seems most applicable to the measurement and comparison of the availability of services is Spearman's Rank Correlation Coefficient.⁴ Basically, this test will not only demonstrate whether the degree of correlation between the enclave towns concerning municipal services is positive or negative, but also determine the degree of the positive or negative correlation. This rank correlation technique is appropriate for comparing the enclave towns contained within the two spatial groups and the three socio-economic-political groups. The test is only an initial aid, however, in determining the relative correlation for each of the groups concerning the rankings of the availability of municipal services. It still does not fully verify the two major hypotheses stated earlier in this chapter. For such a solution, other tests will be used and explained in forthcoming sections of the chapter.

The discussion that follows will first consider the two spatial groups. Then an attempt is made to support or refute the first hypothesis concerning these two groups. A brief explanation is given as to how the rank correlation is utilized, so that the reader can comprehend the procedure used when a later analysis is given of the three socio-economic-political groups.

⁴For a complete explanation of this test, see S. Gregory, Statistical Methods and the Geographer (London: Longmans, Green and Co., Ltd., 1968), pp. 202-206.

The Spatially Isolated Enclaves

Four enclave towns are included in this group: Forest Park, Lake Aluma, Mustang, and Valley Brook. Table XVIII shows the rankings of the municipal services, and Table XIX indicates the similarity of services for these towns with an explanation of the way in which they were computed. Table XIX lists the 18 correlation coefficients as computed, only five of which show a score of .90 or better. Since a perfect correlation score is 1.00, the similarity of services between the four enclave towns is very low.⁵ The intent is to treat these towns as one single entity, or group, because they are spatially isolated. It is not highly essential at this point to establish statistically significant correlations, but only to discover some degree of relationship. By using a biased .50 as an arbitrary measuring level, at least a modest measure of relationship is apparent. With this general explanation in mind, a more detailed discussion of Tables XVIII and XIX follows.

Within the spatially isolated group of enclaves, there is an evident tendency for the towns to provide their own utility services or to contract such services to an outside agency or another town, but not to Oklahoma City. One can conclude that the provisioning of their own utility services is considered highly important by the isolated enclaves, and that they fear the larger city would not be willing or able to give them adequate attention. Political leaders in these enclaves seem to

⁵Probability tables for the correlation coefficients exist and could have been used. For example, for six paired rankings .8 is significant at the 95 per cent level. Critical values of Spearman's Rank Correlation Coefficient are found in most standard statistical textbooks. For example, see William Mendenhall, Introduction to Probability and Statistics (Belmont, California: Wadsworth Publishing Company, Inc., 1968), p. 362.

TABLE XVIII
THE PROVISION OF MUNICIPAL SERVICES
FOR THE SPATIALLY ISOLATED ENCLAVES

	Mustang		Valley Brook		Forest Park		Lake Aluma		No.
SOCIAL SERVICES	No.	Rank	No.	Rank	No.	Rank	No.	Rank	Totals
Parks and Recreation	2	5.5	2	5.0	2	5.5	4	1.5	10
Health Inspection	3	4.0	3	3.0	3	3.5	3	3.5	12
Planning and Zoning	4	2.0	2	5.0	4	1.5	4	1.5	14
Traffic Planning and Control	4	2.0	4	1.5	4	1.5	2	5.5	14
Street Maintenance and Repair	4	2.0	4	1.5	3	3.5	3	3.5	14
Chamber of Commerce	2	5.5	2	5.0	2	5.5	2	5.5	8
PUBLIC SERVICES									
Public Transportation	2	6.0	2	3.0	2	3.0	2	2.5	8
Fire Protection	4	3.0	1	5.0	1	5.0	1	5.0	7
Police Protection	4	3.0	4	1.5	4	1.5	3	1.0	15
Postal Service	4	3.0	1	5.0	1	5.0	1	5.0	7
Telephone Exchange	4	3.0	1	5.0	1	5.0	1	5.0	7
Public Education	4	3.0	4	1.5	4	1.5	2	2.5	14
UTILITY SERVICES									
Garbage Collection	3	3.0	3	2.5	3	2.5	3	3.0	12
Water Supply	4	1.5	3	2.5	4	1.0	4	1.5	15
Sewage Collection and Disposal	4	1.5	4	1.0	3	2.5	4	1.5	15

Explanation of Numbers: 4--Enclave provides own service
 3--Enclave is dependent on outside agency or other small town for service
 2--Service is non-existent
 1--Enclave is dependent upon Oklahoma City for service

Explanation of Rank: To obtain the various ranks, the numbers assigned to each of the three categories of municipal services are ranked, with number 4 being ranked first. In case of ties in rank, the mid-rank method is used, treating each category of service separately. The mid-rank method is defined as follows: a rank is assigned equal to that of the middle of the tie assigned to all the services with identical numbers. For example, the public services of Mustang are computed as follows: the number 4 is ranked in positions 1 through 5, and the number 2 is ranked in position 6. To obtain the mid-rank for the number 4, the positions 1 through 5 are added together (1+2+3+4+5) and divided by the frequency of occurrences of the number 4(5). Therefore the rank for the number 4 is 3.0 (15/5). For more explanation of this mid-rank method, see Herbert Arkin and Raymond R. Colton, Statistical Methods, (New York: Barnes and Noble, Inc., 1963), pp. 85-86.

TABLE XIX
THE SIMILARITY OF SERVICES FOR
THE TWO SPATIAL ENCLAVE GROUPS

	Spatially Isolated	Correlation Coefficients	Spatially Contiguous	Correlation Coefficients
Social Services	Mustang-Forest Park	= .92	Woodlawn Park-Nichols Hills	= .88
	Mustang-Valley Brook	= .69	Warr Acres-Nichols Hills	= .69
	Valley Brook-Forest Park	= .52	Village-Nichols Hills	= .69
	Mustang-Lake Aluma	= .12	Woodlawn Park-Warr Acres	= .68
	Forest Park-Lake Aluma	= .09	Woodlawn Park-Village	= .68
	Valley Brook	= -.29	Bethany-Warr Acres	= .49
Public Services			Village-Bethany	= .39
	Valley Brook-Forest Park	= 1.00	Village-Warr Acres	= .30
	Valley Brook-Lake Aluma	= .94	Bethany-Woodlawn Park	= .26
	Forest Park-Lake Aluma	= .94	Bethany-Nichols Hills	= .06
	Mustang-Valley Brook	= .27	Warr Acres-Nichols Hills	= .96
	Mustang-Forest Park	= .27	Warr Acres-Village	= .96
Utility Services	Mustang-Lake Aluma	= 1.00	Nichols Hills-Village	= .91
	Mustang-Valley Brook	= .62	Bethany-Woodlawn Park	= .83
	Mustang-Forest Park	= .62	Bethany-Warr Acres	= .81
	Valley Brook-Lake Aluma	= .62	Bethany-Nichols Hills	= .74
	Forest Park-Lake Aluma	= .62	Bethany-Village	= .66
	Forest Park-Valley Brook	= -.13	Woodlawn Park-Nichols Hills	= .63
			Woodlawn Park-Warr Acres	= .53
			Woodlawn Park-Village	= .46
			Bethany-Nichols Hills	= 1.00
			Warr Acres-Village	= .87
			Bethany-Woodlawn Park	= .62
			Bethany-Village	= .62
			Woodlawn Park-Nichols Hills	= .62
			Village-Nichols Hills	= .62
			Bethany-Warr Acres	= .50
			Nichols Hills-Warr Acres	= .50
			Woodlawn Park-Village	= -.50
			Woodlawn Park-Warr Acres	= -.63

The formula for calculating the correlation coefficients is: $1 - \frac{6 \sum d^2}{n^3 - n}$, where d is the difference between the two sets of data in each case, and n is the number of pairs of occurrences.

For a more detailed explanation and application of this correlation coefficient, see John P. Cole and Cuchlaine A. M. King, Quantitative Geography (London: John Wiley and Sons, Ltd., 1968), pp. 136-138.

feel that such services, if obtained from the larger city, might be irregular because of the special trips and arrangements needed to serve isolated territories. The larger city might also feel that the trouble and expense of extending services to the isolated enclaves was not worth the effort.

The provisioning of public services presents a somewhat different pattern. From Tables XVIII and XIX it is evident that Valley Brook, Forest Park, and Lake Aluma obtain the bulk of these services from Oklahoma City. A possible explanation lies in the proximity factor in that these three isolated enclaves are located only some seven to nine miles from the center of Oklahoma City.⁶ On the other hand, Mustang is located about 16 miles from the city hall of Oklahoma City. The larger city seems quite willing to extend the essential public services to the isolated enclaves if they are within a reasonable distance--say, not more than ten miles from the larger city center. The isolated enclaves evidently feel justified in accepting these services because to provide them themselves, without some feasible way to share the costs with other enclaves, would be burdensomely expensive. One can conclude that the isolated enclaves do not feel that their independence will be lost, or even that control and management of their political territories will be seriously threatened, by this cooperative arrangement. It should be noted that there could be

⁶Distances were calculated by driving the most direct route by car from the city hall of Oklahoma City to the city hall, town hall, or area center of each of the nine incorporated enclaves. The measured distances to the four enclaves considered here are as follows: Forest Park and Valley Brook, 7 miles from the city center; Lake Aluma, 9 miles; and Mustang, 16 miles.

other influences at work besides this distance factor, yet the reasoning represents one effort, however subjective, to explain a spatial relationship.

Concerning the provision of social services, Lake Aluma appears quite different from the other three isolated enclaves. No doubt this results from the fact that Lake Aluma has only 21 homes, one circular road, special local zoning controls, and ample recreational space. The other three enclaves in the group provide not only planning services, but also traffic control and street maintenance and repair services to facilitate movement through their well-travelled residential streets. As regards the provision of social services, the isolated enclaves handle their own planning and zoning regulations, traffic control, and street maintenance and repair.

In summary, the spatially isolated enclaves tend to provide their own utility services or contract them. They depend substantially upon Oklahoma City for their public services, on the other hand, and furnish only part of their own social services. Distance from the center of the larger city to the isolated enclave center appears as an influencing factor only in relation to the provision of public services.

The Spatially Contiguous Enclaves

Bethany, Woodlawn Park, Warr Acres, Nichols Hills, and the Village are spatially contiguous enclaves--that is, each is adjacent to one or more other enclaves. Again, with reference to Tables XIX and XX, it can be observed that four of the five enclaves in the group supply their own utility services. The exception is Woodlawn Park which relies to a large

TABLE XX

THE PROVISION OF MUNICIPAL SERVICES FOR
THE SPATIALLY CONTIGUOUS ENCLAVES

	Bethany		Woodlawn Park		Warr Acres		Nichols Hills		Village		No.
SOCIAL SERVICES	No.	Rank	No.	Rank	No.	Rank	No.	Rank	No.	Rank	Totals
Parks and Recreation	4	2.5	2	4.5	4	2.5	4	2.0	4	2.5	18
Health Inspection	3	5.5	2	4.5	3	5.0	3	4.0	3	5.0	14
Planning and Zoning	4	2.5	4	1.0	4	2.5	4	2.0	4	2.5	20
Traffic Planning and Control	4	2.5	2	4.5	2	6.0	2	5.5	4	2.5	14
Street Maintenance and Repair	3	5.5	3	2.0	4	2.5	4	2.0	4	2.5	18
Chamber of Commerce	4	2.5	2	4.5	4	2.5	2	5.5	2	6.0	14
PUBLIC SERVICES											
Public Transportation	1	5.5	2	4.5	1	5.0	1	5.0	2	4.0	7
Fire Protection	4	2.5	3	2.0	4	2.0	4	1.5	4	2.0	19
Police Protection	4	2.5	3	2.0	4	2.0	4	1.5	4	2.0	19
Postal Service	4	2.5	3	2.0	1	5.0	1	5.0	1	5.5	10
Telephone Exchange	1	5.5	1	6.0	1	5.0	1	5.0	1	5.5	5
Public Education	4	2.5	2	4.5	4	2.0	3	3.0	4	2.0	17
UTILITY SERVICES											
Garbage Collection	4	2.0	3	2.5	4	1.0	4	2.0	4	1.5	19
Water Supply	4	2.0	4	1.0	1	3.0	4	2.0	1	3.0	14
Sewage Collection and Disposal	4	2.0	3	2.5	3	2.0	4	2.0	4	1.5	18

Explanation of Numbers: 4--Enclave provides own service
3--Enclave is dependent on outside agency or other small town for service
2--Service is non-existent
1--Enclave is dependent upon Oklahoma City for service

Explanation of Rank: See explanatory note under Table XVIII.

extent upon nearby Bethany for garbage collection and sewage disposal. This is understandable in that Woodlawn Park, while an enclave of Oklahoma City, is more immediately engulfed by Bethany (Fig. 3). Another irregularity in the pattern of similar association is that Warr Acres and the Village obtain their water supply from Oklahoma City. Since these enclaves are joined and together constitute a worthwhile water market, perhaps the larger city wanted to gain further profits by first serving these two municipalities. Later, if the water needs of other area enclaves were to increase, these communities might perhaps also look to Oklahoma City because the larger metropolis had the facilities and capacity to supply them.

In the provision of public services, the contiguous enclaves show a very clear pattern. Unlike the spatially isolated enclaves, they tend to have their own fire and police protection. Woodlawn Park, however, receives support from Bethany. A public or private high school is usually available within the political area of the contiguous enclave. This is undoubtedly related to the greater concentration of population and the need to have a local educational institution to serve the needs and demands in the populated area. Woodlawn Park, being very small, has no school within its area, and its children attend a public school located directly across the street in Bethany. Nichols Hills has only a parochial grade school, Christ the King, located within its political area.

The provision of social services to the spatially contiguous enclaves shows quite a varied pattern, although in no case is there dependency upon Oklahoma City for such services. Planning and zoning services, and parks and recreation facilities, are available in all five contiguous

enclaves, and are provided for by the enclaves themselves. The varying extent of these social services is explained by the different functional character of the communities. Bethany, Warr Acres, and the Village all contain significant areas of commercial and residential property, whereas Woodlawn Park is exclusively residential. Nichols Hills is almost exclusively residential in character, but has a small, recently developed commercial area in the southeast corner of its territory. Whatever the reason, no commonality in the type and extent of social services is identifiable in the spatially contiguous enclaves.

Summarizing briefly, the spatially contiguous enclaves provide their own utility services, and to a lesser extent handle their own public services. However, there is no consistent pattern concerning the provision of social services.

After this discussion of the two spatial types of enclaves, consideration can now be given to one of the major hypotheses proposed earlier in this chapter. Is the availability of municipal services, as shown by the ratings for these two types of enclaves, dependent upon their spatial character? The problem is to discover whether there is a difference in the ratings of services between the two spatial types. The preceding discussion has emphasized the characteristics of the major services provided for each type, with several differences noted. To simply state that differences exist without some degree of precision concerning these differences, however, is inadequate. Therefore, a statistical measure is applied to the two groups to test the hypothesis that the availability of municipal services of these two types of enclaves is dependent upon their spatial arrangement within the larger city's municipal area. The test

employed is the paired variance "t" test which simply compares two population variances, which in this study are the numbers assigned to the various fifteen municipal service categories. Table XXI shows the arithmetic calculations and the tabulated values. The procedure is simply to total the number values for each of the fifteen services within each of the two spatial groups, so that fifteen grand totals appear within each group (Tables XVIII and XX). Table XXI shows that the computed value of 3.66 is higher than the critical value of 2.145.⁷ There is, then, a difference between the ratings concerning the provision of municipal services by the two types of spatially grouped enclaves. Consequently, the first hypothesis is accepted--the availability of municipal services is dependent upon the spatial character of the enclaves or enclave groups.

The remaining sections of this chapter will explore the second major hypothesis, which is that the availability of services pertaining to the three socio-economic-political enclave groups is also dependent upon their character. Discussions relating to the similarity of services are again dependent upon employing a biased .50 correlation coefficient as an arbitrary measuring level.

The High Status, Dormitory Enclaves

Four enclaves comprise this first type of socio-economic-political enclave: Forest Park, Lake Aluma, the Village, and Woodlawn Park. For the utility service (Tables XXII and XXIII), the pattern is one that

⁷The critical value for a given "t" test can be found in almost any standard statistical textbook. For example, see Mendenhall, op. cit., p. 345.

TABLE XXI

THE DIFFERENCES IN AVAILABILITY OF
SERVICES FOR THE TWO SPATIAL ENCLAVE GROUPS

SOCIAL SERVICES	ISOLATED (A)	CONTIGUOUS (B)	DIFFERENCE (d) (B-A)	d ²
Parks and Recreation	10	18	8	64
Health Inspection	12	14	2	4
Planning and Zoning	14	20	6	36
Traffic Planning and Control	14	14	0	0
Street Maintenance and Repair	14	18	4	16
Chamber of Commerce	8	14	6	36
PUBLIC SERVICES				
Public Transportation	8	7	-1	1
Fire Protection	7	19	12	144
Police Protection	15	19	4	16
Postal Service	7	10	3	9
Telephone Exchange	7	5	-2	4
Public Education	14	17	3	9
UTILITY SERVICES				
Garbage Collection	12	19	7	49
Water Supply	15	14	-1	1
Sewage Collection and Disposal	15	18	3	9
Totals	172	226	54	398
				$\bar{d} = \frac{54}{15} = 3.60$

The difference of the sample variance is given by the formula:

$$\sqrt{\frac{d^2 - \frac{(d)^2}{N}}{N - 1}}$$

and therefore: $\sqrt{\frac{398 - \frac{2916}{15}}{14}} = 3.81$

The formula for the "t" test is: $\frac{\bar{d} - 0}{\frac{sd}{N}}$, and therefore: $\frac{3.60 - 0}{\frac{3.81}{3.87}} = 3.66$

Thus, the critical value of "t" with 14 (N-1) degrees of freedom is 2.145 at the .05 significance level for a two-sided test. Since the calculated value is 3.66, the hypothesis is accepted--in other words, there is a difference. For a fuller explanation and application of the two formulas used in this table, see William Mendenhall, Introduction to Probability and Statistics, (Belmont, California: Wadsworth Publishing Company, Inc., 1968), pp. 38-42 and pp. 201-205.

TABLE XXII
THE PROVISION OF MUNICIPAL SERVICES FOR
THE HIGH STATUS, DORMITORY ENCLAVES

	Woodlawn Park		Lake Aluma		Village		Forest Park		No.
SOCIAL SERVICES	No.	Rank	No.	Rank	No.	Rank	No.	Rank	Totals
Parks and Recreation	2	4.5	4	1.5	4	2.5	2	5.5	12
Health Inspection	2	4.5	3	3.5	3	5.0	3	3.5	11
Planning and Zoning	4	1.0	4	1.5	4	2.5	4	1.5	16
Traffic Planning and Control	2	4.5	2	5.5	4	2.5	4	1.5	12
Street Maintenance and Repair	3	2.0	3	3.5	4	2.5 6.0	3	3.5	13
Chamber of Commerce	2	4.5	2	5.5	2		2	5.5	8
PUBLIC SERVICES									
Public Transportation	2	4.5	2	2.5	2	4.0	2	3.0	8
Fire Protection	3	2.0	1	5.0	4	2.0	1	5.0	9
Police Protection	3	2.0	3	1.0	4	2.0	4	1.5	14
Postal Service	3	2.0	1	5.0	1	5.5	1	5.0	6
Telephone Exchange	1	6.0	1	5.0	1	5.5	1	5.0	4
Public Education	2	4.5	2	2.5	4	2.0	4	1.5	12
UTILITY SERVICES									
Garbage Collection	3	2.5	3	3.0	4	1.5	3	2.5	13
Water Supply	4	1.0	4	1.5	1	3.0	4	1.0	13
Sewage Collection and Disposal	3	2.5	4	1.5	4	1.5	3	2.5	14

Explanation of Numbers: 4--Enclave provides own service
3--Enclave is dependent on outside agency or other small town for service
2--Service is non-existent
1--Enclave is dependent upon Oklahoma City for service

Explanation of Rank: See explanatory note under Table XVIII.

TABLE XXIII

THE SIMILARITY OF SERVICES FOR THE HIGH STATUS, DORMITORY
AND THE LOWER STATUS, DORMITORY ENCLAVES

	High Status, Dormitory	Correlation Coefficients	Lower Status, Dormitory	Correlation Coefficients
Social Services	Woodlawn Park-Lake Aluma	= .84	Mustang-Valley Brook	= .69
	Woodlawn Park-Village	= .68	Warr Acres-Mustang	= -.01
	Forest Park-Village	= .59	Warr Acres-Valley Brook	= -.23
	Lake Aluma-Village	= .47		
	Lake Aluma-Forest Park	= .09		
	Woodlawn Park-Forest Park	= .04		
Public Services	Lake Aluma-Forest Park	= .94	Warr Acres-Mustang	= .66
	Village-Forest Park	= .69	Warr Acres-Valley Brook	= .61
	Lake Aluma-Village	= .63	Mustang-Valley Brook	= .27
	Woodlawn Park-Village	= .46		
	Woodlawn Park-Lake Aluma	= .20		
	Woodlawn Park-Forest Park	= .13		
Utility Services	Woodlawn Park-Forest Park	= 1.00	Mustang-Valley Brook	= .62
	Woodlawn Park-Lake Aluma	= .62	Warr Acres-Valley Brook	= .12
	Forest Park-Lake Aluma	= .62	Warr Acres-Mustang	= -.63
	Village-Lake Aluma	= -.13		
	Village-Woodlawn Park	= -.50		
	Village-Forest Park	= -.50		

The formula for calculating the correlation coefficients is: $1 - \frac{6 \sum d^2}{n^3 - n}$, where d is the difference between the two sets of data in each case, and n is the number of pairs of occurrences.

For a more detailed explanation and application of this correlation coefficient, see John P. Cole and Cuchlaine A. M. King, Quantitative Geography, (London: John Wiley and Sons, Ltd., 1968), pp. 136-138.

reflects substantial independence from Oklahoma City, in that enclaves in this group provide these services themselves or contract such services to outside agencies. The only exception to this pattern is the Village, which secures water from Oklahoma City. It should be recalled that Forest Park, Lake Aluma, and Woodlawn Park are all small in population and almost entirely residential in character, while the larger Village community has both commercial and residential areas, and a demand for water that the local enclave cannot effectively manage itself.

The provision of public services for the high status, dormitory enclaves shows a mixed pattern of dependency (Table XXII). Most of these enclaves rely on the larger city for fire protection, postal service, and telephone service. Woodlawn Park, because of its close association with Bethany, is an exception. No doubt these communities could finance more independent arrangements, but their limited population would mean a sacrifice of economies of scale. Probably another reason why these high status, dormitory enclaves are willing to accept having Oklahoma City supply most of their public services is that the residents tend to have their business interests in the larger city and only residential concerns in their local enclaves.

For the social services, on the other hand, there is very little reliance upon the larger city (Tables XXII and XXIII). These services, like the utility services, are provided for by the local enclaves themselves or are contracted to an outside agency. This tendency is not surprising in view of the enclaves' overall residential character, especially since the demands are so little as not to warrant large-scale provision. In some cases, the procedures used in maintaining the residential

character seem extreme. For instance, the approach used by Woodlawn Park to guard its park area is an unusual one. Each of the inhabitants fronting on the park actually owns some part of it, which means that what appears to be and functions as a municipal park is really private property. The entire town of Woodlawn Park has been zoned against any commercial use. Recently, this strict zoning was dramatically illustrated when a property owner in Woodlawn Park was forbidden to sell part of his land for the establishment of a gasoline station.

In summary, the high status, dormitory enclaves tend to remain independent of the larger city for their utility and social services, but they are dependent upon Oklahoma City for most of their public services. Their high status quality and mainly residential character enable them to secure the provision of services from the larger city whenever they feel this would be advantageous. But, at the same time, they seem to enjoy feeling unhampered by Oklahoma City's regulations and codes, and prefer having their residential sanctuaries politically separate from the larger city.

The Lower Status, Dormitory Enclaves

The three enclaves comprising this group are Warr Acres, Mustang, and Valley Brook. Basically, this group can be said to be largely independent of Oklahoma City. From Tables XXIII and XXIV, it can be observed that only Warr Acres depends upon Oklahoma City for a utility service, namely water. As in the case of the Village, the functional character of Warr Acres, with a combination of commercial and residential zones, partly explains the provision of this service by the larger city. Although Mustang and Valley Brook have commercial zones, they are not nearly as extensive as those evident in Warr Acres. The distance of Mustang from the

TABLE XXIV
THE PROVISION OF MUNICIPAL SERVICES FOR
THE LOWER STATUS, DORMITORY ENCLAVES

SOCIAL SERVICES	Warr Acres		Mustang		Valley Brook		No. Totals
	No.	Rank	No.	Rank	No.	Rank	
Parks and Recreation	4	2.5	2	5.5	2	5.0	8
Health Inspection	3	5.0	3	4.0	3	3.0	9
Planning and Zoning	4	2.5	4	2.0	2	5.0	10
Traffic Planning and Control	2	6.0	4	2.0	4	1.5	10
Street Maintenance and Repair	4	2.5	4	2.0	4	1.5	12
Chamber of Commerce	4	2.5	2	5.5	2	5.0	8
PUBLIC SERVICES							
Public Transportation	1	5.0	2	6.0	2	3.0	5
Fire Protection	4	2.0	4	3.0	1	5.0	9
Police Protection	4	2.0	4	3.0	4	1.5	12
Postal Service	1	5.0	4	3.0	1	5.0	6
Telephone Exchange	1	5.0	4	3.0	1	5.0	6
Public Education	4	2.0	4	3.0	4	1.5	12
UTILITY SERVICES							
Garbage Collection	4	1.0	3	3.0	3	2.5	10
Water Supply	1	3.0	4	1.5	3	2.5	8
Sewage Collection and Disposal	3	2.0	4	1.5	4	1.0	11

Explanation of Numbers: 4--Enclave provides own service
3--Enclave is dependent on outside agency or other
small town for service
2--Service is non-existent
1--Enclave is dependent upon Oklahoma City for service

Explanation of Rank: See explanatory note under Table XVIII.

center of Oklahoma City and its major water reservoirs may also be a factor.

The lower status, dormitory group also remains somewhat independent of Oklahoma City in regard to the public services. Postal and telephone services, however, are supplied to Warr Acres and Valley Brook by the larger city. On the other hand, both fire and police protection are provided by the local enclaves themselves. Valley Brook is an exception to the pattern, securing its fire protection from Oklahoma City. Some of the dissimilarities from other enclaves within this group that are evident in the town of Valley Brook may be partly explained by the bitter discontent expressed by many of the residents towards their local officials. On more than one occasion, this researcher discovered the resentment to be so deep that the respondent would clearly prefer his or her town to become a part of Oklahoma City.⁸

Social services for these three enclave towns tend to be provided either locally or by outside agencies. Warr Acres is outstanding in this regard, functioning in a very independent manner. Mustang and Valley Brook simply do without some of the social services, although they do maintain their own traffic planning and street maintenance departments. In Valley Brook some of the regulations are quite unusual. For example, the writer was informed that to leave a car parked in one's own driveway while away on vacation is illegal. The penalty imposed for a violation of this ordinance, the purpose of which is presumably to reduce the temptation

⁸One rather vivid episode concerned a woman resident who was petitioning the neighborhood for signatures to allow a vote on incorporation with Oklahoma City. This woman was later to find that her house had been set afire, probably by someone attempting to discourage any further petitioning. The threatening gesture was, needless to say, successful.

to steal or vandalize, was reported to be impoundment of the vehicle and a fine of approximately \$50. It appears difficult, therefore, to recognize a common dependency pattern concerning the social services for the lower status, dormitory enclaves.

In summary, the lower status, dormitory enclaves are independent of the larger city for provision of their municipal services. This is particularly the case for the utility and social services. As for the public services, Oklahoma City tends to furnish some of these, mainly postal and telephone services. The combination of commercial and residential areas in all three towns increases the demand for these services, somewhat beyond the comparable requirement in the high status, dormitory enclave group.

The Functionally Provincialist Enclaves

Nichols Hills and Bethany are the two political enclaves comprising this group. It should be noted that they are also spatially contiguous. The three utility services in these towns score a perfect independence rating in that these two enclaves supply all such needs themselves (Table XXV). Part of the explanation is surely in the age of the communities. Both enclaves have been established for over forty years, and of the remaining seven enclaves considered, only Mustang can compare in longevity. Available records suggest that these enclaves were forced to furnish their own municipal services when they were incorporated, as at the time Oklahoma City was fully occupied looking after its own immediate needs. The extensive commercial development found in Bethany, and the more recent development of a commercial district in Nichols Hills, made it seem more urgent that these services be locally supplied.

TABLE XXV

THE PROVISION OF MUNICIPAL SERVICES FOR THE
FUNCTIONALLY PROVINCIALIST ENCLAVES AND THEIR
SIMILARITY OF MUNICIPAL SERVICES

SOCIAL SERVICES	Nichols Hills		Bethany		No. Totals	Correlation Coefficient
	No.	Rank	No.	Rank		
Parks and Recreation	4	2.0	4	2.5	8	.06
Health Inspection	3	4.0	3	5.5	6	
Planning and Zoning	4	2.0	4	2.5	8	
Traffic Planning and Control	2	5.5	4	2.5	6	
Street Maintenance and Repair	4	2.0	3	5.5	7	
Chamber of Commerce	2	5.5	4	2.5	6	
PUBLIC SERVICES						
Public Transportation	1	5.0	1	5.5	2	.74
Fire Protection	4	1.5	4	2.5	8	
Police Protection	4	1.5	4	2.5	8	
Postal Service	1	5.0	4	2.5	5	
Telephone Exchange	1	5.0	1	5.5	2	
Public Education	3	3.0	4	2.5	7	
UTILITY SERVICES						
Garbage Collection	4	2.0	4	2.0	8	1.00
Water Supply	4	2.0	4	2.0	8	
Sewage Collection and Disposal	4	2.0	4	2.0	8	

Explanation of Numbers: 4--Enclave provides own service
 3--Enclave is dependent on outside agency or
 other small town for service
 2--Service is non-existent
 1--Enclave is dependent upon Oklahoma City
 for service

Explanation of Rank: See explanatory note under Table XVIII.

Explanation of Correlation Coefficients: See explanatory note under
 Table XXIII.

The provision of public services also shows an independent pattern for the functionally provincialist enclaves (Table XXV). In this category, only public transportation and telephone service are provided by the larger city to these two enclaves. Nichols Hills is included in the Oklahoma City postal district, while Bethany has its own postal station and postmark. Public transportation presents a rather unusual pattern in these enclaves. Oklahoma City runs two bus lines through Bethany, one going by way of Warr Acres to Wiley Post Airport on the northwest boundary, and the other making a circle route into the central part of Bethany. On the other hand, Nichols Hills just happens to have an Oklahoma City bus line running along its eastern boundary (Western Avenue), making at least one stop in the vicinity. One wonders whether the larger city is trying to assure these established enclaves of easy access to its own city center, therefore indirectly weakening their ability to provide commercial services to their own populations and those of other nearby enclave units.

Concerning the social services, there is quite a different pattern (Table XXV). A general observation that seems apparent is that neither Nichols Hills nor Bethany depends upon Oklahoma City for any of these six services. Only for parks and recreation and for planning and zoning, however, are the two towns similar in their local control. The provision of other services varies quite substantially in particular, and no general dependency association can be detected. This no doubt relates to their differences in commercial structure. Nichols Hills has only a few retail shops, while Bethany has a number of facilities employing blue collar workers, the most recent addition being the Aero Commander manufacturing plant incorporated into Bethany only in October, 1971.

In summary, the functionally provincialist enclaves remain relatively independent of the larger city for all three service categories, and in most cases supply their essential services locally. This type of enclave, because of its above average personal income and important commercial position, and possibly because of its political influence among the other enclaves, appears to be given special treatment by the larger city. The political leadership in Oklahoma City may fear that this type of enclave will grow to the point that it presents some kind of competitive threat, and that the larger city might, over a period of time, lose its metropolitan dominance. This consideration does not seem evident in the other socio-economic-political enclave groups. Political amalgamation of any of the enclaves could have substantial political impact upon the larger city, especially if Nichols Hills and Bethany instigated such a coalition.

From the above analysis of the three socio-economic-political enclave types, the second major hypothesis of this chapter can now be confronted. Even though some differences are obvious among the three political enclave types, is the availability of municipal services dependent upon, or significantly related to, the socio-economic-political character? Again the problem is to discover whether there is a statistical difference in the ratings of services between the three socio-economic-political types. Consideration of the characteristics of the provision of the various municipal services has revealed much about the nature of the nine enclaves' association with Oklahoma City. To determine with some precision the validity of the hypothesis, the analysis of variance test is employed to test whether the availability of municipal services for the three major types of enclaves is dependent upon their socio-economic-

political character. Is there a difference in the provision of services based on the ratings between the high status, dormitory; lower status, dormitory; and the functionally provincialist enclaves? The analysis of variance test examines the differences among the means (in this case, the rating numbers) of more than two samples (in this case, there are three groups of enclaves). The procedure is simply to total the number values for each of the fifteen services within each of the three socio-economic-political groups, so that fifteen grand totals appear within each group (Tables XXII, XXIV, and XXV). Basically, the test statistically determines whether or not all three enclave groups differ significantly among themselves.⁹ Table XXVI displays the arithmetic computations and the final tabulated value for the analysis of variance test. Based on the method employed, it is evident that the second major hypothesis is confirmed. There is a difference between the ratings of the provision of municipal services for the high status, dormitory; lower status, dormitory; and functionally provincialist enclaves. It would appear that the provision of services is very much dependent upon the type of socio-economic-political character of the enclaves.

In summary, this chapter has investigated and analyzed the provision of municipal services for the nine enclave cities and towns engulfed by Oklahoma City. The investigation has supported the two major hypotheses which were stated earlier in the chapter. These were that the extent of provision of municipal services is dependent upon both the spatial and socio-economic-political character of the enclaves.

⁹ For a more detailed explanation of this test, see Blalock, Jr., op. cit., Chapter 16.

TABLE XXVI

THE DIFFERENCES IN THE AVAILABILITY OF SERVICES FOR THE
THREE SOCIO-ECONOMIC-POLITICAL ENCLAVE GROUPS

	HIGH STATUS, DORMITORY	LOWER STATUS, DORMITORY	FUNCTIONALLY PROVINCIALIST
SOCIAL SERVICES			
Parks and Recreation	12 (144)	8 (64)	8 (64)
Health Inspection	11 (121)	9 (81)	6 (36)
Planning and Zoning	16 (256)	10 (100)	8 (64)
Traffic Planning and Control	12 (144)	10 (100)	6 (36)
Street Maintenance and Repair	13 (169)	12 (144)	7 (49)
Chamber of Commerce	8 (64)	8 (64)	6 (36)
PUBLIC SERVICES			
Public Transportation	8 (64)	5 (25)	2 (4)
Fire Protection	9 (81)	9 (81)	8 (64)
Police Protection	14 (196)	12 (144)	8 (64)
Postal Service	6 (36)	6 (36)	5 (25)
Telephone Exchange	4 (16)	6 (36)	2 (4)
Public Education	12 (144)	12 (144)	7 (49)
UTILITY SERVICES			
Garbage Collection	13 (169)	10 (100)	8 (64)
Water Supply	13 (169)	8 (64)	8 (64)
Sewage Collection and Disposal	14 (196)	11 (121)	8 (64)

Sums	165 (1969)	136 (1304)	97 (687)
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No. of Total
Services

15

15

15

Total of all observations is $165 + 136 + 97 = 398$.

Correction for the mean is $\frac{(398)^2}{15 + 15 + 15} = 3520$.

Total sum of the squares of all observations is $1969 + 1304 + 687 = 3960$.

Total sum of squares is $3960 - 3520 = 440$.

Total sum of squares for treatment is $\frac{(165)^2}{15} + \frac{(136)^2}{15} + \frac{(97)^2}{15} - 3520 = 155.2$

Total sum of squares of deviations assigned to error is $440 - 155.2 = 284.8$

Mean squares for treatment is $155.2/p - 1$, where p is the number of groups = 77.6

Mean squares for error is $284.8/(15 + 15 + 15) - p = 284.8/42 = 6.78$

Therefore the test statistic is: $F = \frac{77.6}{6.78} = 11.44$

The critical value for F at the .05 significance level is 3.22, with $v_1 = 2$ and $v_2 = 42$. Since the calculated value is 11.44, the hypothesis is accepted (in other words, there is a difference). For a greater explanation and practical application of the analysis of variance test, see William Mendenhall, Introduction to Probability and Statistics (Belmont, California: Wadsworth Publishing Company, Inc., 1968) pp. 268-277.

Careful analysis has determined that differences concerning the provision of municipal services do exist between the two spatial groups and between the three socio-economic-political groups. However, a final important question must be resolved. Is the provision of municipal services dependent upon the overall character (spatial-socio-economic-political) of the various nine enclave communities? Table XXVII displays the similarities and differences of the provision of services for the nine enclave towns. Observations from this table reveal that Forest Park and Lake Aluma are not different in the provision of their municipal services, whether considered as spatially isolated or high status, dormitory enclaves. This means that the provision of municipal services for Forest Park and Lake Aluma is independent of their character (e.g., the provision of services is the same regardless of character). Mustang and Valley Brook displayed a similar pattern, except for the public services (Table XXVII). When considered as spatially isolated enclaves, Oklahoma City furnishes these services, whereas when the same two enclaves are considered as lower status, dormitory communities they tended to provide their own services. Bethany, Nichols Hills, and Warr Acres also display a similarity in the provision of services irrespective of character (Table XXVII). However, there is no common trend evident for the social services in the spatially contiguous enclaves, which include Bethany, Nichols Hills, and Warr Acres. For Woodlawn Park and the Village a different pattern emerges in that the provision of services is dependent upon their character (Table XXVII). For example, the provision of public services to these two enclaves is locally provided when they are considered as spatially contiguous enclaves. However, as high status, dormitory enclaves, the

TABLE XXVII

SIMILARITIES AND DIFFERENCES OF
MUNICIPAL SERVICES FOR THE ENCLAVES

a) Utility Services			
Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park I,I Lake Aluma I,I	Mustang I,I Valley Brook I,I	
Spatially Contiguous	Woodlawn Park I,I Village I,I	Warr Acres I,I	Bethany I,I Nichols Hills I,I
b) Social Services			
Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park I,I Lake Aluma I,I	Mustang I,I Valley Brook I,I	
Spatially Contiguous	Woodlawn Park N,I Village N,I	Warr Acres N,I	Bethany N,I Nichols Hills N,I
c) Public Services			
Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park OK,OK Lake Aluma OK,OK	Mustang OK,I Valley Brook OK,I	
Spatially Contiguous	Woodlawn Park I,OK Village I,OK	Warr Acres I,I	Bethany I,I Nichols Hills I,I

The first letter(s) after each enclave indicates the pattern of services when defined as a spatial enclave(isolated or contiguous). The second letter(s) after each enclave indicates the pattern of services when defined as a socio-economic-political enclave(high status, lower status,or functional).

I- Enclave is independent of Oklahoma City for services.

OK- Enclave is dependent upon Oklahoma City for services.

N- No commonality observed.

provision of such services is by Oklahoma City. Further, there is no evident trend observed for the social services to these two communities when considered as spatially contiguous enclaves. Therefore, based on these observations, it is concluded that for seven of the nine Oklahoma City enclaves, the provision of municipal services is independent of their character (e.g., the provision is the same regardless of the spatial-socio-economic-political character). It is quite evident that the character of these seven enclaves makes very little difference when considering the provision of municipal services for these communities.

CHAPTER VII

ACCEPTANCE RESPONSES OF THE INCORPORATED ENCLAVES TOWARDS OKLAHOMA CITY

The purpose of this chapter is to determine whether the registered voters' acceptance responses towards Oklahoma City are dependent upon the character of the enclaves in which they reside. The judgment is based on registered voter responses to a series of ten questions. In addition, an effort is made to determine whether the local political representatives of the enclaves express a level of acceptance or rejection of Oklahoma City similar to that expressed by the registered voters whom they represent. Briefly, the hypotheses assert that differences in acceptability responses exist between the two spatial enclave groups and the three socio-economic-political groups, but not between the enclave groups and their respective local political representatives. The two major hypotheses may be stated in more detail as follows: (1) the spatially isolated enclaves are more agreeable to receiving services from the larger city while maintaining very little political contact with it than are the spatially contiguous enclaves; and (2) the high status, dormitory enclaves are more agreeable to receiving services from the larger city than are the other two socio-economic-political enclave groups. The measures used to substantiate these hypotheses are the responses of the 775 registered voters and those of the 40 locally elected political representatives. Appendix C details the results of these responses.

The ten questions were divided into four groups. The first group concerned attitudes toward Oklahoma City. These attitudes were determined by responses to three questions bearing on the acceptability of having the mayor of Oklahoma City speak in the enclave, having an Oklahoma City family move to the enclave, and having an Oklahoma City resident work in the enclave. The second group of questions involved the willingness of the registered voters to move into Oklahoma City, assuming that the larger city might afford them a better job and their school age children, whether of elementary or high school age, better school facilities. The third group concerned attitudes toward receiving certain essential services from the larger city instead of from the local enclave community, specifically police and fire protection and doctors' services. The last group of questions involved the acceptability of having local planning officials and elected representatives cooperate with their counterparts in the larger city.

The general purpose of the questioning was to elicit and evaluate the degree of acceptability of closer ties with Oklahoma City by the registered voters and the local public officials in the enclaves. Some questions were of a purely hypothetical nature, and here certain assumptions had to be made. In other cases, the replies reflected attitudes toward an actual situation, for instance, the town's dependence on Oklahoma City for police protection. However, if the town had its own police protection the inquiry was related to the acceptability of having the larger city assume this function. The number of questions was held to a minimum in order to keep the interviews as brief and concise as possible. While the questions sampled only selected attitudes, the responses afford

some worthwhile insights into the question of inter-municipal relationships.

The registered voters and local representatives were asked to respond to the ten questions in one of four ways: acceptable, somewhat acceptable, somewhat unacceptable, or not at all acceptable. By giving the respondents an opportunity to register the intensity of their positive or negative attitudes, rather than structuring the choices to simply a yes or no answer, it was possible to obtain a more accurate impression of the registered voters' and local representatives' true feelings.

Some consideration was given to the problem of establishing a value system for the four types of responses. How meaningful would it be to simply compare actual numbers? For example, how would an accurate comparison be made if 130 of 150 registered voters in Warr Acres found Oklahoma City police protection acceptable but only 10 of 71 accepted it in Mustang? No doubt percentages could have been used, but the decision to make four acceptable choices available seemed to call for a precise statistical measure. The basic problem was to compare groups of enclaves rather than individual communities, to determine if differences existed between the types. It was decided to employ the chi-square test in attacking the problem. A common use of this test is to measure whether a given frequency distribution is representative of a normal distribution--that is, whether observed frequencies obtained differ significantly from those which would be expected under a certain set of theoretical assumptions.¹ In relation to the problem at hand, the question to be answered

¹For a full description of this test, see Blalock, Jr., op. cit., Chapter 15, pp. 212-241.

by the test was whether or not the differences between the enclave groups were statistically significant. Appendix C shows all the calculations and resultant values for the enclave groups.

The Spatial Enclave Groups

Examination of the data revealed that the spatially isolated enclave group, consisting of Forest Park, Lake Aluma, Mustang, and Valley Brook, differed significantly from the spatially contiguous group, comprised of Bethany, Nichols Hills, Warr Acres, Woodlawn Park, and the Village. The chi-square test confirmed the first hypothesis, that the differences in acceptability responses existed between the two spatial enclave groups.

The first difference concerned the acceptability of having the mayor of Oklahoma City speak in the enclaves. It is clear that the spatially isolated enclaves find this more unacceptable than the spatially contiguous group of enclaves. This may be explained in part by the possibility that the spatially isolated group fears annexation by the larger city would be promoted by having the mayor speak. Since the enclaves in the spatially isolated group are all totally surrounded by the larger city, it is conceivable that such an isolated position makes them more vulnerable to amalgamation than if they were joined with other (adjacent) enclaves in a similar predicament. It seems logical, in any case, that strength in numbers would tend to counterbalance outside influence from the larger city.

The second major difference between the two enclave types concerned the movement to Oklahoma City by school age children to attend school. In this case, the spatially contiguous enclaves felt such

a proposition to be highly unacceptable. The probable explanation is that in these spatially contiguous enclaves there is a tendency for neighborhood schools to develop which are adequate to serve the local population. This seems obvious in the case of Bethany and Warr Acres where separate school districts exist and the fear of "busing" was most apparent.² On the other hand, three of the spatially isolated enclaves, Valley Brook, Forest Park, and Lake Aluma, said that transporting their children to Oklahoma City was quite acceptable. Their small populations reflected little demand for the development of neighborhood schools, and the residents evidently feel that better facilities are available in the larger city.

Major differences were observed in replies to the question which concerned receiving essential services from Oklahoma City, specifically, police and fire protection and physicians' services. Here it was evident that the spatially isolated enclaves were quite willing to receive all three of these services from the larger city. The responses reflect a general inability of the isolated centers to effectively mount such services. In some cases, as in Mustang, volunteer firemen serve as the only means of fire protection. In other cases, police protection was considered so inadequate that securing services from Oklahoma City could not help but be better. This view was frequently encountered in Valley Brook. On the other hand, the spatially contiguous enclaves already had developed adequate local services, and the residents felt no need to consider changes.

²Busing children to achieve racial balance was a highly political subject in the greater Oklahoma City area at the time the questionnaire survey was being conducted.

Some respondents justified their attitude by saying that the local neighborhood policeman or policemen knew all the residents by name. The idea of having unknown policemen from the larger city patrolling the neighborhood seemed to create a feeling of anomie within certain of the enclaves. In some cases, respondents felt that a local policeman would be more lenient in overlooking minor offenses because he personally knew the offenders. Quite understandably, residents in the local enclaves wanted their fire and police stations located nearby, rather than 10 or 12 miles away in the larger city. Even in regard to doctors' services, attitude differences between the enclave groups were detected. Here again, the idea of being served by a neighbor with whom one was also acquainted as a citizen was more appealing than being treated by an Oklahoma City physician. In summary, the underlying differences can best be explained by reference to the evident reality of a "neighborhood concept," the feeling that a fireman or policeman who is also a neighbor will try harder to help one out of difficulty when a need arises.

A final difference between the two spatial groups was apparent in responses to the question of working with the Oklahoma City elected representatives. The isolated enclaves reflected some fear of a take-over by the larger city and desired to minimize contact with the so-called "corrupt politicians" of the big city. The respondents seemed to perceive the local towns as small, honest entities in confrontation with Oklahoma City and its "fast city slickers." In short, they wanted no part of working agreements between their local representatives and those of Oklahoma City. The spatially contiguous enclaves, on the other hand, seemed quite willing to cooperate because they felt "big enough" to resist absorption

by, or undue influence from, the larger city.

The preceding discussion is related only to the attitude differences between the two spatial groups of enclaves. In summary, the spatially isolated enclaves express positive acceptability responses towards receiving essential services from the larger city, but an unacceptable attitude towards any dealing with the larger city's local political representatives. They are quite willing to accept the services, including education for their children, but want to divorce themselves completely from any political contact with Oklahoma City. The reverse appears true for the spatially contiguous enclaves. These communities find no harm in political contact with the larger city, but express total antipathy to receiving any essential services from Oklahoma City. Thus the first hypothesis, stating that there is a difference in registered voter responses between the spatially isolated enclaves and the spatially contiguous enclaves, is confirmed.

Next to be considered are the hypotheses concerning differences between the responses of the registered voters of the two enclave groups and those of their respective local political representatives. The chi-square test confirms these hypotheses in that differences are not observed. In short, the local political representatives of the two spatial groups of enclaves express acceptability responses towards Oklahoma City that are similar to those of their respective constituents. Both spatial groups of enclaves, in other words, have local political representatives who view the larger city with acceptability attitudes which reinforce those of their constituents. One can conclude from the sample used that the local political representatives of the two spatial enclave groups

echo their constituents' sentiments towards the larger city, thereby providing quick and accurate indicators of registered voter attitudes towards Oklahoma City.

The Socio-Economic-Political Enclave Groups

The high status, dormitory group, consisting of Forest Park, Lake Aluma, the Village, and Woodlawn Park; the lower status, dormitory group, comprising Warr Acres, Mustang, and Valley Brook; and the functionally provincialist group pairing Bethany and Nichols Hills show significant group differences. The chi-square test confirms the hypothesis that there is a difference in the registered voter acceptability responses between the three socio-economic-political groups of enclaves. A discussion of where the differences lie between these three enclave groups follows.

The differences between the three groups of enclaves are reflected in the responses to three questions. The first difference concerns the hypothetical movement of children to attend school in Oklahoma City. Respondents in the high status, dormitory group were almost evenly divided over the issue. This was not the case with the lower status, dormitory and the functionally provincialist enclaves, where acceptability attitudes were more negative. It appears that towns in the high status, dormitory group are the most willing (or the least unwilling) to have their children moved to the larger city. This is most apparent in the case of the Village and Lake Aluma. It is difficult to determine with any assurance a general reason for this pattern. The Village is already part of the Oklahoma City School District, whereas Lake Aluma is divided

between the Pleasant Hill and Millwood school districts. It would appear that being already a part of the Oklahoma City School District makes the state of affairs more acceptable to the Village. No doubt the absence of a local school in most of the high status, dormitory enclaves tends to influence the acceptance of their being a part of the Oklahoma City school system. At least it ought to!

The remaining two questions which reveal differences among the three enclave groups are those concerned with having police and fire protection provided by Oklahoma City. The high status, dormitory enclaves accept such a possibility; residents of the lower status, dormitory enclaves are divided over the issue; and the functionally provincialist enclaves are opposed to such a proposition. The response pattern is clearly related to the ability of the enclave groups to provide these essential services for themselves. For example, Woodlawn Park, even though presently receiving police and fire services from Bethany, appears quite willing to consider accepting these same services from Oklahoma City. Nichols Hills and Bethany, on the other hand, would not welcome Oklahoma City fire and police protection, presumably because these services are already locally supplied by the enclaves themselves. In addition, different population growth rates among the three types of enclave groups probably tend to create variations in service demand.

Differences do exist between acceptability responses in the three socio-economic-political groups of enclaves, but these are less pronounced than in the two spatial groups. Perhaps some explanation for this can be found in the different levels of development of the residential and commercial areas within the enclaves. The enclaves whose

areas are all or almost exclusively residential are more positive in their acceptance responses towards the larger city, especially over certain issues. For these same issues, however, different acceptance responses are evident in the functionally provincialist enclaves whose areas contain commercial as well as residential zones.

The chi-square test confirms that the political representatives of the three socio-economic-political enclave groups express similar acceptability attitudes to those of their respective registered voters. This result is consistent with that observed in the case of the two spatial groups of enclaves. In other words, the acceptability responses of local political representatives are independent of the two major types of enclaves (spatial and socio-economic-political) which they represent. This is probably what should be expected in a democratic society.

In summary, the two spatial groups of enclaves, when compared with each other, tend to express greater differences in acceptability responses towards the larger city than do the three socio-economic-political groups when these are compared to each other. It appears, therefore, that the degree of difference concerning acceptability attitudes towards the larger city is more dependent upon the spatial variable than upon the socio-economic-political variable. With minor exceptions, the political representatives of the enclaves express acceptance responses similar to those of their respective registered voters, regardless of the enclave type. A practical conclusion might be suggested. When cooperation appears urgent, it would seem profitable for the larger city to first contact the local political representatives of the enclaves before initiating any new inter-governmental approaches. The local representatives,

judging by this survey, reflect quite accurately the views and attitudes of their registered voter constituents towards the larger city.

The evidence supports the two major hypotheses stated earlier in the chapter. These involved differences between the spatial and socio-economic-political enclave groups. However, a final observation must be made as to whether the expression of acceptability responses towards the larger city is independent or dependent upon the overall character (spatial-socio-economic-political) of the nine enclave communities. Previous analysis revealed that differences were more dependent upon the spatial variable, but what is the situation when the combined character of the nine enclaves is considered? Observations from Table XXVIII indicate that the expression of acceptability responses towards Oklahoma City is dependent upon the character of the enclaves. This table shows that Bethany and Nichols Hills, spatially contiguous, functionally provincialist enclaves, and Warr Acres, spatially contiguous, lower status dormitory, are the only enclaves whose registered voters express similar acceptability responses regardless of their spatial or socio-economic-political character. In the other six enclaves, the spatially isolated, high and lower status dormitory ones and the spatially contiguous, high status dormitory ones, the expression of acceptability responses is dependent upon the character of these enclaves.

TABLE XXVIII

SIMILARITIES AND DIFFERENCES OF ACCEPTABILITY
RESPONSES FOR THE NINE ENCLAVES

a) Attitudes

Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park U,A Lake Aluma U,A	Mustang U,A Valley Brook U,A	
Spatially Contiguous	Woodlawn Park A,A Village A,A	Warr Acres A,A	Bethany A,A Nichols Hills A,A

b) Services

Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park A,A Lake Aluma A,A	Mustang A,U Valley Brook A,U	
Spatially Contiguous	Woodlawn Park U,A Village U,A	Warr Acres U,U	Bethany U,U Nichols Hills U,U

c) Movement

Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park A,A Lake Aluma A,A	Mustang A,A Valley Brook A,A	
Spatially Contiguous	Woodlawn Park U,A Village U,A	Warr Acres U,U	Bethany U,U Nichols Hills U,U

d) Cooperate

Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park U,A Lake Aluma U,A	Mustang U,A Valley Brook U,A	
Spatially Contiguous	Woodlawn Park A,A Village A,A	Warr Acres A,A	Bethany A,A Nichols Hills A,A

The first letter after each enclave indicates the type of response when defined as a spatial enclave (isolated or contiguous). The second letter after each enclave indicates the type of response when defined as a socio-economic-political enclave (high status, lower status, or functional).

A- Enclave finds category acceptable.

U- Enclave finds category unacceptable.

CHAPTER VIII

POLITICAL ATTITUDES AND FUNCTIONAL ORIENTATION OF THE INCORPORATED ENCLAVES

As a further means of assessing the relationship of the incorporated enclaves to Oklahoma City, an investigation was carried out concerning political attitudes and functional orientations within the nine engulfed communities. The two major groups of enclaves (spatial and socio-economic-political) were again examined with this in mind. An attempt was made to discover if a relationship existed between the character of the enclaves, the political attitudes of their registered voters, and the functional linkages of these voters to the larger city. The following two hypotheses are still to be tested: (1) the spatially contiguous enclaves, both in attitudinal and functional orientation, are more locally inclined and directed than are the spatially isolated enclaves; and (2) the high status, dormitory and functionally provincialist enclaves, although locally oriented in attitudes, are more functionally oriented to Oklahoma City than the lower status, dormitory enclaves.

The study of political attitudes involves a number of questions concerning possible annexation to the larger city, and certain other questions having to do with community identification factors or symbols within the enclaves. The annexation questions were intended to reveal

whether the respondents could define annexation and, if so, how they defined it. They also posed an inquiry as to whether the enclaves wanted to become a part of Oklahoma City, and why or why not. The community identification questions explored the respondents' ability to identify important institutions which serve to build community loyalty within each of the enclaves and the way in which voters perceive their community's relation to Oklahoma City. The point of the political attitude questions was to sample voter opinion concerning annexation by, or merger with, Oklahoma City and, secondly, to see whether or not the registered voters of the enclaves felt that their communities had a truly separate identity from the larger city.

To discover the political-functional orientation of the registered voters within the nine incorporated enclaves, questions were posed which would reveal the extent to which the enclaves functioned independently from the larger city. These political-functional questions dealt with newspaper(s) read, preferred place of banking, and shopping habits when purchasing food, clothing, furniture, and appliances. The purpose of these questions was to discern the degree of functional independence that the enclaves have from Oklahoma City. It was assumed that the registered voters reflected more local awareness and more community loyalty when their actions were largely confined within the local enclave communities. The larger questions raised were these: To what extent do the enclave towns rely upon the larger city for essential goods and services? Which types of enclave towns are most dependent in a functional sense on Oklahoma City, and what is the degree of that dependence?

In order to test the two hypotheses proposed in the opening paragraph of this chapter, it was first necessary to determine whether differences existed between the enclave groups. Since the basic problem was similar to that explored in Chapter VII, the chi-square test was again employed. Appendix D contains tables enumerating the results of the responses given by the registered voters in the nine incorporated enclaves and the values obtained by the chi-square tests. The analysis which follows is based upon these tables.

The Spatial Enclave Groups

The two spatial enclave groups, as before, consisted of the spatially isolated ones, Forest Park, Lake Aluma, Mustang, and Valley Brook, and the spatially contiguous ones, Bethany, Nichols Hills, Warr Acres, Woodlawn Park, and the Village. Differences were detected in the responses to political attitude questions in the two types of spatial groups. On the matter of definition of annexation, voters in the spatially contiguous enclaves felt that annexation would mean Oklahoma City's taking adjacent land for "healthy growth" and additional tax revenue, while those in the spatially isolated enclave group considered this definition less appropriate. The difference can be explained by the fact that the spatially contiguous enclaves have more to offer the larger city and hence feel a greater stake in defending their independence. Bethany, Warr Acres, and the Village, all with substantial commercial areas, were inclined to perceive Oklahoma City as a possible usurper of their domains for the purpose of gaining tax revenue. On the other hand, the spatially isolated enclaves, by emphasizing a

different definition of annexation, appeared to regard their political areas as negligible revenue sources for the larger city.

Further differences between the two spatial enclave groups are observed concerning community identification factors and community reference terms. Enclave voters in the spatially contiguous group feel that the local churches, schools, and civic groups are their major community identity factors. This attitude is much less evident in the spatially isolated enclaves where such community identity factors are generally absent. For example, unlike Mustang and Valley Brook, neither Forest Park nor Lake Aluma has a church within its political area. A further contrast appears between the two groups as regards community reference terms. The spatially isolated enclaves tend to refer to themselves as towns rather than suburbs, while the latter is a term more frequently employed by residents of the spatially contiguous enclaves. It appears that spatial contiguity with other enclaves gives the registered voters a stronger sense of functional identity, of being truly outside the larger city's municipal area. The spatially isolated enclaves appear to be more conscious of being engulfed by Oklahoma City, and their residents more frequently assert their strong independence by emphasizing their political detachment from the larger city.

Questions bearing on the functional orientation of the two spatial enclave groups reveal a strikingly varied pattern, with group differences observed in the case of five of the six questions asked. The first difference related to newspapers read. Respondents in the spatially contiguous group regularly read both the Daily Oklahoman and the

Oklahoma City Times, the morning and evening newspapers printed by the Oklahoma Publishing Company. This reading pattern is less characteristic of the spatially isolated enclaves, where the tendency is for the registered voters to read mainly the Daily Oklahoman. This particular pattern is hard to relate to the political-functional habits and preferences of the two enclave groups. Banking and food, clothing, furniture, and appliance shopping are transacted largely in Oklahoma City by the registered voters of the spatially isolated enclaves. It would seem reasonable that the voters here would prefer Oklahoma City papers over the local papers because their functional orientation is more to the larger city. However, residents of the spatially contiguous enclaves show a greater tendency to bank locally and patronize local grocery stores. It should be remembered, of course, that there are very few local newspapers circulating in the enclave towns, and those that are have a difficult task competing with the three major Oklahoma City dailies. Local newspapers, all published and distributed only on a weekly basis, are available in Mustang, Bethany, Warr Acres, and Nichols Hills. The local banking orientation likewise has to be considered in relation to bank availability. Local banks are present in Bethany, Warr Acres, and the Village, which also serve part of the banking needs of the adjoining enclaves of Woodlawn Park and Nichols Hills. Among the spatially isolated enclaves, only Mustang has a local bank, and that was opened quite recently.

The spatially contiguous enclaves are also locally oriented in regard to food shopping. Of these, only Woodlawn Park lacks local food shopping facilities, and here most of the registered voters patronize the stores in the adjoining enclave city of Bethany. Even though

Mustang and Valley Brook have commercial food stores, these are not large enough to entice the local voters away from the larger grocery stores of Oklahoma City.

Shopping preferences in relation to clothing, furniture, and appliances reveal similar differences between the two spatial enclave groups. Even though both groups appear strongly oriented to Oklahoma City, residents of the spatially contiguous enclaves more often shop locally for the items mentioned. The number of registered voters sampled again was large enough to justify use of the chi-square test, which did reveal significant differences. These differences are probably adequately explained by noting the availability of quality commercial shops in Bethany, the Village, and Nichols Hills, and the paucity or absence of such shops in the isolated enclaves.

The results of the political-functional orientation study indicate that the isolated enclaves are more oriented to the larger city than the contiguous enclaves. The functional orientation of the spatially contiguous group is more local except perhaps when the residents are seeking speciality items. In this case the pull of "downtown" and major shopping centers like Penn Square, Mayfair, and Shephard Mall is overwhelming.

Rather curiously, residents of the spatially isolated enclaves show no tendency to patronize other enclave units, even when they have commercial facilities reasonably comparable to those of Oklahoma City. Their isolated position evidently intensifies the idea that there is no alternative to being functionally oriented towards the larger city. Even Mustang's relative nearness to Bethany does not deter its citizens from preferring to shop in Oklahoma City. On the other hand, this situation

is not particularly characteristic of the spatially contiguous enclaves. If certain commercial facilities are not available in the local enclave, the alternative orientation is likely to be toward a nearby contiguous enclave and not towards Oklahoma City. This is clearly the case in Woodlawn Park's orientation towards Bethany, and Nichols Hills' orientation towards the Village.

The preceding analysis has supported the first hypothesis. The results indicate that the spatially contiguous enclaves, both in attitudinal and functional orientation, are more locally inclined and directed than are the spatially isolated enclaves. Therefore, attitudinal and functional orientation of the individual enclaves is at least somewhat dependent upon the enclave's spatial arrangement within the larger city's municipal area.

The Socio-Economic-Political Enclave Groups

The three socio-economic-political enclave groups consist of the high status, dormitory enclaves (Forest Park, Lake Aluma, Village, and Woodlawn Park), the lower status, dormitory enclaves (Mustang, Warr Acres, and Valley Brook), and the functionally provincialist enclaves (Bethany and Nichols Hills). Differences between the three enclave groups are observed in the case of five of the seven political attitudinal questions. The first observed difference concerns voter definition of annexation. Respondents in the functionally provincialist enclaves were especially likely to see the word as meaning that the larger city takes adjacent land for growth and taxes, a reflection of their consciousness of significant commercial areas in their communities. This was especially

evident in Bethany, where a substantial commercial district is located. People in the other two enclave groups seemed to stress the non-commercial character of their areas and commonly formulated other kinds of definitions of annexation.

This contrast in attitude between the three enclave groups is further reflected in voter reaction to possible annexation of the local enclaves to Oklahoma City. The lower status, dormitory enclaves, in contrast to the other two enclave groups, have a substantial number of individuals who favor becoming a part of the larger city. This is most apparent in Valley Brook where 43 per cent of the registered voters said they favored joining Oklahoma City. Voters in these three enclaves feel that if their communities became part of Oklahoma City, taxes would be lower and municipal services would be better. General opposition to such annexation is evident in the high status, dormitory enclaves and the functionally provincialist enclaves, especially in the latter group. About 79 per cent of the registered voters interviewed in Bethany opposed annexation, as did 97 per cent of those in Nichols Hills. The reasons given for opposition to annexation by the larger city were quite varied. Respondents in the high status, dormitory enclaves mentioned concern about higher taxes as a major reason for not joining Oklahoma City. This seems like a reasonable concern, especially in Woodlawn Park, Lake Aluma, and Forest Park, since these enclaves have smaller municipal expenditures per capita than the functionally provincialist enclaves. On the other hand, in the two functionally provincialist enclaves, Bethany and Nichols Hills, satisfaction with the status quo seems like an adequate reason for opposing annexation. Responses in these two socio-economic-political

enclaves reflect a satisfied, conservative citizenry. Approximately 25 per cent¹ of the registered voters in both Bethany and Nichols Hills feel so secure that they simply assert a preference for the status quo as their major argument against annexation by Oklahoma City.

In their recognition of community identification factors and community reference terms, the enclave groups also show differences. Nichols Hills and Bethany residents stress the role of churches and schools. On the other hand, residents in the high status, dormitory enclaves listed "none" as their major response. The commuter-residential character handicaps the development of strong community identification factors in this latter enclave group. Registered voters in the lower status, dormitory enclaves, while feeling that schools were important, also often listed "none" as a response. Warr Acres and Mustang, lower status, dormitory enclaves, have separate school districts, a circumstance which has helped to develop community pride in these two centers. Mustang has its own school district of the same name, but most of Warr Acres is associated with the Putnam City School District. This researcher noticed that in both enclaves the registered voters expressed a very strong loyalty to and pride in their respective school districts. Valley Brook is part of the Oklahoma City school system, but it does have an elementary school within its political area which helps to give it some degree of community identity. These varied patterns tend to be reflective of each community's general character, although at times the interviewer had the impression

¹In this case 25 per cent is a significant percentage because the status quo reason is one of eight reasons listed.

that community feeling, or community identity, of any kind was remarkably weak. This is a conclusion which a number of writers on American suburbia seem to have reached.

Comments of respondents on the community reference terms show a varied pattern. Voters in the high status, dormitory and the lower status, dormitory enclaves mainly refer to themselves as living in suburbs. However, in the functionally provincialist enclaves the reference term used more frequently was "town." This usage appears indicative of a recognition of a town or city character when there is a significant level of commercial activity. The differences are important and deserve emphasis. Registered voters in the dormitory enclaves seem generally incapable of feeling that they have a distinctive town status within the Oklahoma City municipal area.

In summary, the analysis of the political attitudes in the three socio-economic-political enclaves reveals some interesting contrasts. The functionally provincialist enclaves identify more with local community institutions, thereby maintaining a separate identity from Oklahoma City. They appear quite cognizant of their political (i.e., town) status, and tend to have a general disregard for the affairs of the larger city. Voters in the lower status, dormitory enclaves appear somewhat more amenable to the idea of annexation to the larger city, evidently believing that this might mean lower taxes and better municipal services. They also feel that their schools serve as major community institutions. Rather curiously, however, these same registered voters feel that their communities are less qualified to function as true towns than do the voters of Bethany and Nichols Hills. The high status, dormitory enclaves

appear satisfied to function as bedroom communities outside the larger city, thereby maintaining low taxes, but in so doing they do not necessarily develop much of a sense of community identity.² Their separate existence depends only upon the real or perceived tax advantages they enjoy, and there is little thought given to municipal features which might help build community identity.

In reply to the six functional orientation questions, different patterns of response resulted on five of them. The first difference is a fairly minor one. It concerns newspaper reading habits and shows that voters in the lower status, dormitory enclaves have a tendency not to read as many newspapers regularly as those in the other two enclave groups. Both the functionally provincialist and the high status, dormitory enclaves read the two major Oklahoma City newspapers, the Daily Oklahoman and the Oklahoma City Times. However, residents of the lower status, dormitory enclaves, commonly confine their reading to the Daily Oklahoman. The difference probably relates to economic status, but may also reflect a contrast in the frequency of business ties with Oklahoma City.

Place of banking responses also show a different functional orientation for the three enclave groups. Voters in the lower status,

²Time Magazine, December 27, 1971, p. 6. A recent illustration of lower taxes in the metropolitan periphery is the case of Rolling Meadows, Illinois, a suburb, but not an enclave of Chicago. With a population of some 19,000, the suburb is a beneficiary of an Illinois law that allows municipalities to collect a portion of the state sales tax on goods billed within the community. With the \$1.2 million collected each year on the sale of products by such corporate residents as Western Electric and Hallicrafters, Rolling Meadows was able to abolish the city property tax and even purchase four Mercedes-Benz trash haulers, valued at \$23,000 each.

dormitory enclaves tend to bank locally or in another enclave. Both Mustang and Warr Acres have banks which are well patronized by the local registered voters. On the other hand, the voters of the two other enclave groups bank primarily in Oklahoma City. The total pattern is somewhat difficult to explain. In the case of the high status, dormitory enclaves, they simply lack local banks and therefore the residents frequent those in Oklahoma City. In the functionally provincialist enclaves, the reason is not so obvious. Nichols Hills lacks a local bank and depends on Oklahoma City for this service. While Bethany does have a local bank within its political area, business ties with the larger city draw some of the registered voters of Bethany to Oklahoma City banks.

Another obvious difference between the three enclave groups appears in the food shopping locations. Respondents in both the functionally provincialist and the lower status, dormitory enclaves tend to shop for food locally or in another enclave. Such local facilities are easily available in Mustang, Warr Acres, Bethany, and Nichols Hills. The high status, dormitory enclaves, although oriented locally in some regards, often frequent Oklahoma City stores for food purchases. However, when shopping for clothing, this enclave group has a substantial number of people, compared to the other two enclave groups, who shop locally or in another enclave. It appears, then, that the high status, dormitory enclaves are somewhat unpredictable in their shopping habits, although one would expect their residents to shop in large numbers in Oklahoma City for clothing. Evidently Woodlawn Park's registered voters find stores of adequate quality in nearby Bethany, and those in Lake Aluma and Forest Park find the nearby enclaves of Nichols Hills and the Village to be suitable

places to shop for clothing items.

A generalized conclusion concerning the functional orientation of the three socio-economic-political enclave groups is difficult to reach. It appears that the functionally provincialist enclaves and, to a lesser degree, the high status, dormitory enclaves are more functionally oriented towards Oklahoma City. On the other hand, the lower status, dormitory enclaves appear more locally oriented. The pattern can be explained by noting that this last group of enclaves is not as exclusively residential in character, and their voters are not as financially able as those in the other two enclave groups to drive by car for frequent purchases in the commercial establishments of the larger city.

In summary, Chapter VIII has proposed and analyzed two major hypotheses concerning differences between the two spatial enclave groups and the three socio-economic-political groups. The isolated enclave towns are especially aware of their engulfed position within Oklahoma City, and want to retain their independence even while remaining functionally oriented towards the larger city. The case of the spatially contiguous enclaves is different, in that here the residents further express their defiant attitude toward the larger city by their local functional orientation. Generalizations concerning the three socio-economic-political enclave groups are more difficult. The functionally provincialist enclaves, even though considering themselves as towns, are quite functionally oriented towards Oklahoma City. The lower status, dormitory enclaves, on the other hand, appear more positively oriented to the larger city in their attitudes, but are locally oriented in their functional activities. The third socio-economic-political enclave type, comprising the high

status, dormitory enclaves, appears to be intermediate in functional orientation between the other two. This intermediate orientation, both in attitudes and functions, seems somehow related to the absence of any real community identity features, either physical or cultural, which if present would give these enclaves a more effective means to justify their existence within the municipal area of Oklahoma City.

A final question must be resolved. Are political attitudes and functional orientation towards the larger city dependent upon the overall character (spatial-socio-economic-political) of the nine enclave communities? Differences were detected when the spatial and socio-economic-political character were treated separately. However, what are the observations when the combined character of the nine enclaves is considered? Table XXIX displays the similarities and differences among the nine enclaves. As to political attitudes, it may be observed that Forest Park and Lake Aluma, spatially isolated, high status dormitory enclaves, and Bethany, Nichols Hills, Woodlawn Park, and the Village, spatially contiguous, functionally provincialist and high status dormitory ones, express similar political attitudes regardless of their spatial or socio-economic-political character. However, a similarity pattern is not observed for the functional orientation, except in the case of Forest Park and Lake Aluma, spatially isolated, high status dormitory enclaves, and Warr Acres, spatially contiguous, lower status dormitory. The conclusion, therefore, is that the character of the enclaves is closely related to functional orientation, while the expression of political attitudes is more independent of the character of the enclaves. Further, it is apparent that for the spatially isolated,

TABLE XXIX

SIMILARITIES AND DIFFERENCES OF POLITICAL ATTITUDES
AND FUNCTIONAL ORIENTATION FOR THE NINE ENCLAVES

a) Attitudes

Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park L,L/OK Lake Aluma L,L/OK	Mustang L,OK Valley Brook L,OK	
Spatially Contiguous	Woodlawn Park L,L/OK Village L,L/OK	Warr Acres L,OK	Bethany L,- Nichols Hills L,-

b) Functions

Enclave Types	High Status Dormitory	Lower Status Dormitory	Functionally Provincialist
Spatially Isolated	Forest Park OK,OK/L Lake Aluma OK,OK/L	Mustang OK,L Valley Brook OK,L	
Spatially Contiguous	Woodlawn Park L,OK/L Village L,OK/L	Warr Acres L,L	Bethany L,- Nichols Hills L,-

The first letter(s) after each enclave indicates the type of response when defined as a spatial enclave (isolated or contiguous). The second letter(s) after each enclave indicates the type of response when defined as a socio-economic-political enclave (high status, lower status, or functional).

L--Enclave is locally oriented.

OK--Enclave is oriented to Oklahoma City.

L/OK--Enclave is divided in orientation.

high status dormitory enclaves, character is unimportant in determining either functional orientation or political attitudes.

CHAPTER IX

CONCLUSIONS AND RECOMMENDATIONS

This study has approached the analysis of local municipal government in a manner somewhat different from most political research efforts. Since it is a geographic study, the focus has been upon the nine incorporated enclaves which are engulfed by and function within the municipal area of Oklahoma City. The findings appear to provide a usable framework for understanding the maze of local governmental relationships which exists within many American metropolitan areas. Oklahoma City was selected for examination in part because its 1970 municipal area contained a total of eleven incorporated and seven unincorporated enclaves. Its complicated political pattern reflects the overall problem of political fragmentation that is present in numerous other urban communities.

The analysis of nine of the eleven incorporated enclaves involved only the views of registered voters, and the conclusions should be read with this in mind. The decision to restrict the 775 respondents to registered voters was influenced by the fact that the most common vehicle for providing citizen control of government activities is the ballot box. In a citizen oriented government, the opinions and expressions of the voters are the most influential ones.

With a view to understanding the development and functioning aspects of the nine political enclaves, this study has measured and analyzed their relationships to the larger engulfing municipality whose daily activities are so intricately related to their own. To treat the enclaves as separate political entities without also giving careful attention to their involvement in the municipal area, would be to neglect all the common problems facing any metropolitan area. The most urgent of these problems concern transportation, housing, haphazard and illogical development, solid waste disposal, park and recreation facilities, water pollution, and jurisdictional disparities between tax resources and needs.¹

This study of the nine incorporated enclaves of Oklahoma City has involved a consideration of their character (spatial-socio-economic-political), with attention to their relationship to Oklahoma City based on the provision of municipal services, acceptability responses, and political attitudes and functional orientation. The following four major conclusions have been drawn: (1) the provision of municipal services is independent of the character of the enclaves, (2) the expression of acceptability responses is dependent upon the character of the enclaves, (3) political attitude responses are independent of the character of the enclaves, and (4) functional orientation is dependent upon the character of the enclaves. Thus, the character of the enclaves is most important when considering

¹The Conservation Foundation, "The Twin Cities Area Tries a Farsighted Approach to Dealing with Regional Environmental Problems," Letter: A Report on Environmental Issues (October 1971), p. 2.

acceptability responses and functional orientation of the enclaves to the larger city, but it is relatively insignificant when relating the provision of municipal services and political attitudes to the larger city.

In evaluating the acceptability and functional orientation responses a number of conclusions can be drawn concerning the nine incorporated enclaves. The expression of acceptability responses is dependent upon the spatial-socio-economic-political character in the case of six of the enclaves: Mustang, Valley Brook, Woodlawn Park, the Village, Forest Park, and Lake Aluma. Functional orientation of the enclaves is also dependent upon enclave character in six, but not exactly the same six, enclaves: Mustang, Valley Brook, Bethany, Nichols Hills, Woodlawn Park, and the Village. It may be observed that Mustang, Valley Brook, Woodlawn Park, and the Village show a relationship when considering both acceptance responses and functional orientation. Bethany, Forest Park, and Lake Aluma, however, appear only once when considering the two relationship measures, and Warr Acres displays no relationship to enclave character. In the case of Mustang, Valley Brook, Woodlawn Park, and the Village, character is a very essential variable in explaining their relationship with Oklahoma City. For Bethany, Forest Park, and Lake Aluma, character plays a somewhat minor role in their relationship with the larger city, and for Warr Acres no role at all.

In view of the above findings, it is evident that the character of the nine incorporated enclaves varies in its influence upon the relationship with Oklahoma City. It appears, when considering all

the relationship measures and the character of the nine enclaves, that the character variables considered play a minor role in influencing the relationship with the larger city.

Another important conclusion reached in this study is the identification of six basic enclave types: (1) spatially isolated, high status dormitory, (2) spatially isolated, lower status dormitory, (3) spatially isolated, functionally provincialist, (4) spatially contiguous, high status dormitory, (5) spatially contiguous, lower status dormitory, and (6) spatially contiguous, functionally provincialist. This researcher hopes that other cities having enclave areas within their territory will find it helpful to consider and to utilize some of the findings of this study in their attempts to effectively understand functional relationships within their metropolitan areas. An understanding of these functional relationships is necessary for a variety of reasons common to all metropolitan centers which want to avoid (1) a decline in the city tax base, (2) indirect subsidization of suburbs, (3) decline of the inner city, (4) suburban demands for independence and local control, (5) duplication of municipal services, and (6) rising city expenditures.² In Oklahoma City an attempt to coordinate relationships with adjacent municipalities was initially undertaken in June, 1966 when the Association of Central Oklahoma Governments (ACOG) was organized. Surely such an arrangement serves a very useful purpose, but of the nine incorporated

²Charles R. Adrian, State and Local Governments (New York: McGraw-Hill Book Co., Inc., 1967), pp. 236-245.

enclaves of Oklahoma City only six³ are participants. The unincorporated enclave areas are represented only as parts of Oklahoma County. It appears therefore, that to effectively coordinate any new functional relationships all the enclave units should be given consideration, and not grouped with quasi-enclave units such as Del City, El Reno, Midwest City, Moore, Norman, and Edmond. The organization of ACOG in this manner neglects the obvious spatial-socio-economic-political differences among the participants that should be recognized.

This researcher proposes the following five guidelines to facilitate the cooperation of enclave units with their engulfing municipality. (1) The political representatives of the local enclave units should be contacted in the initial stage of a new program because they reflect with considerably accuracy the majority opinion of their respective registered voters. (2) The larger engulfing municipality should deal with the enclaves on a socio-economic-political basis rather than on a spatial basis, for then a greater tendency toward positive acceptance expressions will result. (3) To initiate a coordinated program for the provision of such essential services as fire and police protection, the engulfing city should first contact the high status, dormitory enclaves because they seem the most willing to cooperate. (4) The larger city should cultivate and maintain a purposeful rapport with the functionally provincialist enclaves because they display a generally positive functional attitude towards the larger

³These six are: Bethany, Forest Park, Mustang, Nichols Hills, the Village, and Warr Acres.

city and could be expected to promote further enclave cooperation.

(5) In its relations with the engulfed enclaves, the larger city would do well not to emphasize the enclave character, because the smaller communities are often oblivious of each other's needs. These five proposals, if tactfully instigated by the larger city, could very well lead to the start of constructive metropolitan area relationships.

Most existing municipal research appears to emphasize the relationship with quasi-enclave suburbs, while ignoring the special problems of the true enclaves. The five guidelines suggested are by no means intended only for Oklahoma City. It is believed that they have very real application to other large municipalities that engulf enclave communities. It is important at the outset to identify the spatial-socio-economic-political character of each enclave as is done in this study, with possible modifications in approach in order to understand the individual character of metropolitan structures and relationships. This study of the Oklahoma City enclaves and their relationship to the metropolitan area of which they are a part hopefully will encourage practical applications in both this and other large urban communities.

APPENDIXES

APPENDIX A

THE QUESTIONNAIRE

University of Oklahoma - Department of Geography

Date _____ Town or City: _____ Ward: _____ Sex: _____

1. Are you a registered voter? _____
2. How long have you lived at your present address? _____
3. In or near what city or town did you live before moving here? _____

4. What was the last grade you completed in school? _____
5. Can you name your mayor or comparable official? Yes _____ No _____
If yes, what is his name? _____
6. Does the municipality you live in have a city manager? Yes _____ No _____
Do not know _____ If yes, what is his name? _____
7. Can you name your local councilman or trustee? Yes _____ No _____
If yes, what is his name? _____
8. Can you name the mayor of Oklahoma City? Yes _____ No _____
If yes, what is his name? _____
9. Can you name the city manager of Oklahoma City? Yes _____ No _____
If yes, what is his name? _____
10. What would you call the municipality or community in which you live:

city _____	village _____
town _____	suburb _____ other _____

THE QUESTIONNAIRE--Continued

11. Can you define annexation? Yes _____ No _____
If yes, limit your definition to two (2) sentences. _____
12. Do you favor or oppose annexation of your municipal community to Oklahoma City? Favor _____ Oppose _____ Neutral _____
Why? _____
13. Do you read one or more newspapers regularly? Yes _____ No _____
If yes, which one(s)? _____
14. If employed, in what municipality or community do you work?

15. In what municipality or community do you shop most frequently for:
Clothing _____ Furniture and/or
Appliances _____
Food _____
16. In what municipality or community do you do most of your banking?

17. What important institutions (schools, churches, clubs, etc), historical events, signs, symbols, or other special features help to build group (municipality or community) loyalty in you community? List the important ones. _____
18. What is your approximate yearly family income from all sources?
Less than \$3,000 _____ \$7,000-\$9,000 _____
\$3,000-\$4,999 _____ more than \$9,000 _____
\$5,000-\$6,999 _____ more than \$15,000 _____
19. What is your religious affiliation?
Methodist _____ Catholic _____ Do not care
Baptist _____ Jewish _____ to answer _____
Other Protestant _____ Other _____ None _____
20. What is your political affiliation?
Democrat _____ American Independent Party _____
Republican _____ Independent _____

THE QUESTIONNAIRE--Continued

21. PLACE AN "X" BESIDE EACH OF THE FOLLOWING STATEMENTS IN THE COLUMN WHICH BEST EXPRESSES YOUR FEELINGS.

	Possible Responses			
	Acceptable	Somewhat Acceptable	Somewhat Unacceptable	Not at all Acceptable
a. Having the mayor of Oklahoma City speak in my community would be....				
b. Moving to Oklahoma City for a better job would be.....				
c. Having my children attend school in Oklahoma City would be ...				
d. Having an Oklahoma City family as new neighbors would be.....				
e. Having Oklahoma City police protection is or would be.....				
f. Having Oklahoma City fire protection is or would be.....				
g. Having our community politicians work with Oklahoma City politicians on joint projects is or would be.....				
h. Having our community planner work with Oklahoma City planners is or would be.				
i. Having Oklahoma City residents work in my community is or would be..				
j. Being dependent upon an Oklahoma City physician is or would be.....				

APPENDIX B

TABLE 1
SOCIO-ECONOMIC-POLITICAL CHARACTERISTICS

a. Length of Residence

Length of Stay	Mustang		Valley Brook		Lake Aluma		Forest Park		Woodlawn Park		Nichols Hills		Warr Acres		Village		Bethany	
	No.	Per Cent	No.	Per Cent	No.	Per Cent	No.	Per Cent	No.	Per Cent	No.	Per Cent	No.	Per Cent	No.	Per Cent	No.	Per Cent
3 years or less	33	47	21	41	14	35	12	22	13	16	10	17	44	29	40	27	40	27
4 to 6 years	18	25	5	10	7	18	9	16	7	14	15	26	23	15	37	25	42	28
7 to 9 years	9	13	4	8	3	7	3	6	4	8	6	10	17	11	26	17	30	20
10 years or more	11	15	21	41	16	40	31	56	26	52	27	47	66	44	47	31	38	25

Note: The median length of stay was calculated by using the formula: $L + CD (N/2 - f_c) / f_m^a$,

in which L= the lower boundary of the median class

CD= the difference between two consecutive midpoints

N= the total population (number)

f_c = the cumulative frequency of the classes up to but not including the median class

f_m = the frequency of the median class

Using Mustang as an example the above formula would apply as follows: $4 + 3 (71/2 - 33) / 18 = 4.4$ years.

The calculations for the remaining enclaves are as follows:

Valley Brook	$4 + 3 (51/2 - 21) / 5$	= 6.7 years
Lake Aluma	$4 + 3 (40/2 - 14) / 7$	= 6.6 years
Forest Park	$10 + 3 (55/2 - 24) / 31$	= 10.3 years
Woodlawn Park	$10 + 3 (50/2 - 24) / 26$	= 10.1 years
Nichols Hills	$7 + 3 (58/2 - 25) / 6$	= 9.0 years
Warr Acres	$7 + 3 (150/2 - 67) / 17$	= 8.4 years
Village	$4 + 3 (150/2 - 40) / 37$	= 6.8 years
Bethany	$4 + 3 (150/2 - 40) / 42$	= 6.5 years

^a

This formula to calculate the median class is found in Henry L. Alder and Edward B. Roessler, Introduction to Probability and Statistics, San Francisco: W. H. Freeman and Company (1964), pp. 30-32.

TABLE 1--Continued

Yearly Family Income	b. Yearly Family Income									
	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany	
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	
< \$3,000	4 6	8 16	0 0	1 2	1 2	1 2	9 6	2 2	7 5	
\$3,000-\$4,999	10 14	8 16	0 0	2 4	1	1 2	14 9	13 9	19 13	
\$5,000-\$6,999	7 10	6 12	0 0	2 4	9 18	3 5	15 10	8 5	20 13	
\$7,000-\$9,000	17 24	18 35	3 8	5 10	4 8	4 7	26 17	26 17	29 19	
> \$9,000	24 34	10 20	8 20	15 27	22 44	12 21	60 40	70 47	63 42	
> \$15,000	9 13	1 2	29 73	30 55	13 26	37 64	26 17	31 21	12 8	

Note: The median yearly family income was calculated by using the formula contained in Table 1 a.
The calculations for the enclaves are as follows:

Mustang	$5,000 + 3,500 (71/2 - 14) / 24 = 8,135$
Valley Brook	$5,000 + 3,500 (51/2 - 16) / 24 = 6,385$
Lake Aluma	$15,000 + 6,000 (40/2 - 11) / 29 = 16,862$
Forest Park	$15,000 + 6,000 (55/2 - 25) / 30 = 20,500$
Woodlawn Park	$9,000 + 5,000 (50/2 - 15) / 22 = 11,272$
Nichols Hills	$15,000 + 6,000 (58/2 - 21) / 37 = 16,297$
Warr Acres	$9,000 + 5,000 (150/2 - 64) / 60 = 9,916$
Village	$9,000 + 5,000 (150/2 - 49) / 70 = 10,857$
Bethany	The median yearly family income is \$9,000 since 75 of the registered voters fall above this class and the remaining 75 fall below this class

TABLE 1--Continued

c. Place of Previous Residence									
Previous Residence	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Oklahoma City	42 59	27 53	30 75	45 82	21 42	38 66	56 37	58 38	47 31
Local Enclave	12 17	2 4	1 3	3 6	20 40	6 10	32 21	14 9	27 18
or other Enclaves									
Outside Oklahoma City	17 24	22 43	9 22	7 12	9 18	14 24	62 42	78 53	76 51
d. Education									
Educational Level	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Grade School Only	11 15	11 22	2 5	1 2	6 12	1 2	11 7	7 5	16 11
Attended High School	11 15	19 37	1 3	3 6	4 8	5 9	14 9	14 9	17 11
Finished High School	37 52	20 39	7 18	23 42	22 44	11 19	65 43	52 35	55 37
Attended College or University	8 11	1 2	8 20	10 18	6 12	11 19	35 23	39 26	40 27
College or University Degree	4 6	0 0	22 55	18 33	12 24	30 52	25 17	38 25	22 15

Note: Each of the above educational levels is arbitrarily assigned a number from one through five. Therefore, grade school is a 1, attended high school is a 2, finished high school is a 3, attended college or university is a 4, and college or university degree is a 5. Such an arrangement allows a median educational level to be calculated since no actual grades were recorded in the compilation procedures. Thus to compute the median educational level, no formula was required. It is only necessary to observe the median level (that is, the level at which one half of the registered voters for each enclave lie above and one half lie below).

TABLE 1-- Continued

e. Religious Affiliation

Denomination	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Methodist	12 17	2 4	10 25	9 16	7 14	19 33	28 19	40 27	22 15
Baptist	25 35	23 45	0 0	11 20	24 48	5 9	40 27	34 23	49 33
Other Protestant	24 34	19 37	21 53	23 42	13 26	26 45	65 43	57 38	68 45
Catholic	1 1	3 6	5 13	7 13	3 6	4 7	12 8	14 9	5 3
Jewish	0 0	0 0	0 0	0 0	0 0	0 0	0 0	0 0	0 0
Other	6 9	0 0	0 0	0 0	2 4	0 0	1 1	0 0	3 2
Do not care to answer	2 3	0 0	0 0	0 0	0 0	0 0	0 0	0 0	0 0
None	1 1	4 8	4 10	5 9	1 2	4 7	4 3	5 3	3 2

f. Place of Work

Place of Work	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Oklahoma City	36 50	27 53	21 53	29 53	20 40	20 35	74 49	69 46	61 41
Local Enclave or other Enclave	9 13	2 4	3 7	3 5	6 12	3 5	15 10	20 13	26 17
Outside Oklahoma City	5 7	2 4	1 2	2 4	8 16	2 3	4 3	10 7	6 4
Housewife	14 20	16 31	15 38	16 29	11 22	28 48	41 27	42 28	42 28
Retired	7 10	4 8	0 0	5 9	5 10	5 9	16 11	9 6	15 10

TABLE 1--Continued

g. Political Affiliation

Political Affiliation	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Democrat	55 78	43 84	14 35	39 71	32 64	28 48	90 60	81 54	87 58
Republican	10 14	7 14	26 65	14 26	17 34	27 47	50 33	60 40	58 39
American Independent Party	1 1	0 0	0 0	0 0	0 0	0 0	1 1	0 0	0 0
Independent	5 7	1 2	0 0	2 3	1 2	3 5	9 6	9 6	5 3

h. Ability to Name the Local Mayor

Ability to Name	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Can name	29 41	0 0	0 0	14 26	1 2	15 26	38 25	9 6	48 32
Can not name	42 59	19 37	7 18	13 24	41 82	43 74	112 75	141 94	102 68
Does not have a mayor	0 0	20 39	29 73	17 31	0 0	0 0	0 0	0 0	0 0
Does not know if town has mayor	0 0	12 26	4 10	11 20	8 16	0 0	0 0	0 0	0 0

i. Ability To Name The Local City Manager

Ability to Name	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Has a city manager	9 13	5 10	5 13	2 4	0 0	47 81	46 31	83 55	102 68
Does not have a city manager	39 55	29 57	32 80	45 82	50 100	6 10	46 31	24 16	12 8
Do not know	23 32	17 33	3 7	8 14	0 0	5 9	58 38	43 29	36 24

TABLE 1--Continued

j. Ability To Name the Local Ward Councilman (or Trustee)

Ability to Name	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Can name	14 20	10 20	20 50	4 7	10 20	0 0	29 19	12 8	23 15
Cannot name	57 80	41 80	20 50	51 93	40 80	58 100	121 81	138 92	127 85

k. Ability to Name Mayor of Oklahoma City

Response	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Named mayor	36 51	28 55	32 80	45 82	33 66	52 90	90 60	106 71	88 59
Did not name	35 49	23 45	8 20	10 18	17 34	6 10	60 40	44 29	62 41

1. Ability to Name City Manager of Oklahoma City

Response	Mustang	Valley Brook	Lake Aluma	Forest Park	Woodlawn Park	Nichols Hills	Warr Acres	Village	Bethany
	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent	No. Per Cent
Named	32 45	20 39	27 68	36 65	33 66	42 72	88 59	92 61	77 51
Did not name	39 54	31 61	13 32	19 35	17 34	16 28	62 41	58 39	73 49

APPENDIX C

TABLE 2
TABULATIONS OF CHI-SQUARE VALUES FOR THE
REGISTERED VOTERS OF THE SPATIALLY ISOLATED ENCLAVES

	Mustang	Valley Brook	Forest Park	Lake Aluma	Totals	Chi-Square Values ^b : Isolated Versus Contiguous
1. Oklahoma City Influence Within the Enclave						
A. Having the mayor of Oklahoma City speak						
acceptable ^a	63	46	47	38	194	
unacceptable	8	5	8	2	23	6.14
B. Having an Oklahoma City family as new neighbors						
acceptable	70	51	55	40	216	
unacceptable	1	0	0	0	1	0.48
C. Having Oklahoma City residents work in enclave						
acceptable	69	49	55	39	212	
unacceptable	2	2	0	1	5	0.00

^aMost of the totals for the somewhat acceptable and somewhat unacceptable responses were too low in actual numbers to be grouped into cells for chi-square calculations, and therefore it was decided to group the somewhat acceptable responses into the acceptable category and the somewhat unacceptable responses into the unacceptable category. This was not done for the aggregate total comparison and the political representative comparison.

^bThe critical chi-square value is 3.841 at the .05 significance level with one degree of freedom. The formula for calculating the chi-square value is:

$$\chi^2 = \sum \frac{(f_o - f_e)^2}{f_e}$$

respectively to the observed and expected frequencies for each cell. For a full description of this test see Hubert M. Blalock, Jr., Social Statistics, New York: McGraw-Hill Book Co., Inc. (1960), Chapter 15.

TABLE 2--Continued

	Mustang	Valley Brook	Forest Park	Lake Aluma	Totals	Chi-Square Values ^a : Isolated Versus Contiguous
2. Moving to Oklahoma City						
A. Moving for a better job						
acceptable	29	26	19	14	88	1.35
unacceptable	42	25	36	26	129	
B. Having children attend school in Oklahoma City						
acceptable	13	35	26	28	102	
unacceptable	58	16	29	12	115	5.48
3. Some Essential Services						
A. Having police protection from Oklahoma City						
acceptable	48	43	32	28	151	
unacceptable	23	8	23	12	66	76.69
B. Having fire protection from Oklahoma City						
acceptable	61	49	53	39	202	
unacceptable	10	2	2	1	15	167.18
C. Being dependent upon an Oklahoma City physician						
acceptable	65	50	52	40	207	
unacceptable	6	1	3	0	10	8.18
4. Willing to Have Officials Cooperate						
A. Working with Oklahoma City planners						
acceptable	58	47	50	33	188	0.27
unacceptable	13	4	5	7	29	

^aThe critical chi-square value is 3.841 at the .05 significance level with one degree of freedom.

TABLE 2--Continued

	Mustang	Valley Brook	Forest Park	Lake Aluma	Totals	Chi-Square Values ^a : Isolated Versus Contiguous
B. Working with Oklahoma City political representatives						
acceptable	58	45	48	34	185	
unacceptable	13	6	7	6	32	7.30

^aThe critical chi-square value is 3.841 at the .05 significance level with one degree of freedom.

TABLE 3

TABULATIONS OF CHI-SQUARE TOTALS FOR THE
REGISTERED VOTERS OF THE SPATIALLY CONTIGUOUS ENCLAVES

	Bethany	Woodlawn Park	Warr Acres	Nichols Hills	Village	Totals
1. Oklahoma City Influence Within the Enclave						
A. Having the mayor of Oklahoma City speak						
acceptable	144	46	139	56	142	527
unacceptable	6	4	11	2	8	31
B. Having an Oklahoma City family as new neighbors						
acceptable	149	50	150	58	150	557
unacceptable	1	0	0	0	0	1
C. Having Oklahoma City residents work in enclave						
acceptable	146	48	146	58	147	545
unacceptable	4	2	4	0	3	13
2. Moving to Oklahoma City						
A. Moving for a better job						
acceptable	58	15	70	29	80	252
unacceptable	92	35	80	29	70	306
B. Having children attend school in Oklahoma City						
acceptable	35	18	24	38	96	211
unacceptable	115	32	126	20	54	347
3. Some Essential Services						
A. Having police protection from Oklahoma City						
acceptable	38	41	36	17	62	194
unacceptable	112	9	114	41	88	364

TABLE 3--Continued

	Bethany	Woodlawn Park	Warr Acres	Nichols Hills	Village	Totals
B. Having fire protection from Oklahoma City						
acceptable	47	40	57	21	68	233
unacceptable	103	10	93	37	82	325
C. Being dependent upon an Oklahoma City physician						
acceptable	125	47	135	58	130	495
unacceptable	25	3	15	0	20	63
4. Willing to Have Officials Cooperate						
A. Working with Oklahoma City planners						
acceptable	130	41	135	53	132	491
unacceptable	20	9	15	5	18	67
B. Working with Oklahoma City political representatives						
acceptable	136	46	134	57	139	512
unacceptable	14	4	16	1	11	46

TABLE 4
CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR
SPATIALLY ISOLATED AND SPATIALLY CONTIGUOUS ENCLAVES

All questions	Spatially Isolated	Spatially Contiguous	Chi-Square Value ^a
acceptable	1570	3620	
somewhat acceptable	175	397	
somewhat unacceptable	60	145	
unacceptable	365	1418	65.24

^aThe critical chi-square value is 7.815 at the .05 significance level with three degrees of freedom.

TABLE 5
CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR SPATIALLY
ISOLATED ENCLAVES AND THEIR POLITICAL REPRESENTATIVES

All questions	Spatially Isolated Enclaves	Political Representatives	Chi-Square Value ^a
acceptable	1570	118	
somewhat acceptable	175	15	
somewhat unacceptable	60	5	
unacceptable	365	32	0.69

^aThe critical chi-square value is 7.815 at the .05 significance level with three degrees of freedom.

TABLE 6

CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR SPATIALLY
CONTIGUOUS ENCLAVES AND THEIR POLITICAL REPRESENTATIVES

All questions	Spatially Contiguous Enclaves	Political Representatives	Chi-Square Value ^a
acceptable	3620	142	
somewhat acceptable	397	25	
somewhat unacceptable	145	8	
unacceptable	1418	55	5.47

^aThe critical chi-square value is 7.815 at the .05 significance level with three degrees of freedom.

TABLE 7

TABULATIONS OF CHI-SQUARE VALUES FOR THE REGISTERED
VOTERS OF THE HIGH STATUS, DORMITORY ENCLAVES

	Woodlawn Park	Lake Aluma	Village	Forest Park	Totals	Chi-Square Values ^a : Three Groups of Enclaves Compared
1. Oklahoma City Influence Within the Enclave						
A. Having the mayor of Oklahoma City speak						
acceptable	46	38	142	47	273	
unacceptable	4	2	8	8	22	4.68
B. Having an Oklahoma City family as new neighbors						
acceptable	50	40	150	55	295	
unacceptable	0	0	0	0	0	1.29

^aThe critical chi-square value is 5.991 at the .05 significance level with two degrees of freedom.

TABLE 7--Continued

	Woodlawn Park	Lake Aluma	Village	Forest Park	Totals	Chi-Square Values ^a : Three Groups of Enclaves Compared
C. Having Oklahoma City residents work in enclave						
acceptable	48	39	147	55	289	
unacceptable	2	1	3	0	6	0.71
2. Moving to Oklahoma City						
A. Moving for a better job						
acceptable	15	14	80	19	128	
unacceptable	35	26	70	36	167	0.86
B. Having children attend school in Oklahoma City						
acceptable	18	28	96	26	168	
unacceptable	32	12	54	29	127	57.91
3. Some Essential Services						
A. Having police protection from Oklahoma City						
acceptable	41	28	62	32	163	
unacceptable	9	12	88	23	132	41.80
B. Having fire protection from Oklahoma City						
acceptable	40	39	68	53	200	
unacceptable	10	1	82	2	95	65.77
C. Being dependent upon an Oklahoma City physician						
acceptable	47	40	130	52	269	
unacceptable	3	0	20	3	26	2.34
4. Willing to have Officials Cooperate						
A. Working with Oklahoma City planners						
acceptable	41	33	132	50	256	
unacceptable	9	7	18	5	39	0.31
B. Working with Oklahoma City political representatives						
acceptable	46	34	139	48	267	
unacceptable	4	6	11	7	28	4.39

^aThe critical chi-square value is 5.991 at the .05 significance level with two degrees of freedom.

TABLE 8
TABULATIONS OF CHI-SQUARE TOTALS FOR THE REGISTERED VOTERS
OF THE LOWER STATUS, DORMITORY ENCLAVES AND THE FUNCTIONALLY PROVINCIALIST ENCLAVES

	Warr Acres	Mustang	Valley Brook	Totals	Nichols Hills	Bethany	Totals
1. Oklahoma City Influence Within the Enclave							
A. Having the mayor of Oklahoma City speak							
acceptable	139	63	46	248	56	144	200
unacceptable	11	8	5	24	2	6	8
B. Having an Oklahoma City family as new neighbors							
acceptable	150	70	51	271	58	149	207
unacceptable	0	1	0	1	0	1	1
C. Having Oklahoma City residents work in enclave							
acceptable	146	69	49	264	58	146	204
unacceptable	4	2	2	8	0	4	4
2. Moving to Oklahoma City							
A. Moving for a better job							
acceptable	70	29	26	125	29	58	87
unacceptable	80	42	25	147	29	92	121
B. Having children attend school in Oklahoma City							
acceptable	24	13	35	72	38	35	73
unacceptable	126	58	16	200	20	115	135
3. Some Essential Services							
A. Having police protection from Oklahoma City							
acceptable	36	48	43	127	17	38	55
unacceptable	114	23	8	145	41	112	153

TABLE 8--Continued

	Warr Acres	Mustang	Valley Brook	Totals	Nichols Hills	Bethany	Totals
B. Having fire protection from Oklahoma City							
acceptable	57	61	49	167	21	47	68
unacceptable	93	10	2	105	37	103	140
C. Being dependent upon an Oklahoma City physician							
acceptable	135	65	50	250	58	125	183
unacceptable	15	6	1	22	0	25	25
4. Willing to Have Officials Cooperate							
A. Working with Oklahoma City planners							
acceptable	135	58	47	240	53	130	183
unacceptable	15	13	4	32	5	20	25
B. Working with Oklahoma City political representatives							
acceptable	134	58	45	237	57	136	193
unacceptable	16	13	6	35	1	14	15

TABLE 9

CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR THE THREE
SOCIO-ECONOMIC-POLITICAL GROUPS OF ENCLAVES

All questions	High Status, Dormitory	Lower Status, Dormitory	Functionally Provincialist	Chi-Square Value ^a
acceptable	2121	1766	1303	
somewhat acceptable	187	235	150	
somewhat unacceptable	80	85	40	
unacceptable	562	634	587	79.74

^aThe critical chi-square value is 12.591 at the .05 significance level with six degrees of freedom.

TABLE 10

CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR HIGH STATUS, DORMITORY
ENCLAVES AND THEIR POLITICAL REPRESENTATIVES

All questions	High Status, Dormitory Enclaves	Political Representatives	Chi-Square Value ^a
acceptable	2121	90	
somewhat acceptable	187	16	
somewhat unacceptable	80	3	
unacceptable	562	21	7.48

^aThe critical chi-square value is 7.815 at the .05 significance level with three degrees of freedom.

TABLE 11

CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR LOWER STATUS, DORMITORY
ENCLAVES AND THEIR POLITICAL REPRESENTATIVES

All questions	Lower Status, Dormitory Enclaves	Political Representatives	Chi-Square Value ^a
acceptable	1766	110	
somewhat acceptable	235	16	
somewhat unacceptable	85	8	
unacceptable	634	36	1.67

^a The critical chi-square value is 7.815 at the .05 significance level with three degrees of freedom.

TABLE 12

CHI-SQUARE VALUE OF AGGREGATE TOTALS FOR FUNCTIONALLY PROVINCIALIST
ENCLAVES AND THEIR POLITICAL REPRESENTATIVES

All questions	Functionally Provincialist	Political Representatives	Chi-Square Value ^a
acceptable	1303	60	
somewhat acceptable	150	8	
somewhat unacceptable	40	2	
unacceptable	587	30	0.30

^a The critical chi-square value is 7.815 at the .05 significance level with three degrees of freedom.

APPENDIX D

TABLE 13

LIST OF THE FORTY ELECTED REPRESENTATIVES INTERVIEWED

Enclave Name	Name of Representative	Position	Ward Number
1. Bethany ^a	J. Chambers	councilman	3
	R. Cory	councilman	2
	C. Dye	councilman	4
	E. Lyon	councilman	4
	P. Ridings	councilman	2
	J. Schnorr	councilman	1
	F. Vaughn	mayor	-
	B. Walker	councilman	3
2. Forest Park	A. Elliott	trustee	2
	C. Jones	trustee	3
	B. Holcomb	trustee	1
3. Lake Aluma	Mrs. J. Heitzman	trustee	2
	Mrs. Hensley	trustee	3
	J. Shepherd	trustee	1
4. Mustang	J. Bradford	councilman	3
	B. Burks	councilman	4
	D. Chamberlain	councilman	5
	A. Conn	councilman	2
	J. Hamilton	councilman-	1
		mayor	
5. Nichols Hills ^b	R. Berry	councilman	3
	D. Stuart	councilman-	2
		mayor	
6. Valley Brook	F. Burley	trustee	4
	D. Griffin	trustee	2
	O. Lynch	trustee	6
	W. Miller	trustee	5
	K. Roebuck	trustee	1
	R. White	trustee	3
7. Village ^c	R. Blakely	councilman	5
	E. Newton	councilman	4
	J. Noblitt	councilman -	2
		mayor	
	W. Schooley	councilman	1

TABLE 13--Continued

Enclave Name	Name of Representative	Position	Ward Number
8. Warr Acres ^d	R. Bryant	councilman	3
	H. Carson	councilman	2
	C. Drumiller	councilman	2
	D. Phillips	councilman	1
	T. Pike	councilman	3
	E. Zink	mayor	-
9. Woodlawn Park	Bailey	trustee	3
	Rae	trustee	2
	Seebeck	trustee	1

^a D. Coody, councilman for Ward one, was unavailable for an interview.

^b S. Upsher, councilman for Ward one, was unavailable for an interview.

^c H. Hewett, Ward three councilman, was unavailable for an interview.

^d Councilman J. W. Bell, representing Ward four, died while holding office. Mrs. J. Harris was appointed to his position but was not interviewed since she was not elected to the office. Councilman T. Aker, representing Ward four, was unavailable for an interview, as was D. Bennett, representing Ward one.

APPENDIX E

TABLE 14

POLITICAL ATTITUDE RESPONSES OF THE REGISTERED
VOTERS IN THE SPATIALLY ISOLATED ENCLAVES

	Mustang	Valley Brook	Forest Park	Lake Aluma	Response Totals
1. Voter Ability to Define Annexation					
a. Can define	54	38	48	35	175
b. Cannot define	17	13	7	5	42
2. Voter Definition of Annexation					
a. Taking adjoining area into a municipality	43	33	33	30	139
b. A political maneuver	4	0	0	0	4
c. One area voting to join another area	4	3	13	3	23
d. City taking adjacent land for growth and taxes	3	2	2	2	9
3. Voter Reaction to Possible Annexation to Oklahoma City					
a. Favor	8	22	8	1	39
b. Oppose	63	25	43	35	166
c. Neutral	0	4	4	4	12
4. Reasons for Voter Opposition to Annexation					
a. To escape the big city which offers no real benefits	11	1	3	1	16
b. To avoid zoning regulations and special permits	0	0	2	1	3
c. Oklahoma City has too large an area	6	0	4	2	12
d. To have lower taxes in the small town	8	8	13	8	37
e. To have better utility services in the small town	0	1	5	1	7
f. To have greater independence, voice, and identity	15	3	4	12	34
g. Prefer the status quo (like it the way it is)	11	10	7	9	37
h. To receive lower taxes and better services (schools, police and fire pro- tection) in the small town	12	2	5	1	20

TABLE 14--Continued

	Mustang	Valley Brook	Forest Park	Lake Aluma	Response Totals
5. Reasons for Voter Approval of Annexation					
a. To have lower taxes and better services	5	11	6	0	22
b. Prefer the status quo (like it the way it is)	2	0	0	0	2
c. To receive better fire, and police protection, lower insurance rates, and better government services	1	4	1	0	6
d. Already feel a part of Oklahoma City	0	7	1	1	9
6. Community Identification Factors					
a. None	5	18	16	14	53
b. Church and school	20	11	2	0	33
c. Church	6	5	0	0	11
d. School	14	10	22	0	46
e. Church, school, and civic group(s)	20	1	9	0	30
f. School, fire and police departments	1	0	0	0	1
g. Civic group (s), sports area, library, and park	4	6	3	3	16
h. Community distinctiveness (physical setting and neighbors)	1	0	3	23	27
7. Community Reference Terms					
a. Part of Oklahoma City	0	0	0	0	0
b. City	12	0	0	1	13
c. Town	34	16	17	27	94
d. Village or community	9	13	3	10	35
e. Suburb	16	22	35	2	75

TABLE 15

POLITICAL-FUNCTIONAL ORIENTATION RESPONSES OF THE REGISTERED VOTERS
IN THE SPATIALLY ISOLATED ENCLAVES

	Mustang	Valley Brook	Forest Park	Lake Aluma	Response Totals
1. Newspaper Reading Habits					
a. Reads a newspaper	63	44	53	38	198
b. Does not read a newspaper	8	7	2	2	19
2. Newspapers Read					
a. Local paper only	3	0	0	0	3
b. One Oklahoma City paper and a local paper	22	0	0	0	22
c. <u>Oklahoma City Times</u>	3	6	2	3	14
d. <u>Daily Oklahoman</u>	13	23	16	9	61
e. <u>Oklahoma City Journal</u>	4	7	4	0	15
f. <u>Daily Oklahoman and Oklahoma City Times</u>	1	5	17	16	39
g. <u>Daily Oklahoman and Oklahoma City Journal</u>	3	1	3	3	10
h. <u>Oklahoma City Times and Oklahoma City Journal</u>	0	0	0	3	3
i. All three Oklahoma City newspapers	2	2	11	4	19
j. A local paper and two or more Oklahoma City papers	12	0	0	0	12
3. Banking Locations					
a. Local enclave or another enclave	43	0	1	0	44
b. Oklahoma City	16	43	48	37	144
c. Outside the Oklahoma City municipal area	12	8	6	3	29
4. Food Shopping Locations					
a. Local enclave or another enclave	31	7	1	4	43
b. Oklahoma City	35	37	45	34	151
c. Outside the Oklahoma City municipal area	5	7	9	2	23
5. Shopping Locations For Clothing					
a. Local enclave or another enclave	1	0	0	0	1
b. Oklahoma City	64	46	51	39	200
c. Outside the Oklahoma City municipal area	6	5	4	1	16

TABLE 15--Continued

	Mustang	Valley Brook	Forest Park	Lake Aluma	Response Totals
6. Shopping Locations For Furniture and/or Appliances					
a. Local enclave or another enclave	2	0	0	2	4
b. Oklahoma City	67	49	52	36	204
c. Outside the Oklahoma City municipal area	2	2	3	2	9

TABLE 16
POLITICAL ATTITUDE RESPONSES OF THE REGISTERED VOTERS IN
THE SPATIALLY CONTIGUOUS ENCLAVES

	Bethany	Woodlawn Park	Warr Acres	Nichols Hills	Village	Response Totals
1. Voter Ability to Define Annexation						
a. Can define	118	44	139	55	125	481
b. Cannot define	32	6	11	3	25	77
2. Voter Definition of Annexation						
a. Taking adjoining area into a municipality	85	37	121	49	100	392
b. A political maneuver	1	0	3	0	0	4
c. One area voting to join another area	10	2	7	3	9	31
d. City taking adjacent land for growth and taxes	22	5	8	3	16	54
3. Voter Reaction to Possible Annexation to Oklahoma City						
a. Favor	17	7	27	1	18	70
b. Oppose	119	43	107	56	113	438
c. Neutral	14	0	16	1	19	50
4. Reasons for Voter Opposition to Annexation						
a. To escape the big city which offers no real benefits	5	8	7	3	3	26
b. To avoid zoning regulations and special permits	2	1	2	0	1	6
c. Oklahoma City has too large an area	10	2	12	1	8	33
d. To have lower taxes in the small town	22	14	20	13	37	106
e. To have better utility services in the small town	5	0	7	9	9	30
f. To have greater independence, voice, and identity	27	9	21	7	15	79
g. Prefer the status quo (like it the way it is)	31	9	16	11	22	89
h. To receive lower taxes and better services (schools, police and fire protection) in the small town	17	0	22	12	18	69

TABLE 16--Continued

	Bethany	Woodlawn Park	Warr Acres	Nichols Hills	Village	Response Totals
5. Reasons For Voter Approval of Annexation						
a. To have lower taxes and better services	7	6	17	0	8	38
b. Prefer the status quo (like it the way it is)	0	1	2	0	1	4
c. To receive better fire, and police protection, lower insurance rates, and better government services	2	0	2	0	0	4
d. Already a part of Oklahoma City	8	0	6	1	9	24
6. Community Identification Factors						
a. None	25	28	44	24	32	153
b. Church and School	36	0	20	8	26	90
c. Church	12	3	10	2	14	41
d. School	40	0	42	3	8	93
e. Church, school, and civic group(s)	22	1	22	4	46	95
f. School, fire and police departments	4	0	3	7	5	19
g. Civic group(s), sports area, library, and park	11	0	5	1	19	36
h. Community distinctiveness (physical setting and neighbors)	0	18	4	9	0	31
7. Community Reference Terms						
a. Part of Oklahoma City	0	0	1	0	1	2
b. City	33	5	28	10	20	96
c. Town	44	17	19	18	17	115
d. Village or community	3	21	12	9	12	56
e. Suburb	70	7	90	21	101	289

TABLE 17

POLITICAL-FUNCTIONAL ORIENTATION RESPONSES OF THE REGISTERED
VOTERS IN THE SPATIALLY CONTIGUOUS ENCLAVES

	Bethany	Woodlawn Park	Warr Acres	Nichols Hills	Village	Response Totals
1. Newspaper Reading Habits						
a. Reads a newspaper	131	49	135	57	141	513
b. Does not read a newspaper	19	1	15	1	9	45
2. Newspapers Read						
a. Local paper only	1	0	0	0	0	1
b. One Oklahoma City paper and a local paper	17	9	9	0	8	43
c. <u>Oklahoma City Times</u>	14	4	17	3	14	52
d. <u>Daily Oklahoman</u>	33	16	46	10	43	148
e. <u>Oklahoma City Journal</u>	5	0	7	0	2	14
f. <u>Daily Oklahoman and</u> <u>Oklahoma City Times</u>	29	7	15	32	35	118
g. <u>Daily Oklahoman and</u> <u>Oklahoma City Journal</u>	10	2	8	2	9	31
h. <u>Oklahoma City Times and</u> <u>Oklahoma City Journal</u>	10	0	14	2	11	37
i. All three Oklahoma City newspapers	6	4	6	8	12	36
j. A local paper and two or more Oklahoma City papers	6	7	13	0	7	33
3. Banking Locations						
a. Local enclave or another enclave	65	20	58	1	58	202
b. Oklahoma City	73	23	81	55	87	319
c. Outside the Oklahoma City municipal area	12	7	11	2	5	37
4. Food Shopping Locations						
a. Local enclave or another enclave	110	45	127	19	120	421
b. Oklahoma City	40	4	23	39	30	136
c. Outside the Oklahoma City municipal area	0	1	0	0	0	1
5. Shopping Locations For Clothing						
a. Local enclave or another enclave	29	34	18	2	33	116
b. Oklahoma City	120	16	131	55	115	437
c. Outside the Oklahoma City municipal area	1	0	1	1	2	5

TABLE 17--Continued

	Bethany	Woodlawn Park	Warr Acres	Nichols Hills	Village	Response Totals
6. Shopping Locations For Furniture and/or Appliances						
a. Local enclave or another enclave	18	14	21	0	8	61
b. Oklahoma City	130	36	127	58	142	493
c. Outside the Oklahoma City municipal area	2	0	2	0	0	4

TABLE 18

CHI-SQUARE VALUES OF AGGREGATE TOTALS OF POLITICAL ATTITUDE RESPONSES OF
THE REGISTERED VOTERS IN THE TWO SPATIAL ENCLAVE GROUPS

	Isolated Response Totals	Contiguous Response Totals	Chi-Square Values	Significance Values ^a
1. Voter Ability to Define Annexation				
a. Can define	175	481	3.71	3.84
b. Cannot define	42	77		df ^b = 1
2. Voter Definition of Annexation				
a. Taking adjoining area into municipality	139	392	14.23	7.81
b. A political maneuver	4	4		df = 3
c. One area voting to join another area	23	31		
d. City taking adjacent land for growth and taxes	9	54		
3. Voter Reaction to Possible Annexation to Oklahoma City				
a. Favor	39	70	5.65	5.99
b. Oppose	166	438		df = 2
c. Neutral	12	50		
4. Reasons for Voter Opposition to Annexation				
a. To escape the big city which offers no real benefits	16	26	4.66	14.07
b. To avoid zoning regulations and special permits	3	6		df = 7

^aThe significance values are at the .05 level.

^bdf is the number of degrees of freedom. This number is equal to the number of quantities which are unknown minus the number of independent equations linking these unknowns. For a more complete description see Hubert M. Blalock, Jr., Social Statistics, New York: McGraw-Hill Book Co., Inc. (1960), pp. 156-157.

TABLE 18--Continued

	Isolated Response Totals	Contiguous Response Totals	Chi-Square Values	Significance Values ^a
4. Reasons for Voter Opposition to Annexation				
c. Oklahoma City has too large an area	12	33		
d. To have lower taxes in the small town	37	106		
e. To have better utility services in the small town	7	30		
f. To have greater independence, voice, and identity	34	79		
g. Prefer the status quo (like it the way it is)	37	89		
h. To receive lower taxes and better services (schools, police and fire pro- tection) in the small town	20	69		
5. Reasons For Voter Approval of Annexation				
a. To have lower taxes and better services	22	38	3.63	7.81
b. Prefer the status quo (like it the way it is)	2	4		df ^b = 3
c. To receive better fire, and police protection, lower insurance rates, and better government services	6	4		
d. Already feel a part of Oklahoma City	9	24		
6. Community Identification Factors				
a. None	53	153	19.95	14.07
b. Church and school	33	90		df = 7

^aThe significance values are at the .05 level.

^bdf is the number of degrees of freedom.

TABLE 18--Continued

	Isolated Response Totals	Contiguous Response Totals	Chi-Square Values	Significance Values ^a
6. Community Identification Factors				
c. Church	11	41		
d. School	46	93		
e. Church, school, and civic group(s)	30	95		
f. School, fire and police departments	1	19		
g. Civic group(s), sports area, library, and park	16	36		
h. Community distinctiveness (physical setting and neighbors	27	31		
7. Community Reference Terms				
a. Part of Oklahoma City	0	2	59.45	9.49
b. City	13	96		df ^b = 4
c. Town	94	115		
d. Village or community	35	56		
e. Suburb	75	289		

^aThe significance values are at the .05 level.

^bdf is the number of degrees of freedom.

TABLE 19

CHI-SQUARE VALUES OF AGGREGATE TOTALS OF POLITICAL-FUNCTIONAL
ORIENTATION RESPONSES OF THE REGISTERED VOTERS IN THE
TWO SPATIAL ENCLAVE GROUPS

	Isolated Response Totals	Contiguous Response Totals	Chi-Square Values	Significance Values ^a
1. Newspaper Reading Habits				
a. Reads a newspaper	198	513	0.10	3.84 df ^b = 1
b. Does not read a newspaper	19	45		
2. Newspapers Read				
a. Local paper only	3	1	25.90	16.92 df= 9
b. One Oklahoma City paper and a local paper	22	43		
c. Oklahoma City Times	14	52		
d. Daily Oklahoman	61	148		
e. Oklahoma City Journal	15	14		
f. Daily Oklahoman and Oklahoma City Times	39	118		
g. Daily Oklahoman and Oklahoma City Journal	10	31		
h. Oklahoma City Times and Oklahoma City Journal	3	37		
i. All three Oklahoma City newspapers	19	36		
j. A local paper and two or more Oklahoma City papers	12	33		
3. Banking Locations				
a. Local enclave or another enclave	44	202	23.01	5.99 df = 2
b. Oklahoma City	144	319		
c. Outside the Oklahoma City municipal area	29	37		

^aThe significance values are at the .05 level.

^bdf is the number of degrees of freedom.

TABLE 19--Continued

	Isolated Response Totals	Contiguous Response Total	Chi-Square Values	Significance Values ^a
4. Food Shopping Locations				
a. Local enclave or another enclave	43	421	221.79	5.99
b. Oklahoma City	151	136		df ^b = 2
c. Outside the Oklahoma City municipal area	23	1	.	
5. Shopping Locations For Clothing				
a. Local enclave or another enclave	1	116	70.60	5.99
b. Oklahoma City	200	437		df = 2
c. Outside the Oklahoma City municipal area	16	5		
6. Shopping Locations For Furniture and/or Appliances				
a. Local enclave or another enclave	4	61	26.91	5.99
b. Oklahoma City	204	493		df = 2
c. Outside the Oklahoma City municipal area	9	4		

^aThe significance values are at the .05 level.

^bdf is the number of degrees of freedom.

TABLE 20

POLITICAL ATTITUDE RESPONSES OF THE REGISTERED
VOTERS IN THE HIGH STATUS, DORMITORY ENCLAVES

	Woodlawn Park	Lake Aluma	Village	Forest Park	Response Totals
1. Voter Ability to Define Annexation					
a. Can define	44	35	125	48	252
b. Cannot define	6	5	25	7	43
2. Voter Definition of Annexation					
a. Taking adjoining area into a municipality	37	30	100	33	200
b. A political maneuver	0	0	0	0	0
c. One area voting to join another area	2	3	9	13	27
d. City taking adjacent land for growth and taxes	5	2	16	2	25
3. Voter Reaction to Possible Annexation to Oklahoma City					
a. Favor	7	1	18	8	34
b. Oppose	43	35	113	43	234
c. Neutral	0	4	19	4	27
4. Reasons for Voter Opposition to Annexation					
a. To escape the big city which offers no real benefits	8	1	3	3	15
b. To avoid zoning regulations and special permits	1	1	1	2	5
c. Oklahoma City has too large an area	2	2	8	4	16
d. To have lower taxes in the small town	14	8	37	13	72

TABLE 20--Continued

	Woodlawn Park	Lake Aluma	Village	Forest Park	Response Totals
4. Reasons for Voter Opposition to Annexation					
e. To have better utility services in the small town	0	1	9	5	15
f. To have greater independence, voice, and identity	9	12	15	4	40
g. Prefer the status quo (like it the way it is)	9	9	22	7	47
h. To receive lower taxes and better services (schools, police and fire protection) in the small town	0	1	18	5	24
5. Reasons for Voter Approval of Annexation					
a. To have lower taxes and better services	6	0	8	6	20
b. Prefer the status quo (like it the way it is)	1	0	1	0	2
c. To receive better fire, and police protection, lower insurance rates, and better government services	0	0	0	1	1
d. Already feel a part of Oklahoma City	0	1	9	1	11
6. Community Identification Factors					
a. None	28	14	32	16	90
b. Church and school	0	0	26	2	28
c. Church	3	0	14	0	17
d. School	0	0	8	22	30
e. Church, school, and civic group(s)	1	0	46	9	56
f. School, fire and police departments	0	0	5	0	5
g. Civic group(s), sports area, library, and park	0	3	19	3	25
h. Community distinctiveness (physical setting and neighbors)	18	23	0	3	44

TABLE 20--Continued

	Woodlawn Park	Lake Aluma	Village	Forest Park	Response Totals
7. Community Reference Terms					
a. Part of Oklahoma City	0	0	1	0	1
b. City	5	1	20	0	26
c. Town	17	27	17	17	78
d. Village and community	21	10	11	3	45
e. Suburb	7	2	101	35	145

TABLE 21

POLITICAL-FUNCTIONAL ORIENTATION RESPONSES OF THE REGISTERED VOTERS
IN THE HIGH STATUS, DORMITORY ENCLAVES

	Woodlawn Park	Lake Aluma	Village	Forest Park	Response Totals
1. Newspaper Reading Habits					
a. Reads a newspaper	49	38	141	53	281
b. Does not read a newspaper	1	2	9	2	14
2. Newspapers Read					
a. Local paper only	0	0	0	0	0
b. One Oklahoma City paper and a local paper	9	0	8	0	17
c. <u>Oklahoma City Times</u>	4	3	14	2	23
d. <u>Daily Oklahoman</u>	16	9	43	16	84
e. <u>Oklahoma City Journal</u>	0	0	2	4	6
f. <u>Daily Oklahoman and</u> <u>Oklahoma City Times</u>	7	16	35	17	75
g. <u>Daily Oklahoman and</u> <u>Oklahoma City Journal</u>	2	3	9	3	17
h. <u>Oklahoma City Times and</u> <u>Oklahoma City Journal</u>	0	3	11	0	14
i. All three Oklahoma City newspapers	4	4	12	11	31
j. A local paper and two or more Oklahoma City papers	7	0	7	0	14
3. Banking Locations					
a. Local enclave or another enclave	20	0	58	1	79
b. Oklahoma City	23	37	87	48	195
c. Outside the Oklahoma City municipal area	7	3	5	6	21
4. Food Shopping Locations					
a. Local enclave or another enclave	45	4	120	1	170
b. Oklahoma City	4	34	30	45	113
c. Outside the Oklahoma City municipal area	1	2	0	9	12
5. Shopping Locations For Clothing					
a. Local enclave or another enclave	34	0	33	0	67
b. Oklahoma City	16	39	115	51	221
c. Outside the Oklahoma City municipal area	0	1	2	4	7

TABLE 21--Continued

	Woodlawn Park	Lake Aluma	Village	Forest Park	Response Totals
6. Shopping Locations For Furniture and/or Appliances					
a. Local enclave or another enclave	14	2	8	0	24
b. Oklahoma City	36	36	142	52	266
c. Outside the Oklahoma City municipal area	0	2	0	3	5

TABLE 22

POLITICAL ATTITUDE RESPONSES OF THE REGISTERED VOTERS
IN THE LOWER STATUS, DORMITORY ENCLAVES

	Warr Acres	Mustang	Valley Brook	Response Totals
1. Voter Ability to Define Annexation				
a. Can define	139	54	38	231
b. Cannot define	11	17	13	41
2. Voter Definition of Annexation				
a. Taking adjoining area into a municipality	121	43	33	197
b. A political maneuver	3	4	0	7
c. One area voting to join another area	7	4	3	14
d. City taking adjacent land for growth and taxes	8	3	2	13
3. Voter Reaction to Possible Annexation to Oklahoma City				
a. Favor	27	8	22	57
b. Oppose	107	63	25	195
c. Neutral	16	0	4	20
4. Reasons for Voter Opposition to Annexation				
a. To escape the big city which offers no real benefits	7	11	1	19
b. To avoid zoning regulations and special permits	2	0	0	2
c. Oklahoma City has too large an area	12	6	0	18
d. To have lower taxes in the small town	20	8	8	36
e. To have better utility services in the small town	7	0	1	8
f. To have greater independence, voice, and identity	21	15	3	39
g. Prefer the status quo (like it the way it is)	16	11	10	37
h. To receive lower taxes and better services (schools, police and fire pro- tection) in the small town	22	12	2	36

TABLE 22--Continued

	Warr Acres	Mustang	Valley Brook	Response Totals
5. Reasons for Voter Approval of Annexation				
a. To have lower taxes and better services	17	5	11	33
b. Prefer the status quo (like it the way it is)	2	2	0	4
c. To receive better fire, and police protection, lower insurance rates, and better government services	2	1	4	7
d. Already feel a part of Oklahoma City	6	0	7	13
6. Community Identification Factors				
a. None	44	5	18	67
b. Church and school	20	20	11	51
c. Church	10	6	5	21
d. School	42	14	10	66
e. Church, school, and civic group(s)	22	20	1	43
f. School, fire and police departments	3	1	0	4
g. Civic group (s), sports area, library, and park	5	4	6	15
h. Community distinctiveness (physical setting and neighbors)	4	1	0	5
7. Community Reference Terms				
a. Part of Oklahoma City	1	0	0	1
b. City	28	12	0	40
c. Town	19	34	16	69
d. Village or community	12	9	13	34
e. Suburb	90	16	22	128

TABLE 23

POLITICAL-FUNCTIONAL ORIENTATION RESPONSES OF THE REGISTERED VOTERS
IN THE LOWER STATUS, DORMITORY ENCLAVES

	Warr Acres	Mustang	Valley Brook	Response Totals
1. Newspaper Reading Habits				
a. Reads a newspaper	135	63	44	242
b. Does not read a newspaper	15	8	7	30
2. Newspapers Read				
a. Local paper only	0	3	0	3
b. One Oklahoma City paper and a local paper	9	22	0	31
c. <u>Oklahoma City Times</u>	17	3	6	26
d. <u>Daily Oklahoman</u>	46	13	23	82
e. <u>Oklahoma City Journal</u>	7	4	7	18
f. <u>Daily Oklahoman and</u> <u>Oklahoma City Times</u>	15	1	5	21
g. <u>Daily Oklahoman and</u> <u>Oklahoma City Journal</u>	8	3	1	12
h. <u>Oklahoma City Times and</u> <u>Oklahoma City Journal</u>	14	0	0	14
i. All three Oklahoma City newspapers	6	2	2	10
j. A local paper and two or more Oklahoma City papers	13	12	0	25
3. Banking Locations				
a. Local enclave or another enclave	58	43	0	101
b. Oklahoma City	81	16	43	140
c. Outside the Oklahoma City municipal area	11	12	8	31
4. Food Shopping Locations				
a. Local enclave or another enclave	127	31	7	165
b. Oklahoma City	23	35	37	95
c. Outside the Oklahoma City municipal area	0	5	7	12
5. Shopping Locations For Clothing				
a. Local enclave or another enclave	18	1	0	19
b. Oklahoma City	131	64	46	241
c. Outside the Oklahoma City municipal area	1	6	5	12

TABLE 23--Continued

	Warr Acres	Mustang	Valley Brook	Response Totals
6. Shopping Locations For Furniture and/or Appliances				
a. Local enclave or another enclave	21	2	0	23
b. Oklahoma City	127	67	49	243
c. Outside the Oklahoma City municipal area	2	2	2	6

TABLE 24

POLITICAL ATTITUDE RESPONSES OF THE REGISTERED VOTERS
IN THE FUNCTIONALLY PROVINCIALIST ENCLAVES

	Nichols Hills	Bethany	Response Totals
1. Voter Ability to Define Annexation			
a. Can define	55	118	173
b. Cannot define	3	32	35
2. Voter Definition of Annexation			
a. Taking adjoining area into a municipality	49	85	134
b. A political maneuver	0	1	1
c. One area voting to join another area	3	10	13
d. City taking adjacent land for growth and taxes	3	22	25
3. Voter Reaction to Possible Annexation to Oklahoma City			
a. Favor	1	17	18
b. Oppose	56	119	175
c. Neutral	1	14	15
4. Reasons for Voter Opposition to Annexation			
a. To escape the big city which offers no real benefits	3	5	8
b. To avoid zoning regulations and special permits	0	2	2
c. Oklahoma City has too large an area	1	10	11
d. To have lower taxes in the small town	13	22	35
e. To have better utility services in the small town	9	5	14
f. To have greater independence, voice, and identity	7	27	34
g. Prefer the status quo (like it the way it is)	11	31	42
h. To receive lower taxes and better services (schools, police and fire pro- tection) in the small town	12	17	29

TABLE 24--Continued

	Nichols Hills	Bethany	Response Totals
5. Reasons for Voter Approval of Annexation			
a. To have lower taxes and better services	0	7	7
b. Prefer the status quo (like it the way it is)	0	0	0
c. To receive better fire, and police protection, lower insurance rates, and better government services	0	2	2
d. Already feel a part of Oklahoma City	1	8	9
6. Community Identification Factors			
a. None	24	25	49
b. Church and school	8	36	44
c. Church	2	12	14
d. School	3	40	43
e. Church, school, and civic group(s)	4	22	26
f. School, fire and police departments	7	4	11
g. Civic group(s), sports area, library, and park	1	11	12
h. Community distinctiveness (physical setting and neighbors)	9	0	9
7. Community Reference Terms			
a. Part of Oklahoma City	0	0	0
b. City	10	33	43
c. Town	18	44	62
d. Village and community	9	3	12
e. Suburb	21	70	91

TABLE 25

POLITICAL-FUNCTIONAL ORIENTATION RESPONSES OF THE REGISTERED VOTERS
IN THE FUNCTIONALLY PROVINCIALIST ENCLAVES

	Nichols Hills	Bethany	Response Totals
1. Newspaper Reading Habits			
a. Reads a newspaper	57	131	188
b. Does not read a newspaper	1	19	20
2. Newspapers Read			
a. Local paper only	0	1	1
b. One Oklahoma City paper and a local paper	0	17	17
c. <u>Oklahoma City Times</u>	3	14	17
d. <u>Daily Oklahoman</u>	10	33	43
e. <u>Oklahoma City Journal</u>	0	5	5
f. <u>Daily Oklahoman and Oklahoma City Times</u>	32	29	61
g. <u>Daily Oklahoman and Oklahoma City Journal</u>	2	10	12
h. <u>Oklahoma City Times and Oklahoma City Journal</u>	2	10	12
i. All three Oklahoma City newspapers	8	6	14
j. A local paper and two or more Oklahoma City papers	0	6	6
3. Banking Locations			
a. Local enclave or another enclave	1	65	66
b. Oklahoma City	55	73	128
c. Outside the Oklahoma City municipal area	2	12	14
4. Food Shopping Locations			
a. Local enclave or another enclave	19	110	129
b. Oklahoma City	39	40	79
c. Outside the Oklahoma City municipal area	0	0	0
5. Shopping Locations For Clothing			
a. Local enclave or another enclave	2	29	31
b. Oklahoma City	55	120	175
c. Outside the Oklahoma City municipal area	1	1	2

TABLE 25--Continued

	Nichols Hills	Bethany	Response Totals
6. Shopping Locations For Furniture and/or Appliances			
a. Local enclave or another enclave	0	18	18
b. Oklahoma City	58	130	188
c. Outside the Oklahoma City municipal area	0	2	2

TABLE 26

CHI-SQUARE VALUES OF AGGREGATE TOTALS OF POLITICAL ATTITUDE RESPONSES OF THE REGISTERED VOTERS IN THE THREE SOCIO-ECONOMIC-POLITICAL ENCLAVE GROUPS

	High Status, Dormitory Response Totals	Lower Status Dormitory Response Totals	Functionally Provincialist Response Totals	Chi- Square Values	Significance Values ^a
1. Voter Ability to Define Annexation					
a. Can define	252	231	173	0.50	5.99
b. Cannot define	43	41	35		df=2
2. Voter Definition of Annexation					
a. Taking adjoining area into a municipality	200	197	134	22.12	12.59
b. A political maneuver	0	7	1		df=6
c. One area voting to join another area	27	14	13		
d. City taking adjacent land for growth and taxes	25	13	25		
3. Voter Reaction to Possible Annexation to Oklahoma City					
a. Favor	34	57	18	18.12	9.49
b. Oppose	234	195	175		df=4
c. Neutral	27	20	15		
4. Reasons for Voter Opposition to Annexation					
a. To escape the big city which offers no real benefits	15	19	8	23.80	23.69
b. To avoid zoning regulations and special permits	5	2	2		
c. Oklahoma City has too large an area	16	18	11		
d. To have lower taxes in the small town	72	36	35		
e. To have better utility services in the small town	15	8	14		
f. To have greater independence, voice, and identity	40	39	34		
g. Prefer the status quo (like it the way it is)	47	37	42		

^a The significance values are at the .05 level.

^b df is the number of degrees of freedom.

TABLE 26--Continued

	High Status, Dormitory Response Totals	Lower Status Dormitory Response Totals	Functionally Provincialist Response Totals	Chi- Square Values	Significance Values ^a
h. To receive lower taxes and better services (schools, police and fire protection) in the small town	24	36	29		
5. Reasons for Voter Approval of Annexation					
a. To have lower taxes and better services	20	33	7	7.79	12.59
b. Prefer the status quo (like it the way it is)	2	4	0		df ^b =6
c. To receive better fire, and police protection, lower insurance rates, and better government services	1	7	2		
d. Already feel a part of Oklahoma City	11	13	9		
6. Community Identification Factors					
a. None	90	67	49	82.79	23.69
b. Church and school	28	51	44		df=14
c. Church	17	21	14		
d. School	30	66	43		
e. Church, school, and civic group(s)	56	43	26		
f. School, fire and police departments	5	4	11		
g. Civic group(s), sports area, library, and park	25	15	12		
h. Community distinctiveness (physical setting and neighbors)	44	5	9		
7. Community Reference Terms					
a. Part of Oklahoma City	1	1	0	24.28	15.51
b. City	26	40	43		df=8
c. Town	78	69	62		
d. Village or community	45	34	12		
e. Suburb	145	128	91		

^a The significance values are at the .05 level.

^b df is the number of degrees of freedom.

TABLE 27

CHI-SQUARE VALUES OF AGGREGATE TOTALS OF POLITICAL-FUNCTIONAL ORIENTATION RESPONSES
OF THE REGISTERED VOTERS IN THE THREE SOCIO-ECONOMIC-POLITICAL ENCLAVE GROUPS

	High Status, Dormitory Response Totals	Lower Status, Dormitory Response Totals	Functionally Provincialist Response Totals	Chi- Square Values	Significance Values ^a
1. Newspaper Reading Habits					
a. Reads a newspaper	281	242	188	8.07	5.99
b. Does not read a newspaper	14	30	20		df ^b =2
2. Newspapers Read					
a. Local paper only	0	3	1	75.89	28.87
b. One Oklahoma City paper and a local paper	17	31	17		df=18
c. Oklahoma City Times	23	26	17		
d. Daily Oklahoman	84	82	43		
e. Oklahoma City Journal	6	18	5		
f. Daily Oklahoman and Oklahoma City Times	75	21	61		
g. Daily Oklahoman and Oklahoma City Journal	17	12	12		
h. Oklahoma City Times and Oklahoma City Journal	14	14	12		
i. All three Oklahoma City newspapers	31	10	14		
j. A local paper and two or more Oklahoma City papers	14	25	6		
3. Banking locations					
a. Local enclave or another enclave	79	101	66	14.11	9.49
b. Oklahoma City	195	140	128		df=4
c. Outside the Oklahoma City municipal area	21	31	14		
4. Food Shopping Locations					
a. Local enclave or another enclave	170	165	129	9.80	9.49
b. Oklahoma City	113	95	79		df=4
c. Outside the Oklahoma City municipal area	12	12	0		

^a The significance values are at the .05 level.

^b df is the number of degrees of freedom.

TABLE 27--Continued

	High Status, Dormitory Response Totals	Lower Status, Dormitory Response Totals	Functionally Provincialist Response Totals	Chi- Square Values	Significance Values ^a
5. Shopping Locations For Clothing					
a. Local enclave or another enclave	67	19	31	31.92	9.49 df=4
b. Oklahoma City	221	241	175		
c. Outside the Oklahoma City municipal area	7	12	2		
6. Shopping Locations For Furniture and/or Appliances					
a. Local enclave or another enclave	24	23	18	1.15	9.49 df ^b =4
b. Oklahoma City	266	243	188		
c. Outside the Oklahoma City municipal area	5	6	2		

^a The significance values are at the .05 level.

^b df is the number of degrees of freedom.

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