



A PUBLIC TRANSPORTATION SERVICE PLAN FOR WASHINGTON COUNTY

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COMMUNITY ASSISTANCE PLANNING REPORT
NUMBER 61

A Public Transportation Service Plan
for Washington County

Prepared by the

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October 1981

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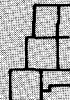
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October 31, 1981

TO: The Honorable Chairman and Members of the Washington County Board of Supervisors

Ladies and Gentlemen:

On December 16, 1980, the Washington County Committee on Aging, as authorized by the Washington County Board of Supervisors, requested the Southeastern Wisconsin Regional Planning Commission to undertake a special study to determine the feasibility of providing general public transit service in Washington County. Of concern to the Committee was the possibility of reducing the need for specialized public transportation services by providing a general public transportation service not aimed at any specific subgroup of the general population, and also the possibility of better coordinating existing specialized transportation services currently being provided within the County. To advise and assist the Commission staff in the conduct of the requested study, an Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County was created. The Washington County Committee on Aging and social service agencies and state and local units of government providing public transportation services or financial support for such services within the County were represented on the Committee.

The Commission staff working with the Committee has now completed, and is pleased to transmit herewith on behalf of the Committee, this report setting forth a plan for the provision of countywide public transit services in Washington County. The plan is based upon an inventory and evaluation of the existing transit services and specialized transportation coordination efforts within the County, an analysis of the present and probable future needs for transit service, and an examination of the costs attendant to a number of alternative means of meeting those needs.

The analysis of public transit options for Washington County indicated that to fully serve the travel demands of the resident county population, a substantial commitment of local financial resources would be required for the initiation of new public transportation services. Rather than recommending the initiation of such new services, the plan selected by the Committee recommends the improvement and coordination of existing public transportation services within the County.

The findings and recommendations contained in this report were carefully reviewed and unanimously approved by the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County. Adoption and implementation of the recommended plan would, in the Committee's opinion, provide the residents of Washington County with an adequate level of basic public transportation service. In so doing, it would also serve to concentrate limited financial resources on corresponding areas of need, thereby assuring a more effective use of public monies in providing public transportation service within the County.

The report and plan are hereby respectfully submitted on behalf of the Committee for consideration and action by your body.

Respectfully,

Kurt W. Bauer
Executive Director

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Chapter I

INTRODUCTION

On December 16, 1980, the Washington County Committee on Aging, as authorized by the Washington County Board of Supervisors, formally requested the Regional Planning Commission to undertake a plan to determine the feasibility of providing general public transportation service in Washington County. The basis for this request was the set of conclusions drawn from discussions held in July and August 1980 between representatives of the Wisconsin Department of Transportation, the Regional Planning Commission, and the Washington County Committee on Aging concerning the need to consider the establishment of a public transit system to serve the residents of Washington County. The discussions were precipitated by the following events:

1. The publication of a joint memorandum by the Wisconsin Departments of Transportation and Health and Social Services recommending that each county in Wisconsin act to coordinate the special transportation services now being provided under various programs primarily to special subgroups of the population, such as the elderly or the handicapped.
2. The creation by the U. S. Congress, with the passage of the Surface Transportation Act of 1978, of a new federal aid program to provide for operating and capital assistance projects for public transportation programs in rural and small urban areas. Heretofore, federal transit grant programs have been limited to the provision of assistance to transit services in the large urban areas of the nation. The new federal grant program, authorized under Section 18 of the Urban Mass Transportation Act of 1964, as amended, is administered by the Federal Highway Administration.¹

During the discussions, members of the Committee on Aging expressed interest in exploring the possibility of establishing a general public transportation program in Washington County. In addition, the possibility of reducing the need for specialized transportation services by providing a general public transportation service not aimed at any specific subgroup of the county population was raised. There was also general agreement that it would be well to conduct a study that would seek to plan ways to better coordinate those specialized transportation services now being provided within the County and between the County and adjacent counties. Accordingly, this planning report sets forth the findings and recommendations of the requested plan, which determined the feasibility of establishing general public transit service in Washington County and the means of better coordinating the specialized transportation services now being provided in the County.

NEED FOR AND PURPOSE OF A TRANSIT SERVICE PLAN

The provision of public transportation service has generally been recognized as an essential element for the continued growth and vitality of any truly urban area. The provision of an adequate level of public transportation has consequently been an

¹Legislation now under consideration by the U. S. Congress would alter the current Section 18 transit assistance program by eliminating federal subsidies for operating costs. Federal grants for capital purposes, e.g., buses, shelters, garage, and maintenance facilities, would remain available.

important consideration in the Commission's planning efforts for the urbanized areas of the Southeastern Wisconsin Region. The continued decentralization of population and urban development within southeastern Wisconsin has created a number of complex problems concerning rural as well as urban development issues, including public transportation.

Some segments of the public hold that transportation is a public responsibility and should be provided as a public service to those who cannot or do not choose to own and operate an automobile. In the past, public transportation in rural areas has been provided as a social service for clients of programs administered by local social service agencies. While providing a valuable service to the elderly and handicapped segments of the rural population, such rural transportation service projects were not intended to address the transportation needs of other typically transit-dependent segments of the rural population, including members of low-income families, school-age children, and members of autoless or one-auto households. In addition, given the rising cost of motor fuel and automobile utilization, and the uncertainties concerning the future cost and availability of motor fuel, the need to consider an effective alternative to automobile travel for the rural population of Washington County is presented. It is accordingly appropriate to evaluate at this time the feasibility of establishing a countywide public transportation program to serve Washington County--in particular, the urban community centers in that County shown on Map 1. The transit service plan should thus provide a sound basis for addressing three significant transit-related public policy questions. The first question is: Is improved public transit service warranted in Washington County? If the answer is yes, then the other two questions are: 1) Should the County provide it?; and 2) In what form should it be provided? Thus, the transit service plan is also intended to provide guidance in addressing such issues as the ownership, management, service level, fares, and operating policies of public transit service in Washington County and to support applications for available transit capital and operating assistance funds from state and federal sources. Finally, the plan should provide a basis for coordinating the existing specialized transportation services and for determining the extent to which such services can be incorporated into or supplanted with general public transportation services in the County.

STUDY ORGANIZATION

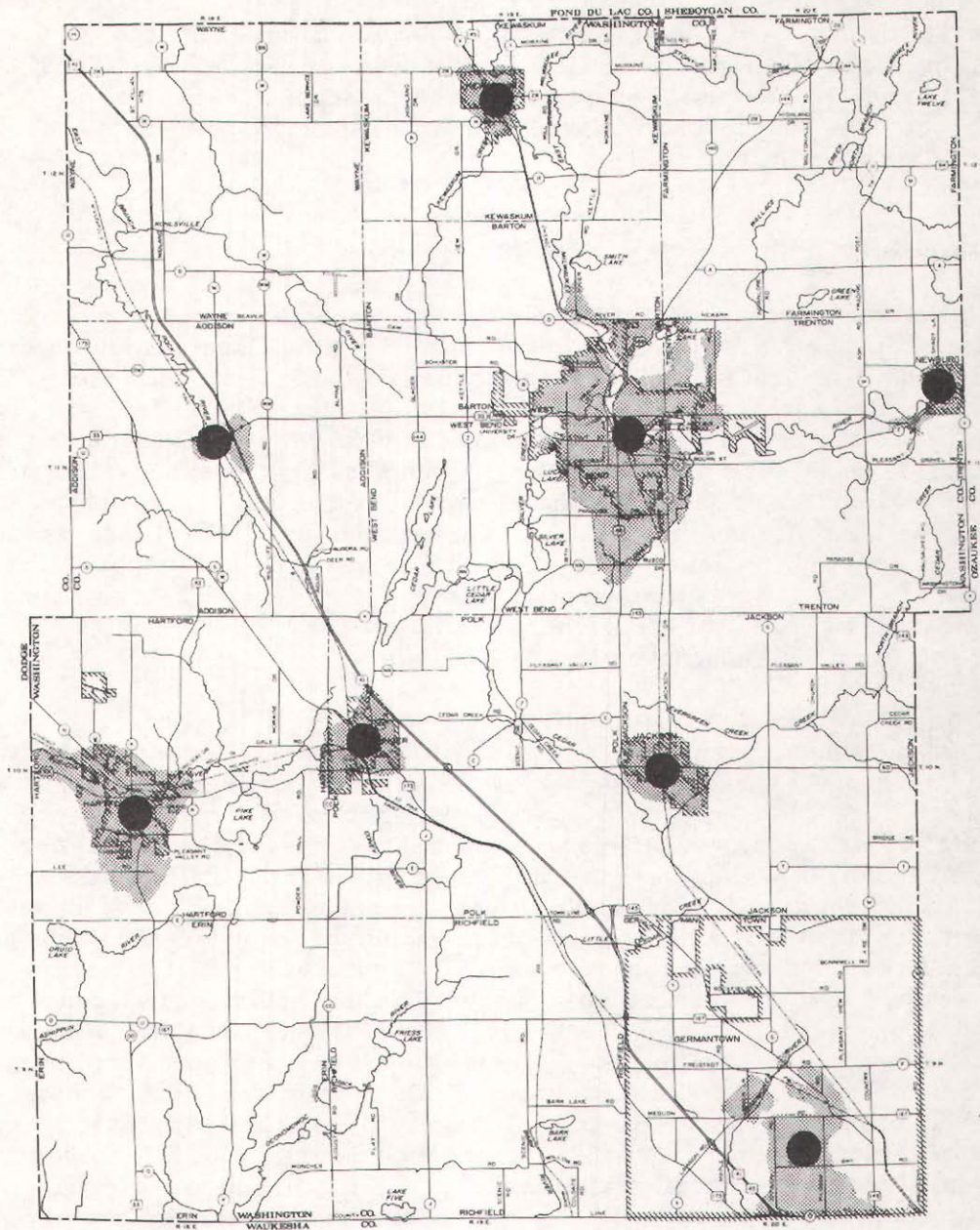
Advisory Committee Structure

Because any transit development proposal would affect a number of governmental agencies and private interests, it was considered essential to involve these interests actively in the transit planning process. Accordingly, an intergovernmental coordinating and advisory committee was established representing a broad spectrum of leadership in Washington County and representatives from local special interest groups, as well as concerned regional and state officials. In general, the purpose of the committee was to broaden input into the study through a critical review of staff efforts.

Specifically, the committee was charged with the following tasks: assisting and advising the study staff on technical methods, procedures, and interpretations; aiding in the assembly and evaluation of planning and engineering data; assisting in the establishment, definition, and review of system design and evaluation criteria; appraising alternative plans; and resolving any conflicts that might arise in plan preparation and selection. The committee was intended to be a working group and to involve state and local officials actively in the planning process. A complete committee membership list is set forth in Appendix A of this report.

Map 1

LOCATION OF COMMUNITY CENTERS IN WASHINGTON COUNTY



LEGEND

● Community Center

■ Urban Residential Development



Source: SEWRPC.

Staff

The preliminary research, system design, and final report preparation for the Washington County transit development program have been accomplished through the efforts of the engineers and planners on the staff of the Regional Planning Commission, together with supporting research, clerical, and drafting personnel. Additional staff assistance was obtained as necessary from certain other agencies concerned with public transit development in Washington County, including the Washington County Office on Aging, the Washington County Department of Social Services, the City of Hartford Park and Recreation Department, the Wisconsin Department of Health and Social Services, the Southeastern Wisconsin Area Agency on Aging, and the Wisconsin Department of Transportation.

THE PLANNING PROCESS

A six-step planning process was employed in the preparation of the Washington County transit service plan. This process, developed by the Commission, was found to be effective in the preparation of similar studies, and was, therefore, retained for the conduct of the Washington County transit service plan. The six steps constituting the process are: 1) formulation of objectives and standards; 2) inventory of basic data; 3) analysis; 4) alternative plan design; 5) evaluation of alternative plans; and 6) selection of a recommended plan. To the greatest extent possible, the findings and recommendations of the plan were based upon the findings and recommendations of the adopted regional plan elements, including the adopted regional transportation plan² and the adopted plan for the transportation handicapped.³ A brief description of each of these six steps as they relate to the conduct of the transit service plan for Washington County follows.

Formulation of Objectives and Standards

In its most basic sense, planning is a rational process for establishing and meeting objectives. Therefore, the formulation of objectives is an essential task which must be undertaken before plans can be prepared. As part of previous regional transportation planning efforts, a set of general public transit development objectives and standards was formulated, as well as a set of specific handicapped-related transit development objectives and standards. These areawide transit development objectives were reviewed, refined to meet the specific needs of predominantly rural Washington County, and adopted by the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County. The objectives are concerned with the location and coordination of public transit facilities so as to serve existing land use patterns effectively and promote desirable forms of new land use development; the provision of a public transit service that provides good access to areas of employment and essential services to all segments of the population; the provision of a public transit service that will improve the mobility of elderly and handicapped persons in an effective and efficient manner; the provision of a public transit service that is located and designed to provide user convenience, comfort, and safety; and the provision of a public transit system that will minimize any harmful effects on the environment. The objectives and standards are set forth in Chapter II of this report.

²See SEWRPC Planning Report No. 25, *A Regional Land Use Plan and a Regional Transportation Plan for Southeastern Wisconsin: 2000, Volume Two, Alternative and Recommended Plans*.

³See SEWRPC Planning Report No. 31, *A Regional Transportation Plan for the Transportation Handicapped in Southeastern Wisconsin: 1978-1982*.

Inventory of Basic Data

Reliable data are essential to the conduct of any planning process. The following four basic data collection efforts were conducted as part of the transit service plan for Washington County: an inventory of relevant past transit planning efforts; an inventory of relevant socioeconomic, land use, and travel characteristics of the County; an inventory of existing transit service; and an inventory of existing public transit legislation and regulations. In the inventory of past planning efforts, adopted and proposed transit plans which affect the study areas were reviewed for relevance to the current transit service plan effort. Those characteristics of Washington County important to public transit planning were identified and established in the second of the above inventories, including existing and probable future land use development, population densities and characteristics, major traffic generators, and functional and jurisdictional highway system plans. Whenever possible, data from the 1980 U. S. Census of Population and Housing pertaining to socioeconomic characteristics and travel habits were used. The public transit system service inventory identified the type and level of public transit service currently provided in the study area. The transit legislation and regulation inventory examined the changing federal and state legislation pertaining to public transit, Wisconsin Transportation Commission regulations, and local regulations and ordinances pertaining to public transit operations in the study area. The findings of these inventories are discussed in Chapters II, III, IV, and V of this report.

Analyses

Inventories provide factual information about the existing state of the system being planned, while analyses and forecasts are necessary to provide estimates of future needs. Based upon the data collected in the inventories, four basic analyses were undertaken. To identify specific areas of need, an analysis of the existing public transit service and its relation to the land use patterns and to the characteristics of the residents of the County was undertaken in light of the transit development objectives and standards selected for the study effort. Existing and probable future travel demand by the population of Washington County was analyzed using available trip origin and destination survey data, and data concerning anticipated future population growth and change in Washington County. An analysis of the extent to which those agencies currently providing specialized transportation services in the County coordinate such services in an attempt to increase efficiency and reduce costs was undertaken. This analysis considered such matters as service areas and service populations, vehicle procurement and maintenance, driver training, dispatching, and scheduling. Finally, an analysis was done of the different ways in which Washington County could organize in order to deliver public transit services. The results of the analyses conducted under the transit development program are discussed in Chapters III, IV, and V of this report.

Design and Evaluation of Alternative Plans

Based on the inventories and analyses noted above, possible public and nonpublic alternative service options and specialized transportation service coordination plans were postulated and evaluated. These plans were short range in nature, prepared with a design period of about five years. The alternatives included possible ride-sharing activities, various types and levels of transit service, practicable capital equipment, management structure, marketing, and service coordination requirements. Each of the alternatives was evaluated against the agreed-upon objectives and standards, and the costs, revenues, and subsidy requirements in the aggregate and on a per-passenger basis were estimated. Each alternative was formulated in enough detail to provide a sound basis for public review and evaluation. The evaluation of the alternative plans formulated was primarily directed toward answering questions regarding whether or not it is desirable for Washington County to provide a countywide public transit service, the extent to which existing specialized transportation services could be curtailed

or eliminated if general public transit service were to be instituted, and the extent to which cost savings and efficiencies could be achieved through better coordination of existing specialized transportation services. The various alternative transit plans considered are set forth in Chapter VI of this report.

Plan Selection and Adoption

The evaluation of alternative plans is intended to result in the selection of a recommended transit development program that can be certified to the Washington County Board of Supervisors and the federal and state funding agencies concerned for consideration and implementation. Based upon public review and evaluation of the alternatives formulated under the transit service plan, a recommended plan was prepared for consideration by the Advisory Committee and the Washington County Board of Supervisors.

The plan is not complete, however, until the steps required for its implementation--that is, the steps necessary to convert the plan into action policies and programs--have been specified. Plan implementation must begin with plan adoption or endorsement by the concerned implementing agencies, which include, for transit development, the Washington County Board of Supervisors as the major local unit of government operating within the study area, the Southeastern Wisconsin Regional Planning Commission, the Wisconsin Department of Transportation, and the U.S. Department of Transportation, Federal Highway Administration. All implementation recommendations must follow and flow from such plan adoption and endorsement. The recommended transit plan is described in Chapters VI and VII of this report.

Chapter II

TRANSIT PLANNING STATUS AND TRANSIT SERVICE DEVELOPMENT OBJECTIVES AND STANDARDS

INTRODUCTION

Planning is, by its very nature, a continuing process. Consequently, a planning effort can rarely be properly conducted without a working knowledge of the planning efforts, adopted plans, and plan implementation efforts which preceded it. In order to ensure the necessary continuity in the preparation of the Washington County transit service plan, it was necessary to review briefly relevant past and present planning efforts as they pertain to transit development in Washington County. The following sections describe past and present transportation planning efforts and the major adopted transportation plans as they affect Washington County, with emphasis on their implications for the Washington County transit service plan. The final sections of this chapter present the definitions of public transit terminology necessary for understanding the remainder of this report, and the transit system development objectives and standards used in the design and evaluation of the various alternative short-range transit plans presented in Chapter VI.

MAJOR PAST TRANSIT PLANNING EFFORTS

1990 Regional Land Use-Transportation Plans

The first major work program of the Southeastern Wisconsin Regional Planning Commission which was actually directed toward the preparation of a framework of advisory plans for the physical development of the Region was the regional land use-transportation study initiated in January 1963.¹ That study was completed in December 1966 with the adoption by the Commission of a regional 1990 land use plan and a regional 1990 transportation (highway and transit) plan for southeastern Wisconsin.

The adopted 1990 regional transportation plan recommended that an improved and expanded public transit system be developed to serve the rapidly urbanizing Region in an effort to reverse long-term downward trends in transit ridership. Foremost among the conclusions of that report was the Commission finding that a flexible, rubber-tire, intraurban transit system was the best means for providing high-level rapid transit service in the Milwaukee urbanized area. Other alternatives such as fixed heavy rail transit were considered, but the study determined that, apart from the loss of flexibility, such alternatives were less cost-effective in providing the desired level of service and they involved too great a public expenditure for the potential benefit. In the Milwaukee urbanized area, the adopted 1990 regional transportation plan recommended, in addition to improved secondary (local express) and tertiary (local) service, the provision of primary (rapid transit) service over a fully grade-separated, exclusive bus facility, or busway, located in the east-west travel corridor, supported by an expanded modified rapid transit system operating in mixed traffic over the outlying portions of the urbanized-area freeway system.

¹See SEWRPC Planning Report No. 7, *The Regional Land Use-Transportation Study, Volume One, Inventory Findings--1963; Volume Two, Forecasts and Alternative Plans--1990; and Volume Three, Recommended Regional Land Use-Transportation Plans--1990.*

The expanded public transit system was to provide fast and regular service between transit stations in the outlying suburban areas and the Milwaukee central business district.

Following adoption of the 1990 regional transportation plan and pursuant to one of the recommendations of that plan, Milwaukee County, in cooperation with the Commission and the state and federal governments, undertook a preliminary engineering study of the recommended transit service improvements within the Milwaukee metropolitan area. The study findings reaffirmed the recommendations of the adopted 1990 regional transportation plan and further detailed those recommendations for transit service within the Milwaukee metropolitan area.² The refined plan was adopted by the Commission in March 1972. The initial regional transportation system plan included a modified rapid transit "Freeway Flyer" line between the Milwaukee central business district and a public transit station located at the intersection of Pilgrim Road and Mequon Road in the Village of Germantown, with part of the route operating as a bus rapid transit line over an exclusive, 8.3-mile-long, grade-separated right-of-way in Milwaukee County. However, no efforts toward implementing primary transit service between the Village of Germantown and the Milwaukee central business district can be reported at this time.

Regional Land Use-Transportation Plan Reevaluation

The Commission completed and, on June 1, 1978, adopted a design year 2000 regional transportation plan.³ This plan was based upon a careful review, reevaluation, and revision of the previously adopted design year 1990 regional transportation plan, and revalidated many of the recommendations put forth by the earlier plan. Some of the transit development recommendations of the adopted year 2000 transportation plan, however, are modifications of the recommendations of the adopted 1990 transportation plan for the provision of primary rapid transit service in the Milwaukee urbanized area. Unlike the 1990 transportation plan, which recommended the construction of a fully grade-separated, exclusive roadway for motor buses in the east-west travel corridor in Milwaukee County, the adopted year 2000 transportation plan does not recommend the development of any true rapid transit facilities. Instead, the plan recommends the development of a freeway operational control system in the Milwaukee urbanized area designed to permit the provision of a high level of primary transit service over the existing and proposed freeway system. Like the 1990 plan, the adopted design year 2000 transportation plan recommends the provision of primary modified rapid transit service between a primary transit station serving the Village of Germantown and the Milwaukee central business district. As previously noted, no efforts have as yet been made to institute primary transit service between the Village of Germantown and the Milwaukee central business district. Finally, the adopted year 2000 transportation plan recommends that some form of tertiary public transit service be provided in the Village of Germantown.

In reappraising the adopted regional 1990 land use and transportation plans, the Commission undertook a series of major planning reinventories to obtain definitive data concerning the changes which had occurred since adoption of the initial plan in the basic factors affecting land use and transportation system development within the Region. An element of that reinventory, conducted in 1972, which is of particular

²See Milwaukee Area Transit Plan, prepared by the Milwaukee County Expressway and Transportation Commission in cooperation with the Southeastern Wisconsin Regional Planning Commission.

³See SEWRPC Planning Report No. 25, A Regional Land Use Plan and a Regional Transportation Plan for Southeastern Wisconsin: 2000, Volume One, Inventory Findings; Volume Two, Alternative and Recommended Plans.

relevance to this study is the home interview survey. The pertinent findings of that survey are summarized in this report.

Regional Transportation Plan for the Transportation Handicapped

In August 1975, the Milwaukee County Transit Board requested the Commission to undertake a study of the transportation needs of the elderly and handicapped as part of its overall transportation planning program. The study, which began in August 1976, was completed in early spring 1978, and the resulting plan was adopted by the Commission on April 13, 1978. The study estimated the number of transportation handicapped residents in the Region; identified the transportation needs of the Region's elderly and handicapped; assessed the effectiveness of the existing public and private transportation systems in accommodating those needs; and, based upon an evaluation of alternatives, developed a workable and cost-effective plan for meeting those needs. The recommended plan for the provision of transportation services and facilities to the transportation handicapped in southeastern Wisconsin consists of a combination of an accessible transit system and a user-side subsidy transportation program in the three delineated urban service areas of the Region, demand-responsive transportation systems to serve the nonurbanized areas, and county programs to coordinate the transportation services provided by the social service agencies in each county in the Region. Efforts, to date, to implement the study recommendations for Washington County include specialized transportation services provided by the City of Hartford Department of Recreation and sponsored by Washington County. The program provides specialized transportation service to elderly and handicapped persons in Washington County on an advance-reservation basis. This service is further discussed in Chapter IV of this report.

Transportation Systems Management Plan

On December 19, 1977, the Commission, acting on the recommendation of the Intergovernmental Coordinating and Advisory Committees on Transportation System Planning and Programming for the Kenosha, Milwaukee, and Racine Urbanized Areas, adopted the first transportation systems management (TSM) plan for the Region. That 1978 TSM plan examined the operations and management of the existing highway and public transportation systems within the Region and, through a series of operating, regulatory, and service policies, proposed ways to enhance the efficiency of those systems over a five-year implementation period from 1978 through 1982. The 1978 TSM plan was subsequently amended through the completion and adoption by the Commission of the 1979, 1980, and 1981 TSM plans. The current TSM Plan for 1981 presents an updated schedule of TSM projects for the Region for the period from 1981 through 1985. This plan contains recommendations for specific projects aimed toward the continued provision of specialized transit services within Washington County.

Milwaukee Area Primary Transit System Alternatives Analysis

In January 1978, Milwaukee County Executive William F. O'Donnell requested the Regional Planning Commission to reexamine the feasibility of reestablishing a light rail system in the Milwaukee area. In order to meet federal planning requirements, a study was designed that would provide for the reexamination of all modes of providing primary transit service in accordance with a set of requirements specified for such studies by the U. S. Department of Transportation, Urban Mass Transportation Administration. The Urban Mass Transportation Administration term for such studies is an "alternatives analysis." Work was initiated on the alternatives analysis study in 1979.

The alternatives analysis study is based upon consideration of four alternative futures for development in the Region, these futures differing with respect to motor fuel price and availability, population lifestyles, population and employment levels, and land use patterns for the design year 2000 under which various alternative transit system plans and service technologies are being tested and evaluated.

Alternative primary transit service technologies being examined include motor buses on ramp-metered freeways, commuter rail, light rail transit, bus on exclusive busway, and heavy rail rapid transit. The resulting plans and analysis are intended to indicate which primary transit modes are the most promising for the Milwaukee area under a wide variety of possible future conditions of population and employment growth, land use development, and energy costs. While the major focus of the study has been on examining alternative primary transit systems for the Milwaukee area, which includes the Village of Germantown in Washington County, primary transit services connecting outlying centers of urban development with the Milwaukee urbanized area have also been proposed and evaluated.

Within Washington County, the alternatives analysis study has, to date, examined the feasibility of providing Freeway Flyer motor bus services between the Milwaukee central business district and the City of West Bend, the Village of Jackson, and the Village of Germantown, as well as the feasibility of operating commuter rail passenger services to connect these same Washington County communities with the Milwaukee central business district. Preliminary results of the study have supported the transit development recommendations of the adopted year 2000 transportation plan for Washington County, indicating that Freeway Flyer bus service between the Village of Germantown and the Milwaukee central business district is feasible under all alternative futures considered. In addition, preliminary study results indicate that Freeway Flyer bus service between the City of West Bend and Village of Jackson and the Milwaukee central business district would be feasible under only one of the four alternative futures considered, while commuter rail passenger service between Washington County and the Milwaukee central business district would not be feasible under any of the alternative futures considered. The complexity of the alternatives analysis planning effort is such that the final study recommendations are not expected to be ready for public review before late 1981.

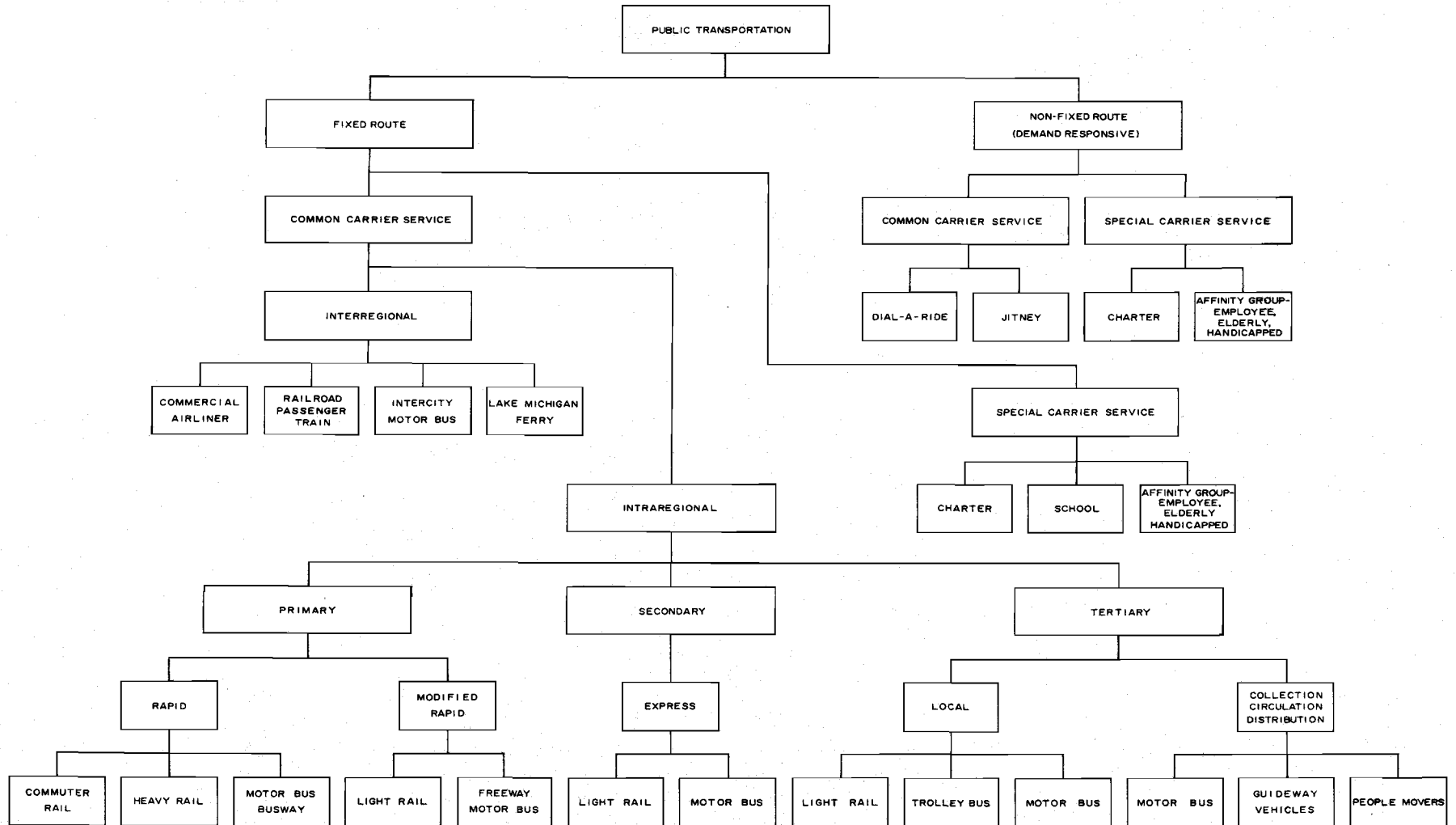
DEFINITIONS OF PUBLIC TRANSIT TERMINOLOGY

Public transportation may be defined as the transportation of relatively large groups of people by relatively large, publicly or quasi-publicly owned vehicles routed between or along significant concentrations of related trip origins and destinations. As shown in Figure 1, public transit may be divided into two categories: fixed route and nonfixed route. Fixed route public transit may be defined as the provision of transit service to the general public or special subgroups of the general public by relatively large vehicles operated on regular schedules over prescribed routes. Nonfixed route public transit may be defined as the provision of service to the general public or to special subgroups on a demand-responsive basis. Fixed route public transit service may be further divided into common carrier service and special carrier service. Common carrier service is fixed route, scheduled headway public transit service provided to the general public. Special carrier service is fixed route public transit service provided to special subgroups of the general public. Examples of fixed route special carrier service include the traditional yellow school bus service and the UBUS service, as initially operated in the Milwaukee area by the University of Wisconsin-Milwaukee for its students and staff.

Nonfixed route public transit service may also be divided into common carrier service and special carrier service. Common carrier, nonfixed route public transit service is demand-responsive service provided to the general public. Such service includes so-called jitney service, in which vehicles cruise a given subarea and provide transit service on visual demand, and dial-a-bus service, in which small buses or vans are utilized to provide transit service on visual or telephone demand. An example of this type of service within the Region is the publicly subsidized shared-ride taxi service operating in the City of Hartford. Nonfixed route special carrier service is

Figure 1

FUNCTIONAL CLASSIFICATION OF PUBLIC TRANSPORTATION SYSTEMS



Source: SEWRPC.

demand-responsive transit service provided to special subgroups of the general public. An example of such service is the demand-responsive transit service to the elderly and transportation handicapped provided by the City of Hartford Department of Recreation and sponsored by Washington County.

As shown in Figure 1, the common carrier, fixed route public transit service may be subdivided into interregional service--service across regional boundaries to meet external travel demand--and intraregional service--service within the Region to meet internal travel demand. Intraregional common carrier, fixed route service may be further subdivided into primary, secondary, and tertiary levels of service. The primary level of service facilitates intercommunity travel by connecting major regional activity centers--such as regional commercial, industrial, and recreational centers--to the various residential communities comprising the Region. The major objective of primary public transit service is to provide a network of relatively high-speed lines which serve and connect these kinds of centers and residential communities. Primary-level public transit service may be characterized as having a very high level of speed and a limited degree of accessibility. Secondary common carrier, fixed route service consists of express service operated on arterial streets in mixed traffic or over exclusive lanes on an arterial street. In general, secondary public transit service may be distinguished from primary public transit service by the fact that it provides a greater degree of accessibility at somewhat slower travel speeds. Tertiary common carrier public transit service consists of local service operated on arterial and collector streets. It is characterized by a high degree of accessibility and relatively low travel speeds. Tertiary transit service, in its ideal form, would constitute a dense grid of local transit lines that provides a high degree of access from neighborhoods to the public transit service and feeds the primary and secondary systems.

The primary, secondary, and tertiary systems may be further subdivided into various components, as shown in Figure 1. Definitions of these components, and of other terms which will appear in later sections of this report, are presented below:

Interregional Public Transit: Those forms of common carrier, fixed route public transit that provide service across regional boundaries to meet external travel demand, such as commercial air travel, railway passenger train service, ferry service across Lake Michigan, and intercity bus service. An example of this type of service is the Wisconsin Coach Lines, Inc., bus service operating through the City of West Bend between Milwaukee and Fond du lac.

Intraregional Public Transit: Those forms of common carrier public transit that provide service within the Region to meet internal travel demand. An example of this type of service is the public transit service operated by the Milwaukee County Transit System within Milwaukee County.

Rapid Transit Service: Primary public transit service operated within its own exclusive, fully grade-separated right-of-way at relatively high speeds for a major portion of its route. At the present time, no form of primary rapid transit service is provided in the Southeastern Wisconsin Region.

Modified Rapid Transit Service: Primary public transit service operated with buses at high speed over freeways for a major portion of its route or operated with light rail vehicles at high speed over right-of-way with grade crossings for a major portion of its route. An example of this type of service is the public transit service operated by the Milwaukee County Transit System under contract with Waukesha County between the Village of Menomonee Falls and the Milwaukee central business district.

Express Transit Service: Secondary public transit service operating primarily over arterial streets with limited or no stops for a major portion of its route. An example of this type of service is the UBUS service operated by the Milwaukee County Transit System within Milwaukee County over E. and W. Oklahoma Avenue.

Local Transit Service: Tertiary public transit service operating primarily over arterial and collector streets with frequent stops for passenger pickup and discharge.

Demand-Responsive Service: A range of local public transit services characterized by the flexible routing and scheduling of relatively small vehicles to provide shared-occupancy, door-to-door personalized transportation on demand. An example of this type of service is the advance-reservation bus service provided by the City of Hartford Department of Recreation and sponsored by Washington County for the elderly and transportation handicapped within Washington County.

Circulation-Distribution Service: Local public transit service provided for the movement of passengers within major urban activity centers. An example of this type of service is the shuttle bus service operated by the Milwaukee County Transit System in the Milwaukee central business district.

Peak Period: The time period of the day when transit usage is at a maximum, usually at the beginning and the end of normal business hours.

Headway: The time interval between two buses traveling the same route in the same direction.

Passenger Revenue: Fares paid by public transit passengers traveling aboard public transit vehicles operating in regular service; also known as fare-box revenue.

Operating Revenue: Revenues derived from the provision of public transit service including: 1) fares paid by transit riders; 2) charter and special service revenues; and 3) revenues from, for example, the sale of advertising space aboard transit vehicles or income from concession rentals.

Load Factor: The ratio of passengers carried on a public transit vehicle to the seating capacity of the vehicle.

Cycle Schedule: Public transit service operating over routes established so as to require the vehicles serving the system to lay over at a common location at the same time, thus maximizing the opportunity for transfers.

Noncycle Schedule: The scheduling of each transit route on an individual basis.

OBJECTIVES AND STANDARDS

To guide in the development of alternatives for the Washington County transit service plan and to provide measures for evaluating the adequacy of the transit service alternatives considered, a set of transit service development objectives and supporting standards has been prepared. Terms such as objective and standard are subject to a wide range of interpretation and application and are closely linked to other terms often used in planning work which are subject to equally diverse interpretation and application. To provide a common frame of reference, the follow-

ing definitions have been adapted for use in the Washington County transit planning effort:

1. Objective: a goal or end toward the attainment of which plans and policies are directed.
2. Standard: a criterion used as a basis of comparison to determine the adequacy of plan proposals to attain objectives.

Table 1 sets forth the objectives and standards originally prepared by the Southeastern Wisconsin Regional Planning Commission under its regional public transit planning efforts, as modified and adopted by the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County.

While the standards set forth in Table 1 are used to guide the design of public transit system service and facility improvements and to assist in measuring the adequacy of proposed improvements, several overriding considerations must be recognized in applying the planning standards in the conduct of the transit service plan. First, it must be recognized that an overall evaluation of each alternative transit plan must be made on the basis of cost. Such an analysis may show that attainment of one or more of the standards is beyond the economic capability of the community and, therefore, that the standards cannot practically be met and must be either modified or eliminated. Second, it must be recognized that any one plan proposal is unlikely to meet all the standards completely, and that the extent to which each standard is met, exceeded, or violated must serve as a measure of the ability of each alternative plan proposal to achieve the objective which a given standard complements. Third, it must be recognized that certain objectives and standards may be in conflict, requiring resolution through compromise, and that meaningful alternative plan evaluation can only take place through a comprehensive assessment of each of the alternative plans against all of the development standards. Finally, the alternative transit plans must be designed to meet the transportation needs of those portions of the elderly and physically and mentally disabled population that are transportation handicapped.

Table 1

PUBLIC TRANSIT OBJECTIVES AND STANDARDS ESTABLISHED
FOR USE IN THE WASHINGTON COUNTY TRANSIT SERVICE PLAN

Transit facilities should be so located and of such capacity and design as to effectively serve the existing land use pattern and promote the implementation of adopted land use plans.

STANDARDS

1. Intraregional public transit facilities should be provided as warranted to connect urban and rural community centers, as shown on Map 1, and to provide service within such centers to the following land use areas:
 - a. Intercity and suburban bus terminals;
 - b. Major regional and community shopping centers;
 - c. Major industrial and other employment centers;

- d. Major regional and community recreational sites;
 - e. Institutions such as universities, vocational schools, community libraries, hospitals and medical clinics, mental health centers, social service agencies, and county seats; and
 - f. Elderly housing complexes, care facilities, and activity centers.
2. The total amount of land used for public transit and public transit terminal facilities should be minimized.

OBJECTIVE NO. 2

Transit facilities should promote total transportation flexibility, allowing public transit service to be readily adapted to changes in the requirements of, or the balance between, personalized and public transportation, and to changes in public transit technology.

STANDARDS

1. Intraregional public transit facilities should be located, designed, and scheduled so as to readily permit the modification of service between urban and rural community centers so as to provide service as warranted to the land use areas identified in Objective No. 1, Standard 1.
2. Interregional and intraregional public transit facilities should be adaptable to serving a variety of transportation functions such as carrying small packages, in addition to moving people.

OBJECTIVE NO. 3

Transit facilities should provide a means of access to areas of employment and essential services for all segments of the population, but especially for low- to middle-income families, the elderly and handicapped,^c and others who do not own, cannot operate, or do not have ready access to an automobile.

STANDARDS

1. Intraregional public transportation systems should provide levels of service commensurate with potential demand.
2. In urban and rural areas, public transportation service should be provided to all residents so as to minimize the overall travel time required to complete a trip.
3. Demand-responsive public transit service may be provided,^d as warranted^a, within urban and rural community centers to provide a collection-distribution function for fixed route public transit service serving such centers.
4. Land uses shall be considered to be served by intraregional public transit when within a walking distance of one-quarter mile in urban and rural community centers and one-half mile outside such centers.

OBJECTIVE NO. 4

Transit facilities should be located and designed to provide user convenience, comfort, and safety, thereby promoting transit utilization.

STANDARDS

1. Intraregional public transit facilities should be located and designed to provide adequate capacity to meet existing and projected travel demand between the various land uses. The average maximum load factor should not exceed one passenger per seat.
2. Service frequencies for intraregional, fixed route public transit services shall be designed to provide service capable of accommodating passenger demand at the recommended load standard.
3. To provide protection from the weather, bus passenger shelters of an attractive design shall be constructed at route terminals and major transfer points.
4. Each public transit vehicle should be retired and replaced at the end of its maximum service life; and, in this respect, maximum service life for public transit vehicles shall be defined as follows:
 - a. For buses with a seating capacity of more than 25 passengers used in providing fixed route transit service and powered by a diesel engine, maximum service life shall generally be considered to average 12 years for buses averaging more than 50,000 miles per year and 15 years for buses averaging fewer than 50,000 miles per year.
 - b. For buses with a seating capacity of fewer than 25 passengers used in providing fixed route transit service and powered by a gasoline engine, the maximum service life shall generally be considered to average five years or 100,000 miles.
 - c. For automobiles and vans used in providing demand-responsive transit or taxi services, the maximum service life shall generally be considered to average three years or 150,000 miles.
5. Public transportation vehicles and facilities shall, to the extent possible, be configured, equipped, and operated so as to maximize the comfort, convenience, and security of all passengers, including handicapped individuals.
6. Information about public transportation services shall be made available in such a manner as to maximize all potential users' knowledge of, and familiarity with, the services being offered.
7. Specialized transportation service should be available at least one day per week to meet the transportation needs of those portions of the elderly and handicapped population unable to avail themselves of regular transit service. In this respect, maximum use should be made of existing public, private for profit, and nonprofit transportation providers, consistent with the provision of an economic, cost-effective system and respecting the unique characteristics of each provider's operation and program.

OBJECTIVE NO. 5

The transit system should be economical and efficient, meeting other objectives at the lowest possible cost.

STANDARDS

1. The sum of the public transit facilities' operating and capital investment costs should be minimized. This standard prompts consideration of the following factors:

- a. Cost of operating equipment;
 - b. Cost of maintenance and storage facilities; and
 - c. Operating costs.
2. The public subsidy required per transit ride should be minimized.

^a Maintenance of existing, or provision of new, public transit service may be considered warranted under any of the following conditions:

- 1. The public transit service produces operating revenues that exceed operating costs. Operating costs used in the analysis shall include drivers' wages and fringe benefits; and fuel, lubrication, and maintenance costs.*
- 2. The public transit service produces operating revenues that equal at least 50 percent of the operating cost. In this case, operating revenues used in the analysis shall be based upon an equivalent full base fare per passenger, and shall not be adjusted to account for any reduced fare programs for special groups. The operating deficit must be paid by the community or special group receiving the public transit service. The community involved could be an individual local unit of government or an entire metropolitan area.*
- 3. The public transit service provides a significant contribution to the revenue of connecting public transit service or to the total public transit system, or provides improved total system continuity, system efficiency, and passenger convenience.*

^b Major industrial and other employment centers shall be defined as an existing or officially designated concentration of manufacturing, wholesaling, commercial, or service-related establishments providing employment for more than 100 persons.

^c The elderly shall be defined as those persons 65 years of age or older. The handicapped shall be defined as any individuals who, by reason of illness, injury, age, congenital malfunction, or other permanent or temporary incapacity or disability, are unable, without special facilities or special planning or design, to utilize public transit facilities. These categories of handicapped include individuals who are nonambulatory wheelchair-bound and those with semi-ambulatory capabilities.

^d The provision of demand-responsive public transit service may be applicable under the following general conditions:

- *Urban-area population density of at least 2,000 to 6,000 persons per square mile.*
- *Service-area population of between 4,000 and 20,000.*
- *Passenger demand of between 20 and 60 per square mile per hour. Lesser demands can be better served by taxi and greater demands can be better served by fixed route service when street systems and topography permit.*
- *A high proportion of potential riders in the age groups between 5 and 18 years of age and 65 years of age and older.*
- *Transit travel times from within the service area to the major trip generators, such as shopping centers, employment centers, school, and transit stations, ranging between 10 and 20 minutes.*

Chapter III

SOCIOECONOMIC AND LAND USE CHARACTERISTICS

INTRODUCTION

In order to evaluate the need for transit service within Washington County, it is necessary to inventory those factors which affect, or are affected by, the provision of transit service. Such an inventory should include not only an inventory of the demand for and the supply of transit services, but an inventory of the physical characteristics of the study area and of its land use and socioeconomic characteristics. Special transit-dependent population groups and the major trip generators within the area should be identified, and the travel habits and patterns of the study area's population should be described. This chapter presents the results of such an inventory as they relate to the demand, or need, for transit service in Washington County. The results of the inventory relating to the supply of existing transit service is the topic of the following chapter.

THE STUDY AREA

The study area considered in this report is Washington County. Located in the northwest portion of the Southeastern Wisconsin Planning Region, Washington County has a total land area of 436 square miles. Twenty-two local general-purpose units of government exist within the County. In 1980, the total resident population of the County, as determined by the U. S. Bureau of the Census, was about 84,800 persons. Of this total, nearly 45,800, or about 54 percent, resided within the eight incorporated cities and villages located in the County. The location of the civil divisions and of the study area within the Southeastern Wisconsin Region are shown on Map 2. As was deemed appropriate, the inventories and analysis conducted under the transit feasibility study included certain major traffic generators located outside the study area boundary.

NATURAL RESOURCE FEATURES AND LAND USE

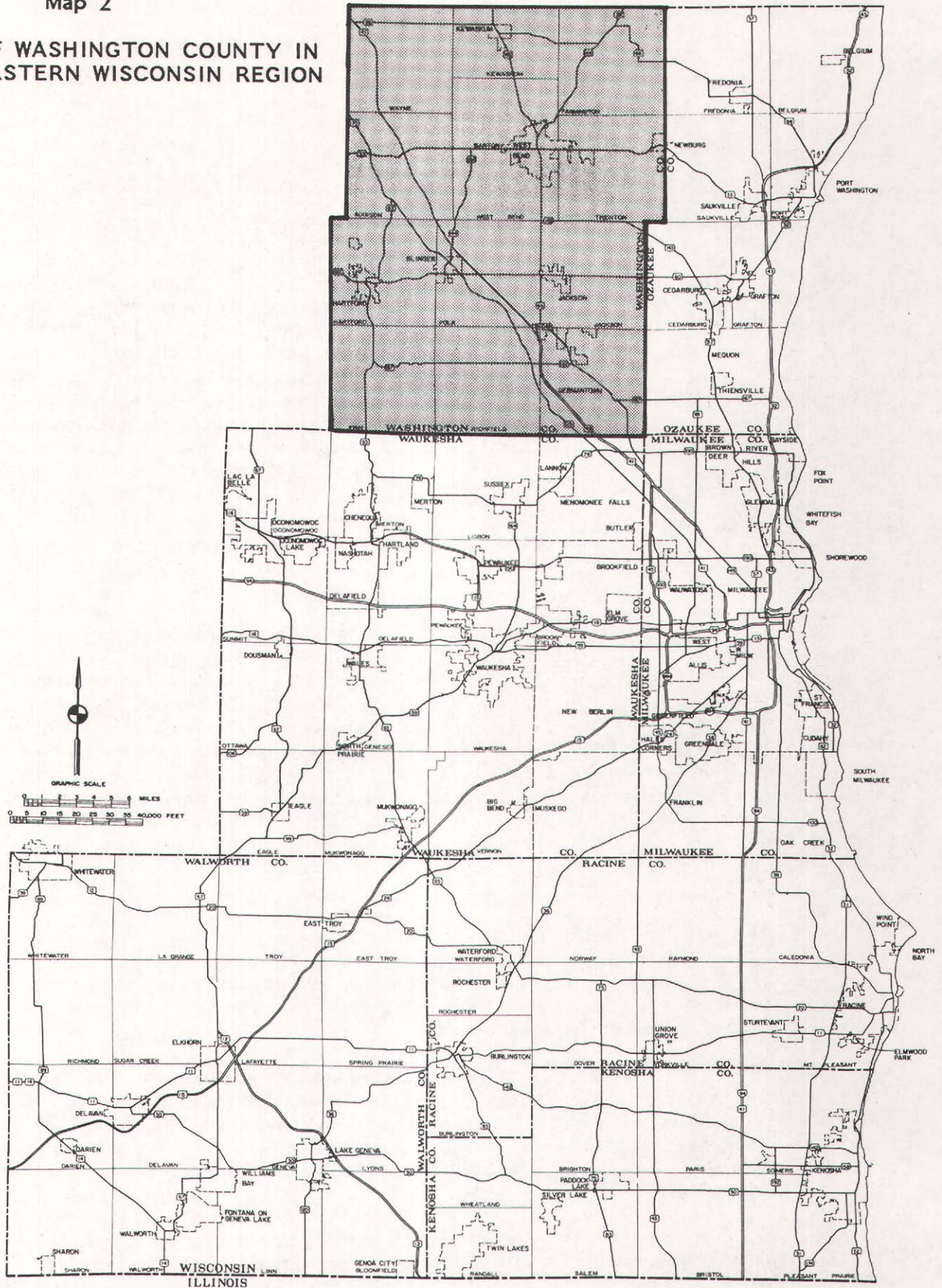
Because they influence and are influenced by transportation development, natural resource features must be taken into consideration in the planning for a transit development program for Washington County.

Like the rest of the Southeastern Wisconsin Region, Washington County has a semi-humid, continental climate, with relatively extreme seasonal temperature fluctuations and moderate amounts of rainfall. Because the weather may, particularly in winter, create discomfort for passengers waiting in unsheltered areas to board public transit vehicles, the provision of transit shelter facilities should be considered in any transit planning effort.

The only dominant topographic feature that could have a significant effect on public transit planning and operation in the County is the Kettle Moraine, an interlobate glacial deposit composed of a complex system of stratified conical hills, long sinuous ridges, and deep depressions. The system forms some of the most interesting and attractive landscapes within the Region, and contains the area of highest elevation

Map 2

LOCATION OF WASHINGTON COUNTY IN THE SOUTHEASTERN WISCONSIN REGION



Source: SEWRPC.

and the area of greatest local elevation difference, or relief, within the County. By limiting the number of direct routes which can be used to interconnect the various parts of the County, the Kettle Moraine can increase the travel time and cost necessary to go from one community to another.

The pattern of urban growth in Washington County from 1850 through 1980 is illustrated on Map 3. Historically, major centers of urban development within the County, such as the City of West Bend, were located along major transportation routes and along rivers where power for industrial and commercial activities could be supplied, with urban growth occurring in a concentric pattern outward from the historic focus of urban activity. With the increased use of the private automobile for transportation after World War II, particularly between 1950 and 1970, much new residential development occurred that was not related to the economic base of Washington County itself but instead to that of the Milwaukee urbanized area. More recent urban growth within the study area, such as that experienced by the Towns of Richfield and Erin, has occurred in a more diffused pattern of development referred to as "urban sprawl," emanating outward from the more densely developed areas of Milwaukee and Waukesha Counties.

Table 2 sets forth the distribution of land uses in 1970 within Washington County. As shown in the table, residential, and transportation, communication, and utility uses are the predominant types of land uses within the urban portion of the study area. It is important to note, however, that despite recent rapid urbanization, over 90 percent of the total land area of Washington County is still in agricultural or other open, rural land uses. The pattern of future urban development within the County can, therefore, be an important influence on the future need for and feasibility of transit services in the County.

CHARACTERISTICS OF THE RESIDENT POPULATION

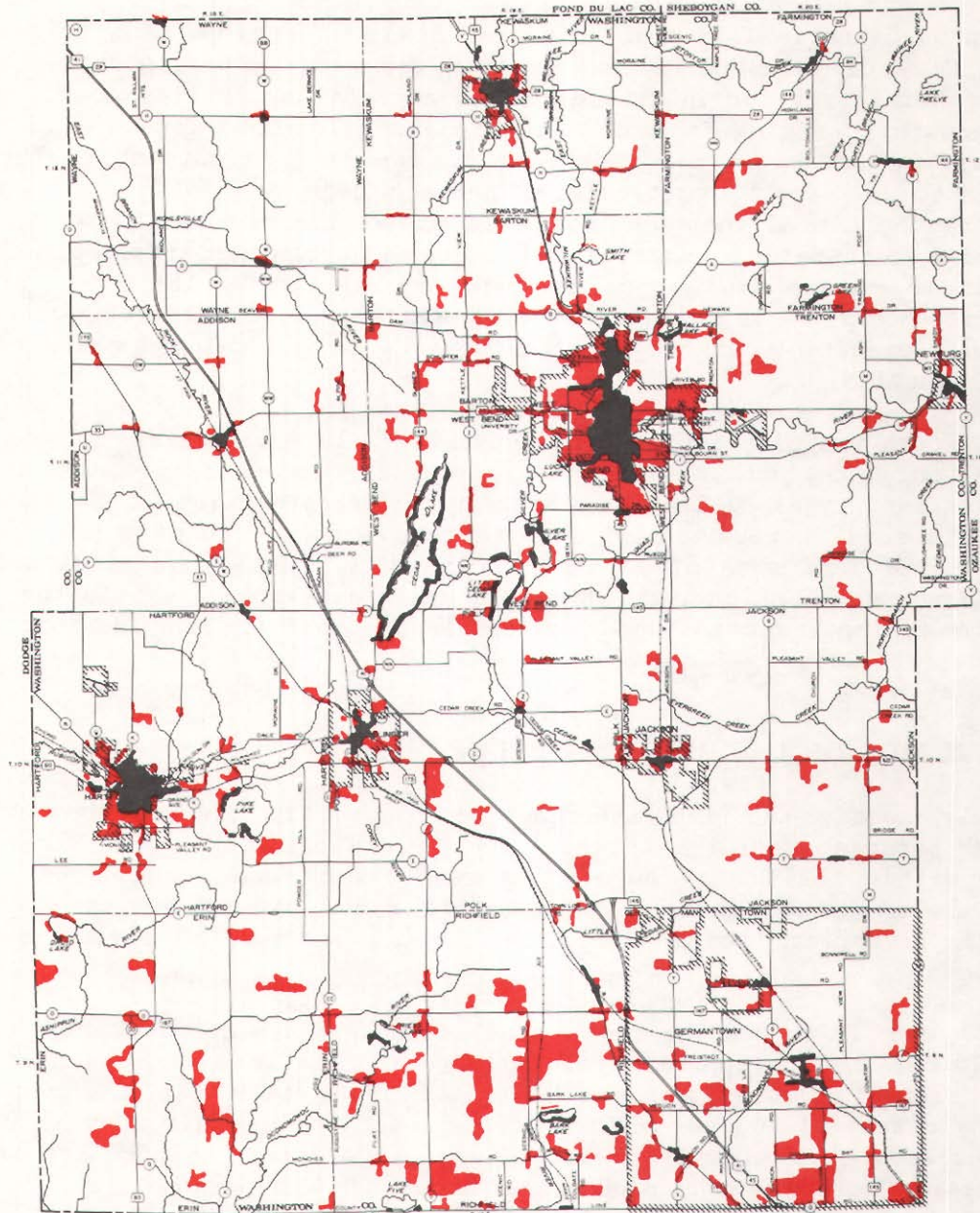
As previously noted, the 1980 residential population of Washington County was about 84,800 persons according to the U. S. Bureau of the Census. Rates of population growth within the County have fluctuated from decade to decade, with significant periods of growth generally reflecting times of economic prosperity. Table 3 sets forth historical population data for the cities, villages, and towns in Washington County.

Between 1960 and 1970, the resident population of Washington County increased by nearly 18,000 persons, or approximately 39 percent. The rate of population growth in the County slowed somewhat between 1970 and 1980, with the resident population increasing by nearly 21,000 persons, or 33 percent. During this 20-year period, significant increases in resident population were experienced by the City of West Bend, whose population more than doubled--from about 10,000 persons in 1960 to nearly 21,500 persons in 1980; and by the Village of Germantown, whose population increased almost 18-fold--from about 600 persons in 1960 to more than 10,700 persons in 1980. Commission forecasts indicate that the resident population of Washington County may be expected to reach as high a level as 143,000 persons by the year 2000, an almost 70 percent increase over the present population level.

An important factor affecting the efficiency and cost-effectiveness of public transit service is population density. A crude but adequate measure of population density can be obtained by comparing the population levels to the land areas of the respective civil divisions in a county. In 1980 the total resident population of Washington County, as noted above, was approximately 84,800 persons. Because the total area of Washington County is about 436 square miles, the 1980 overall population density of the County was about 200 persons per square mile. The rural portions of the study

Map 3

HISTORIC TREND OF URBAN GROWTH IN WASHINGTON COUNTY: 1850-1980

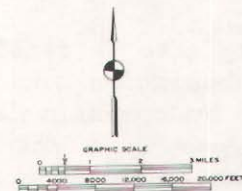


LEGEND

Period of Development

1850 through 1950

1951 through 1980



Source: SEWRPC.

Table 2

DISTRIBUTION OF LAND USES IN WASHINGTON COUNTY: 1970

| Land Use Category | Area (acres) | Percent of Land Use Area | Percent of Total Study Area |
|---|-----------------|--------------------------------|-----------------------------------|
| Urban | | | |
| Residential ^a | 11,525 | 44.1 | 4.1 |
| Commercial | 299 | 1.1 | 0.1 |
| Industrial ^b | 434 | 1.7 | 0.2 |
| Transportation, Communication, and Utilities | 11,289 | 43.2 | 4.1 |
| Governmental ^c | 916 | 3.5 | 0.3 |
| Recreational | 1,664 | 6.4 | 0.6 |
| Subtotal | 26,127 | 100.0 | 9.4 |
| Rural | | | |
| Agricultural | 186,466 | 73.8 | 66.9 |
| Woodlands | 27,410 | 10.9 | 9.8 |
| Wetlands and Surface Water.... | 35,638 | 14.1 | 12.8 |
| Extractive ^d | 935 | 0.4 | 0.3 |
| Unused and Other Open Lands | 2,158 | 0.8 | 0.8 |
| Subtotal | 252,607 | 100.0 | 90.6 |
| Total | 278,734 | -- | 100.0 |

^aIncludes all residential areas, developed and under development.

^bIncludes all manufacturing, wholesaling, and storage.

^cIncludes institutional land uses.

^dIncludes mining and quarrying.

Source: SEWRPC.

area, consisting of the unincorporated towns within the County, had an overall population density of about 100 persons per square mile in 1980, while the urban portions of the County, consisting of the incorporated cities and villages within the County, had an overall population density of about 850 persons per square mile. Table 4 shows the overall 1980 population density of the major centers of urban development within Washington County, as well as of each civil town within the County. As indicated in the table, the City of West Bend had the highest overall population density in 1980 of about 2,600 persons per square mile.

Table 3

**POPULATION CHANGES IN CITIES, VILLAGES, AND TOWNS
IN WASHINGTON COUNTY: SELECTED YEARS 1950-1980**

| Civil Division | 1950 ^a | 1960 ^b | 1970 ^c | 1980 |
|----------------------------|-------------------|-------------------|-------------------|---------------|
| Cities | | | | |
| Hartford | 4,549 | 5,627 | 6,499 | 7,046 |
| West Bend..... | 6,849 | 9,969 | 16,555 | 21,484 |
| Milwaukee (part) | -- | -- | -- | 2 |
| Villages | | | | |
| Barton | 1,039 | 1,569 | -- | -- |
| Germantown | 357 | 622 | 6,974 | 10,729 |
| Jackson | 361 | 458 | 561 | 1,817 |
| Kewaskum | 1,183 | 1,572 | 1,926 | 2,381 |
| Newburg ^d | -- | -- | -- | 688 |
| Slinger..... | 919 | 1,141 | 1,022 | 1,612 |
| Towns | | | | |
| Addison | 1,672 | 2,072 | 2,375 | 2,834 |
| Barton | 1,029 | 1,204 | 1,624 | 2,493 |
| Erin..... | 995 | 1,133 | 1,641 | 2,455 |
| Farmington | 1,320 | 1,433 | 1,734 | 2,386 |
| Germantown | 2,100 | 3,984 | 416 | 267 |
| Hartford | 1,429 | 1,870 | 2,368 | 3,382 |
| Jackson | 1,299 | 1,576 | 2,844 | 3,180 |
| Kewaskum | 824 | 897 | 1,166 | 1,243 |
| Polk..... | 1,401 | 2,090 | 3,040 | 3,486 |
| Richfield | 2,077 | 3,172 | 5,923 | 8,390 |
| Trenton | 1,776 | 2,657 | 3,178 | 3,914 |
| Wayne..... | 1,128 | 1,081 | 1,214 | 1,471 |
| West Bend..... | 1,595 | 1,992 | 2,779 | 3,588 |
| Washington County | 33,902 | 46,119 | 63,839 | 84,848 |

^a The City of West Bend annexed parts of the Town of Barton in 1941 and 1949, attached a part of the Village of Barton in 1945, and annexed parts of the Town of West Bend in 1943, 1947, 1948, and 1949; and the City of Hartford annexed parts of the Town of Hartford in 1945, 1948, and 1949.

^b Since 1950, the Village of Kewaskum annexed a part of the Town of Kewaskum; the Village of Barton annexed a part of the Town of Barton; the City of West Bend annexed parts of the Town of West Bend; the City of Hartford annexed parts of the Town of Hartford; the Village of Jackson annexed parts of the Town of Jackson; the Town of Hartford attached a detached area of the City of Hartford; and the Village of Germantown annexed a part of the Town of Germantown.

^c Subsequent to 1960, parts of the Towns of Barton, Trenton, and West Bend were annexed by the City of West Bend; the Village of Barton was consolidated with the City of West Bend; part of the Town of Germantown was annexed by the City of Milwaukee and the Village of Germantown; part of the Town of Hartford was annexed by the City of Hartford; part of the Town of Jackson was annexed by the Village of Jackson; part of the Town of Kewaskum was annexed by the Village of Kewaskum; and part of the Town of Polk was annexed by the Village of Slinger.

^d The Village of Newburg was incorporated in 1973 from parts of the Town of Trenton in Washington County and the Town of Saukville in Ozaukee County. The population indicated above includes only that portion of the Village in Washington County.

Source: U. S. Bureau of the Census and SEWRPC.

Table 4

**OVERALL POPULATION DENSITY OF CIVIL
DIVISIONS IN WASHINGTON COUNTY: 1980**

| Civil Division | Population | Area Within Corporate Limits (square miles) | Persons per Square Miles |
|---------------------------|------------|---|-----------------------------|
| Cities^a | | | |
| Hartford | 7,046 | 2.9 | 2,429 |
| West Bend..... | 21,484 | 8.4 | 2,558 |
| Villages | | | |
| Germantown | 10,729 | 34.6 | 310 |
| Jackson | 1,817 | 3.4 | 534 |
| Kewaskum | 2,381 | 1.2 | 1,984 |
| Newburg | 688 | 0.7 | 983 |
| Slinger..... | 1,612 | 2.5 | 645 |
| Towns | | | |
| Addison | 2,834 | 36.3 | 78 |
| Barton | 2,493 | 20.5 | 122 |
| Erin..... | 2,455 | 36.4 | 67 |
| Farmington | 2,386 | 36.7 | 65 |
| Germantown | 267 | 1.6 | 167 |
| Hartford | 3,382 | 33.8 | 100 |
| Jackson | 3,180 | 33.1 | 96 |
| Kewaskum | 1,243 | 23.1 | 54 |
| Polk..... | 3,486 | 33.6 | 104 |
| Richfield | 8,390 | 36.1 | 232 |
| Trenton | 3,914 | 34.6 | 113 |
| Wayne..... | 1,471 | 36.0 | 41 |
| West Bend..... | 3,588 | 20.1 | 178 |

^a Does not include the City of Milwaukee, as that portion of the City which exists in Washington County is negligible.

Source: SEWRPC.

IDENTIFICATION OF SPECIAL POPULATION GROUPS

Six special population groups were considered in the study because, historically, members of these groups have had less access to the automobile as a form of travel than the population in general and, therefore, have had to rely more heavily on alternative transportation modes for mobility. These groups include the elderly, minorities, low-income families, the handicapped, school-age children, and those persons living in households with no automobiles available. Information about these groups within Washington County was obtained primarily from U. S. Census data. Since detailed data about these groups from the 1980 U. S. Census will not be available until late in 1981 at the earliest, and since the cost of conducting special surveys to obtain current data estimates for these groups would be prohibitive to this study,

the 1970 U. S. Census was the primary data source utilized. Whenever possible, the 1970 census information has been supplemented with more current information. Selected population characteristics for the 13 census tracts in Washington County are set forth in Table 5. The census tract boundaries are shown on Map 4.

The Elderly

In 1970 there were approximately 2,900 individuals in the County who were 65 years of age or older, comprising about 5 percent of the total county population. Countywide estimates of the 1980 elderly population prepared by the Wisconsin Department of Administration indicate that about 7,500 individuals in Washington County, or about 9 percent of the total 1980 county population, were 65 years of age or older, and that about 10,600 individuals, or about 12 percent of the total 1980 county population, were 60 years of age or older. As can be seen in Table 5, there were no significant concentrations of elderly population in any census tract within the County in 1970. However, places frequently used by the elderly for care and recreational purposes have been identified, along with the location of all nursing homes, retirement homes, elderly housing complexes, and senior centers within the County in 1981. These facilities are listed in Table 6 and located on Map 5.

Minorities

For the purpose of this study, a minority individual was defined as one belonging to a racial group other than Caucasian. Minorities, as shown in Table 5, accounted for less than 1 percent of the total population of the County in 1970. As shown in the table, there were no significant concentrations of any minority group in any census tract within the County in 1970.

Low-Income Families

The results of the 1970 U. S. Census indicated that about 700 persons in Washington County, or about 1 percent of the total population of the County, lived in households with incomes below the federal poverty level.¹ As indicated in Table 5, there were no significant concentrations of low-income families in any census tract within the County in 1970.

Handicapped

Section 55.01(13) of the Wisconsin Statutes prohibits the release of names and addresses of handicapped clients of the Wisconsin Department of Health and Social Services, Division of Vocational Rehabilitation. Therefore, the locations of such individuals cannot be readily ascertained. It is possible, however, to identify the locations frequently used by the handicapped for residential care or educational purposes. The locations include training centers, nursing homes, group homes, and schools with special education facilities. Such facilities in the County are listed in Table 7 and located on Map 6.

¹Below are 1969 poverty thresholds for nonfarm families, as defined by the U. S. Census Bureau:

| <i>Family Size (no. of persons)</i> | <i>Poverty Threshold (1969 dollars)</i> | <i>Family Size (no. of persons)</i> | <i>Poverty Threshold (1969 dollars)</i> |
|---|---|---|---|
| 1 | \$1,840 | 5 | \$4,415 |
| 2 | 2,383 | 6 | 4,958 |
| 3 | 2,924 | 7 or More | 6,101 |
| 4 | 3,743 | | |

Table 5

**SELECTED POPULATION CHARACTERISTICS OF WASHINGTON
COUNTY AS APPROXIMATED BY CENSUS TRACT: 1970**

| Census Tract Number | Tract Population | School-Age Children ^a | | Elderly ^b | | Members of Low-Income Families ^c | | Minorities ^d | | Total Number of Households | Households with Zero- Automobile Ownership | |
|---------------------------|---------------------|-------------------------------------|-----------------------------------|----------------------|-----------------------------------|--|-----------------------------------|-------------------------|-----------------------------------|----------------------------------|---|-----------------------------------|
| | | Number | Percent of Total Population | Number | Percent of Total Population | Number | Percent of Total Population | Number | Percent of Total Population | | Number of Households | Percent of Total Households |
| 4001 | 4,912 | 540 | 11.0 | 184 | 3.7 | 78 | 1.6 | 13 | -- | 1,247 | 60 | 4.8 |
| 4101 | 3,092 | 327 | 10.6 | 120 | 3.9 | 50 | 1.6 | 29 | 0.1 | 928 | 95 | 10.2 |
| 4201 | 8,262 | 815 | 9.9 | 440 | 5.3 | 58 | 0.7 | 12 | -- | 2,288 | 125 | 5.5 |
| 4202 | 4,241 | 516 | 12.2 | 238 | 5.6 | 35 | 0.8 | 14 | -- | 1,236 | 64 | 5.2 |
| 4203 | 4,564 | 433 | 9.5 | 277 | 6.1 | 21 | 0.5 | 14 | -- | 1,162 | 59 | 5.1 |
| 4204 | 3,891 | 388 | 10.0 | 238 | 6.1 | 58 | 1.5 | 71 | 1.8 | 1,273 | 276 | 21.7 |
| 4301 | 3,589 | 425 | 11.8 | 134 | 3.7 | 62 | 1.7 | 3 | -- | 865 | 50 | 5.8 |
| 4401 | 5,847 | 660 | 11.3 | 243 | 4.2 | 62 | 1.1 | 45 | 0.1 | 1,571 | 88 | 5.6 |
| 4402 | 4,661 | 438 | 9.4 | 356 | 7.6 | 60 | 1.3 | 80 | 1.7 | 1,532 | 240 | 15.6 |
| 4501 | 7,467 | 837 | 11.2 | 283 | 3.8 | 80 | 1.1 | 37 | -- | 1,951 | 56 | 2.9 |
| 4601 | 5,923 | 672 | 11.3 | 162 | 2.7 | 62 | 1.0 | 133 | 2.2 | 1,460 | 44 | 3.0 |
| 4701 | 3,586 | 380 | 10.6 | 105 | 2.9 | 31 | 0.9 | 5 | -- | 937 | 39 | 4.2 |
| 4702 | 3,804 | 456 | 12.0 | 75 | 2.0 | 37 | 1.0 | 36 | 0.1 | 935 | 35 | 3.7 |
| Total | 63,839 | 6,887 | 10.8 | 2,855 | 4.5 | 694 | 1.1 | 492 | 0.1 | 17,385 | 1,231 | 7.1 |

^aAges 10-19 inclusive.

^bAges 65 and older.

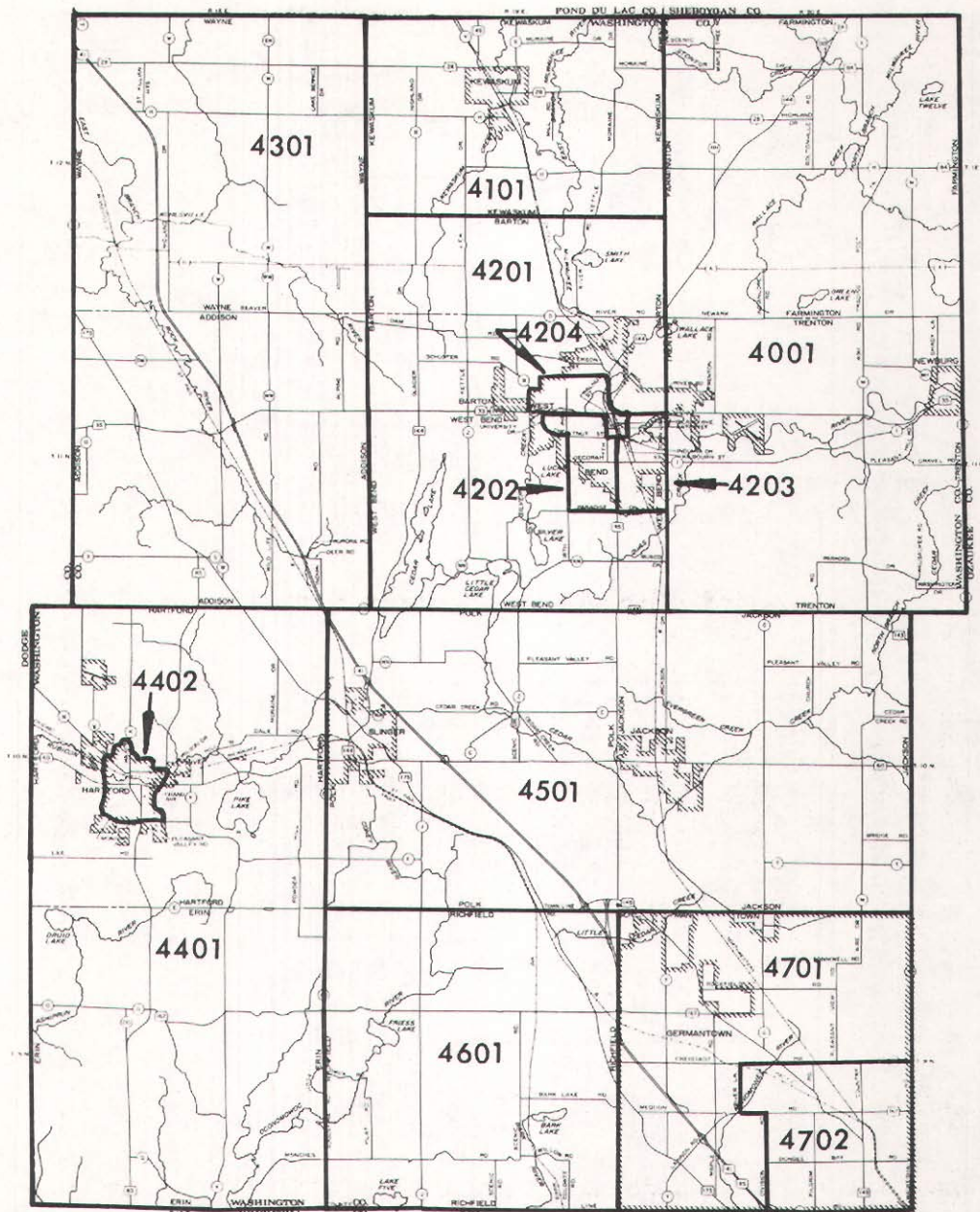
^cMembers of families with incomes below the federal poverty threshold.

^dNonwhite--includes persons of Hispanic origin.

Source: U. S. Bureau of the Census and SEWRPC.

Map 4

CENSUS TRACT LOCATIONS IN WASHINGTON COUNTY: 1970



LEGEND

— Census Tract Boundary

4402 Census Tract Number

Source: U.S. Bureau of the Census
and SEWRPC.

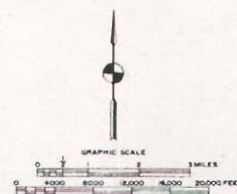


Table 6

FACILITIES FOR THE ELDERLY IN WASHINGTON COUNTY: 1981

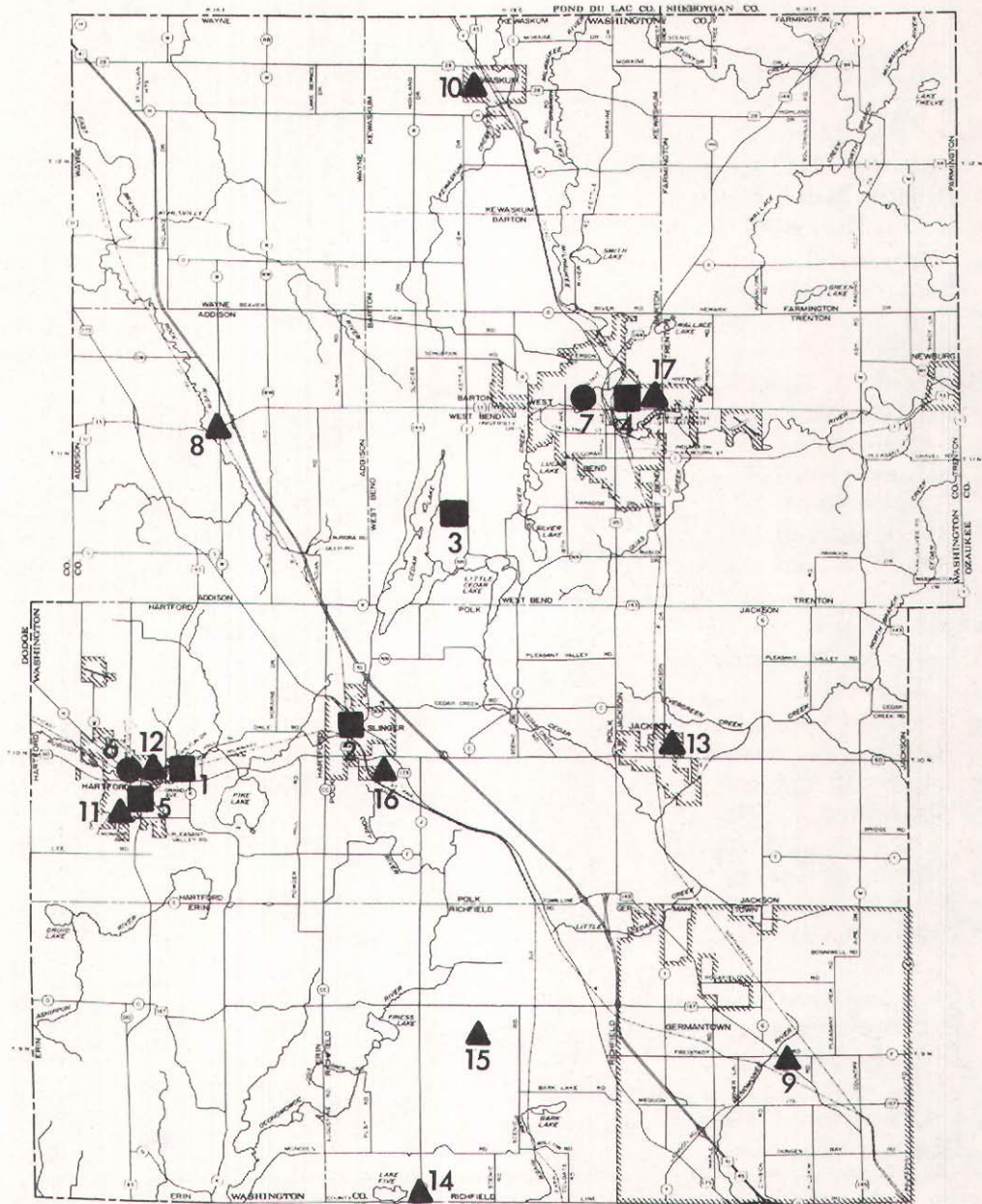
| Code Number on Map 5 | Facility | Number of Units | Number of Residents | Number of Staff | Location |
|----------------------------|---|-----------------------|---------------------------|-----------------------|-----------------------|
| | Nursing Homes^a | | | | |
| 1 | Gateway Nursing Home | 115 | 113 | 109 | City of Hartford |
| 2 | Hilltop Rest Home | 8 | 8 | 11 | Village of Slinger |
| 3 | Cedar Lake Home for the Aged..... | 384 | 379 | 345 | Town of West Bend |
| 4 | Samaritan Home..... | 247 | 243 | 228 | City of West Bend |
| 5 | Tri Manor, Ltd. | 10 | 10 | 6 | City of Hartford |
| | Retirement Homes and Housing Complexes | | | | |
| 6 | Harthaven..... | 45 | 47 | -- | City of Hartford |
| 6 | Hilgart Rental Investments | 32 | 35 | -- | City of Hartford |
| 7 | Meadowbrook Manor... | 73 | 78 | -- | City of West Bend |
| 7 | Meadowbrook Manor II | 74 | 80 | -- | City of West Bend |
| | Senior Centers | Participants | | | |
| 8 | Legion Auxiliary Clubhouse..... | | 25 | | Town of Addison |
| 9 | Germantown Senior Center | | 90 | | Village of Germantown |
| 10 | American Legion Hall . | | 55 | | Village of Kewaskum |
| 11 | Redeemer Lutheran Church..... | | 150 | | City of Hartford |
| 12 | Hartford Recreation Center | | 50 | | City of Hartford |
| 13 | Christ Evangelical Lutheran Church | | 50 | | Village of Jackson |
| 14 | St. Columban Church. | | 40 | | Town of Richfield |
| 15 | Richfield Town Hall... | | 75 | | Town of Richfield |
| 16 | Slinger Municipal Building..... | | 55 | | Village of Slinger |
| 17 | Washington County Senior Center | | 200 | | City of West Bend |

^a Figures for nursing homes reflect the number of beds presently available.

Source: Washington County Office on Aging and SEWRPC.

Map 5

LOCATION OF FACILITIES FOR THE ELDERLY IN WASHINGTON COUNTY: 1981



LEGEND

Facility for the Elderly: 1981 (see Table 6)

- 1 ■ Nursing Home
- 6 ● Housing Complex
- 8 ▲ Senior Center

Source: Washington County Office on Aging and SEWRPC.

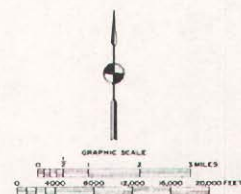


Table 7

FACILITIES FOR THE HANDICAPPED IN WASHINGTON COUNTY: 1981

| Code Number on Map 6 | Facility | Location |
|----------------------|---|--------------------|
| 1 | Referral Services | |
| 2 | The Threshold, Inc. ^a | City of West Bend |
| | Developmental Disabilities Services, Inc..... | City of West Bend |
| | Housing Facilities ^b | |
| 3 | Hartford Group Home..... | City of Hartford |
| 4 | West Bend Group Home..... | City of West Bend |
| 5 | Cedar House | City of West Bend |
| | Nursing Homes | |
| 6 | Gateway Nursing Home | City of Hartford |
| 7 | Hilltop Rest Home | Village of Slinger |
| 8 | Cedar Lake Home for the Aged | Town of West Bend |
| 9 | Samaritan Home..... | City of West Bend |
| 10 | Tri Manor, Ltd..... | City of Hartford |
| | Educational Facilities | |
| 11 | Moraine Park Technical Institute.... | City of West Bend |

^aThe Threshold, Inc., also provides sheltered employment for the handicapped.

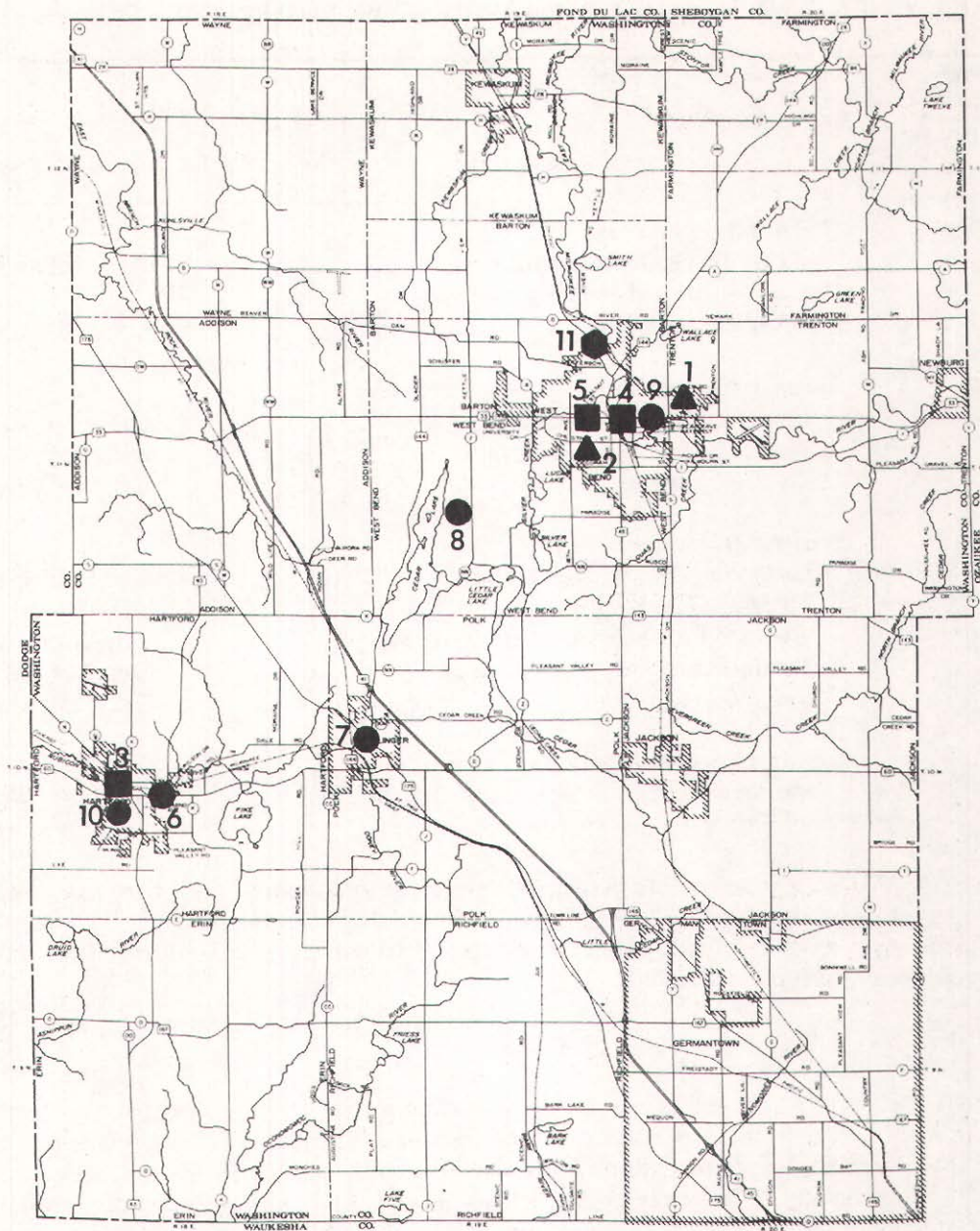
^bA group home for the handicapped and developmentally disabled will be opening in Germantown in the summer of 1981.

Source: SEWRPC.

As noted in Chapter II of this report, in August 1976 the Regional Planning Commission undertook a comprehensive study to determine the special transportation needs of transportation handicapped persons in southeastern Wisconsin and how to accommodate those needs effectively. In preparing that plan, estimates of the number of transportation handicapped persons residing within the seven counties comprising the Southeastern Wisconsin Region, including Washington County, were obtained through the application of incidence rates obtained from secondary source materials to 1975 estimates of total resident population as estimated by the Wisconsin Department of Administration. Transportation handicapped persons are defined as elderly and handicapped persons who, because of illness, injury, age, congenital malfunction, or other permanent or temporary incapacity or disability, including those who are wheelchair-bound and those with semi-ambulatory capabilities, are unable, without special facilities or special design, to utilize public transit facilities and services as effectively as those persons who are not so affected. Table 8 indicates the estimated number of transportation handicapped persons residing in Washington County by type of limitation. As shown in the table, nearly 2,700 persons in Washington County, or about 4 percent of the 1975 estimated total population of the County of about 77,000 persons, were found to be transportation handicapped. Of these 2,700 persons, about

Map 6

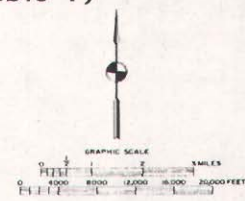
LOCATION OF FACILITIES FOR THE HANDICAPPED IN WASHINGTON COUNTY: 1981



LEGEND

Facility for the Handicapped (see Table 7)

- 1 ▲ Referral Facility
- 3 ■ Housing Facility
- 6 ● Nursing Home
- 11 ● Educational Facility



Source: Washington County Department of
Social Services and SEWRPC.

1,800, or nearly two-thirds, were estimated to be chronically disabled persons residing in private households.

School-Age Children

In 1970, school-age children--persons in the 10- to 19-year age group--constituted about 11 percent of the resident population of Washington County (see Table 5). However, there were no significant concentrations of school-age children in any census tract within the County. The locations of major educational facilities--universities, colleges, and technical schools--in the County are set forth in a later section of this chapter.

Zero-Auto Households

One of the most reliable indicators of potential transit use is automobile availability. Those households which do not own an automobile are dependent upon other persons or other transportation modes for the provision of essential transportation services. The 1970 U. S. Census of Population indicated that approximately 7 percent of the households within Washington County did not have an automobile available. As shown in Table 5, census tracts 4204, 4402, and 4101, representing parts of the City of West Bend, the City of Hartford, and the Kewaskum area, respectively, contained the heaviest concentrations of such households--22 percent, 16 percent, and 10 percent, respectively. Map 7 shows the location of census tracts containing concentrations of housing units without automobiles available. In addition to persons residing

Table 8

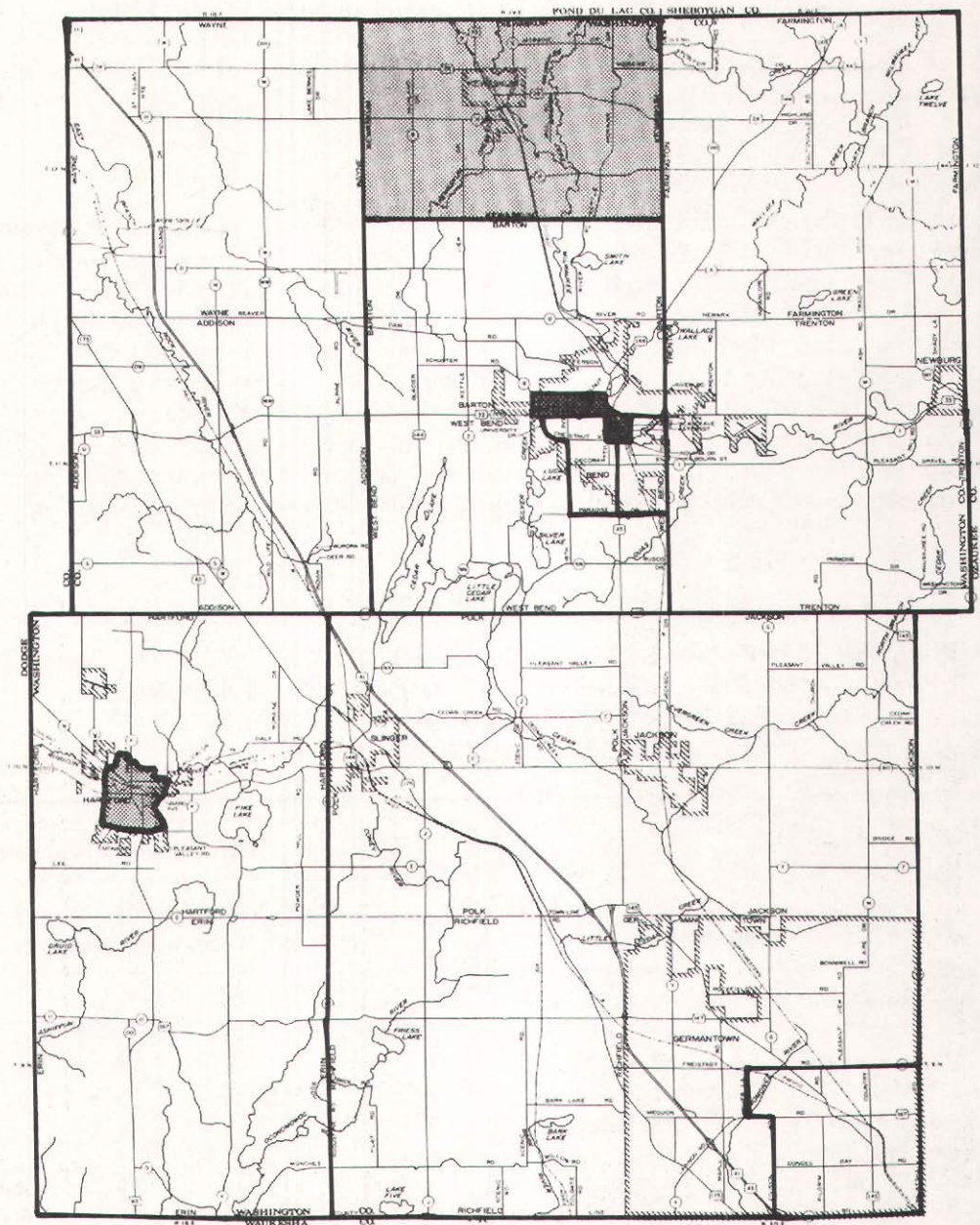
**ESTIMATES OF TRANSPORTATION HANDICAPPED PERSONS
IN WASHINGTON COUNTY BY TYPE OF LIMITATION AS
DERIVED FROM INCIDENCE RATES BASED ON
SECONDARY SOURCE DATA: 1975**

| Type of Limitation | Transportation Handicapped Persons | | |
|--|------------------------------------|---------------------|------------------|
| | Number | Percent of Category | Percent of Total |
| Chronically Disabled Living in Private Households by Mobility Limitation | | | |
| Has Trouble Getting Around..... | 778 | 42.8 | 29.3 |
| Uses Aid Other Than Wheelchair..... | 335 | 18.4 | 12.6 |
| Needs Help From Another Person | 178 | 9.8 | 6.7 |
| Uses Wheelchair | 126 | 6.9 | 4.8 |
| Confined to House..... | 402 | 22.1 | 15.1 |
| Subtotal | 1,819 | 100.0 | 68.5 |
| Acutely Disabled | 209 | 100.0 | 7.9 |
| Institutionalized | 627 | 100.0 | 23.6 |
| Total Transportation Handicapped Persons | 2,655 | -- | 100.0 |

Source: SEWRPC.

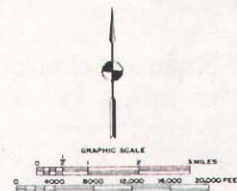
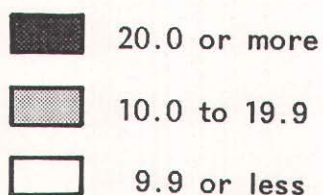
Map 7

CONCENTRATIONS OF OCCUPIED HOUSING UNITS WITHOUT AUTOMOBILES AVAILABLE IN WASHINGTON COUNTY: 1970



LEGEND

Percent of census tract households
with zero automobile ownership



Source: U.S. Bureau of the Census and SEWRPC.

Table 9

**PERCENT OF HOUSEHOLDS BY AUTOMOBILE OWNERSHIP
FOR WASHINGTON COUNTY COMMUNITIES: 1972**

| Civil Division | Percent of Total Households by Automobile Ownership | | |
|---------------------------|--|-----------------|-----------------|
| | Zero or One | Two or More | Total |
| Cities^a | | | |
| Hartford | 74 | 26 | 100 |
| West Bend..... | 49 | 51 | 100 |
| Villages | | | |
| Germantown | 27 | 73 | 100 |
| Jackson | 61 | 39 | 100 |
| Kewaskum | 57 | 43 | 100 |
| Newburg | 40 | 60 | 100 |
| Slinger..... | 51 | 49 | 100 |
| Towns | | | |
| Addison | 26 | 74 | 100 |
| Barton | 15 | 85 | 100 |
| Erin..... | 17 | 83 | 100 |
| Farmington | 35 | 65 | 100 |
| Germantown | -- ^b | -- ^b | -- ^b |
| Hartford | 43 | 57 | 100 |
| Jackson | 30 | 70 | 100 |
| Kewaskum | 21 | 79 | 100 |
| Polk..... | 26 | 74 | 100 |
| Richfield | 24 | 76 | 100 |
| Trenton | 19 | 81 | 100 |
| Wayne..... | 27 | 73 | 100 |
| West Bend..... | 40 | 60 | 100 |

^a Does not include the City of Milwaukee, as that portion of the City which exists within the County is negligible.

^b Included in the Village of Germantown.

Source: SEWRPC.

in zero-automobile households, persons residing in one-automobile households represent potential users of public transportation. In those households where a single automobile is available and it is preempted for use by some member or members of the household, the remaining household members become dependent upon others for trip-making. The 1972 home interview survey conducted by the Commission gathered information on the number of autos available by household. Based on information gathered in this survey, Table 9 indicates the percent of total households in each Washington County community owning no automobile or one automobile in 1972. The 1972 Commission

inventory of travel indicated that approximately 43 percent of the households within Washington County owned either no automobile or one automobile. Major concentrations of zero- and one-automobile households are located in the Cities of Hartford and West Bend and Villages of Jackson, Kewaskum, and Slinger.

MAJOR TRAFFIC GENERATORS

For public transit planning purposes, major traffic generators are defined as specific land uses, or concentrations of such uses, which attract a relatively large number of person trips and, therefore, have the potential to attract a relatively large number of transit trips. The following categories of land uses were identified as major traffic generators for public transit planning purposes within Washington County: 1) shopping centers, 2) major educational institutions, 3) hospitals and medical centers, 4) major governmental and public institutional centers, 5) major employment centers, and 6) recreational areas.

Shopping Centers

For countywide transit planning purposes, two classifications of shopping centers were identified as potential major transit trip generators. The first classification consists of major regional shopping centers, defined by the Commission as concentrations of retail and service establishments within central business districts, strip shopping districts, and shopping centers which meet at least five of the following six criteria:

1. Contain at least two department stores.
2. Contain 10 additional retail and service establishments.
3. Generate a combined average annual sales total of \$30 million or more.
4. Have a combined net site area totaling 20 or more acres.
5. Are able to attract at least 3,000 shopping trips per average weekday.
6. Are accessible to a population of at least 100,000 persons within a radius of 10 miles or within 20 minutes one-way travel time.

At the present time, there is only one major regional shopping center, the West Bend central business district, within the study area. The second classification of shopping centers consists of community and neighborhood shopping centers, defined by the Commission as those areas having a site area ranging from 5 to 60 acres, intended to serve the retail and service needs of the population of from one to five residential neighborhoods. Using these criteria, one proposed and six existing community and neighborhood shopping areas were identified within Washington County. Table 10 and Map 8 indicate the location of the major regional and community and neighborhood shopping centers identified in Washington County.

Educational Institutions

Technical schools, colleges, and universities were identified as potential countywide transit trip generators within Washington County. Public elementary, middle, and senior high schools and parochial schools were not considered to be major trip generators for countywide public transit service because students at these schools generally live in surrounding communities and either are able to walk to school or are provided with yellow school bus service. Two major educational institutions in

Table 10

SHOPPING CENTERS IN WASHINGTON COUNTY: 1981

| Code Number on Map 8 | Shopping Center | Location |
|----------------------|---|-----------------------|
| 1 | Regional West Bend Central Business District..... | City of West Bend |
| 2 | Community and Neighborhood Kewaskum Central Business District..... | Village of Kewaskum |
| 3 | Washington Square Shopping Center..... | Village of Germantown |
| 4 | Slinger Shopping Center..... | Village of Slinger |
| 5 | Hartford Central Business District..... | City of Hartford |
| 6 | E. Sumner Street Strip Development..... | City of Hartford |
| 7 | Richfield Plaza Shopping Center..... | Town of Richfield |
| 8 | West Bend Shopping Mall (proposed)..... | City of West Bend |

Source: SEWRPC.

Washington County, the University of Wisconsin-Washington County and Moraine Park Technical Institute, were identified as major trip generators for the purpose of this study, and are located on Map 9.

Hospitals and Medical Centers

For transit planning purposes, a community medical center is defined as a hospital having at least 100 beds, and providing both in- and out-patient facilities and related laboratory and clinical services. There are two community medical centers in Washington County: Hartford Memorial Hospital in the City of Hartford and St. Joseph's Community Hospital in the City of West Bend. The special medical center category is defined to include all other major medical centers and special clinics. The major medical facilities identified in Washington County are listed in Table 11 and their locations are shown on Map 10.

Governmental and Public Institutional Centers

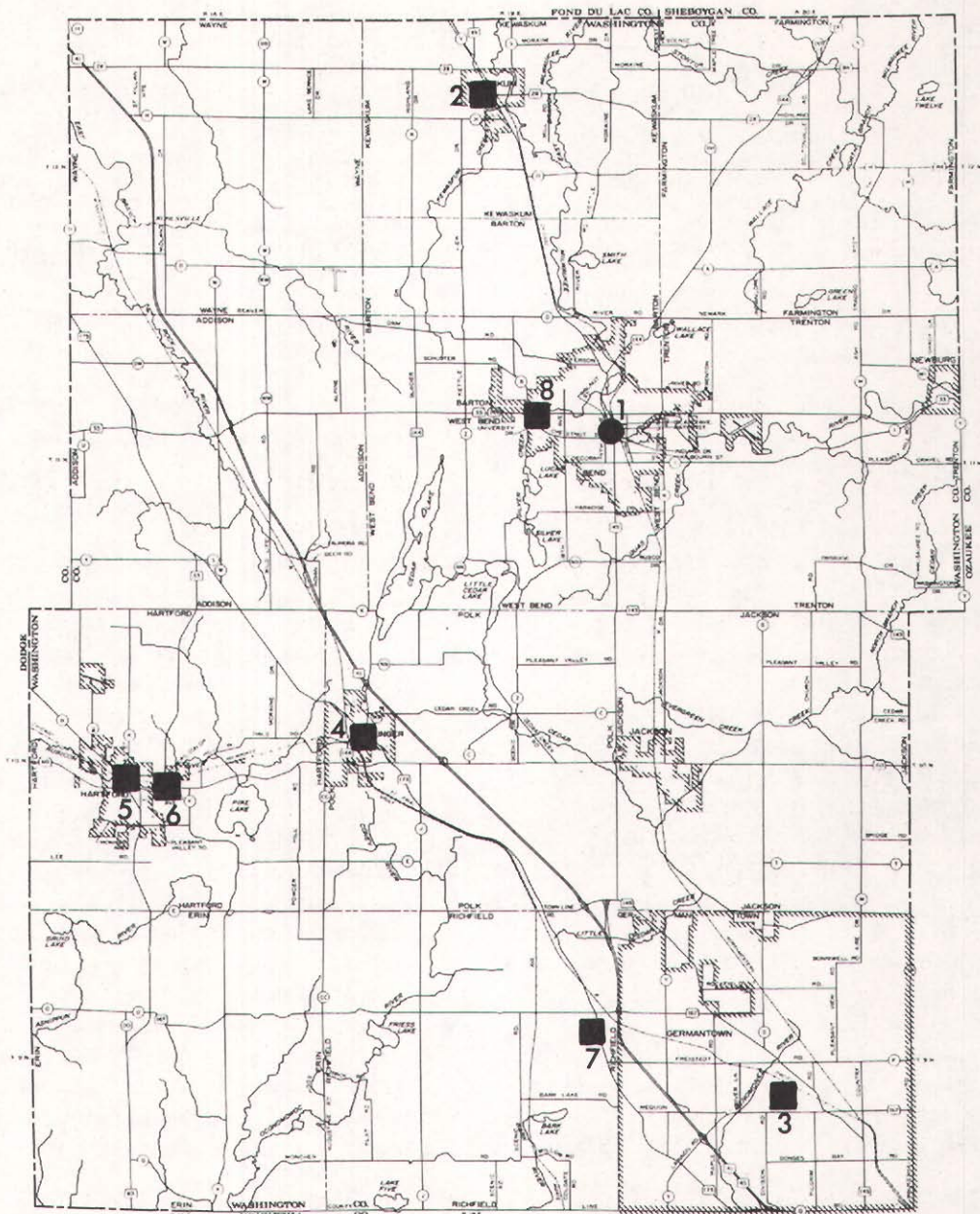
Governmental and public institutional centers are considered to be potential major transit trip generators because they provide governmental services to which every citizen should have ready access. For the purposes of this study, this category includes regional and county governmental and public institutional centers, such as the Washington County Courthouse and the West Bend Community Memorial Library, where the service is oriented toward more than one community. Also included in this category are certain local public institutional centers, such as public libraries, which, while designed to serve one community, may attract users from surrounding communities. The major governmental and public institutional centers identified in Washington County are listed in Table 12 and their locations are shown on Map 11.

Employment Centers

Trips made from home to work and back constitute a significant proportion of all person trips made within the Region and within Washington County. It is, therefore, appropriate to identify the major employment centers within the County as major generators of travel. Employment centers identified as major traffic generators were limited to public and private establishments employing 100 or more people. A listing of these major employment centers and the attendant current employment is presented in Table 13 and the locations of these centers are shown on Map 12. About 10,800 persons, representing nearly 25 percent of the estimated 1980 labor force of 43,700 persons employed within the County, were employed at these major centers during 1980.

Map 8

LOCATION OF SHOPPING CENTERS IN WASHINGTON COUNTY: 1981



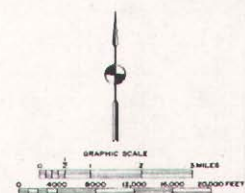
LEGEND

Shopping Center (see Table 10)

1 ● Regional

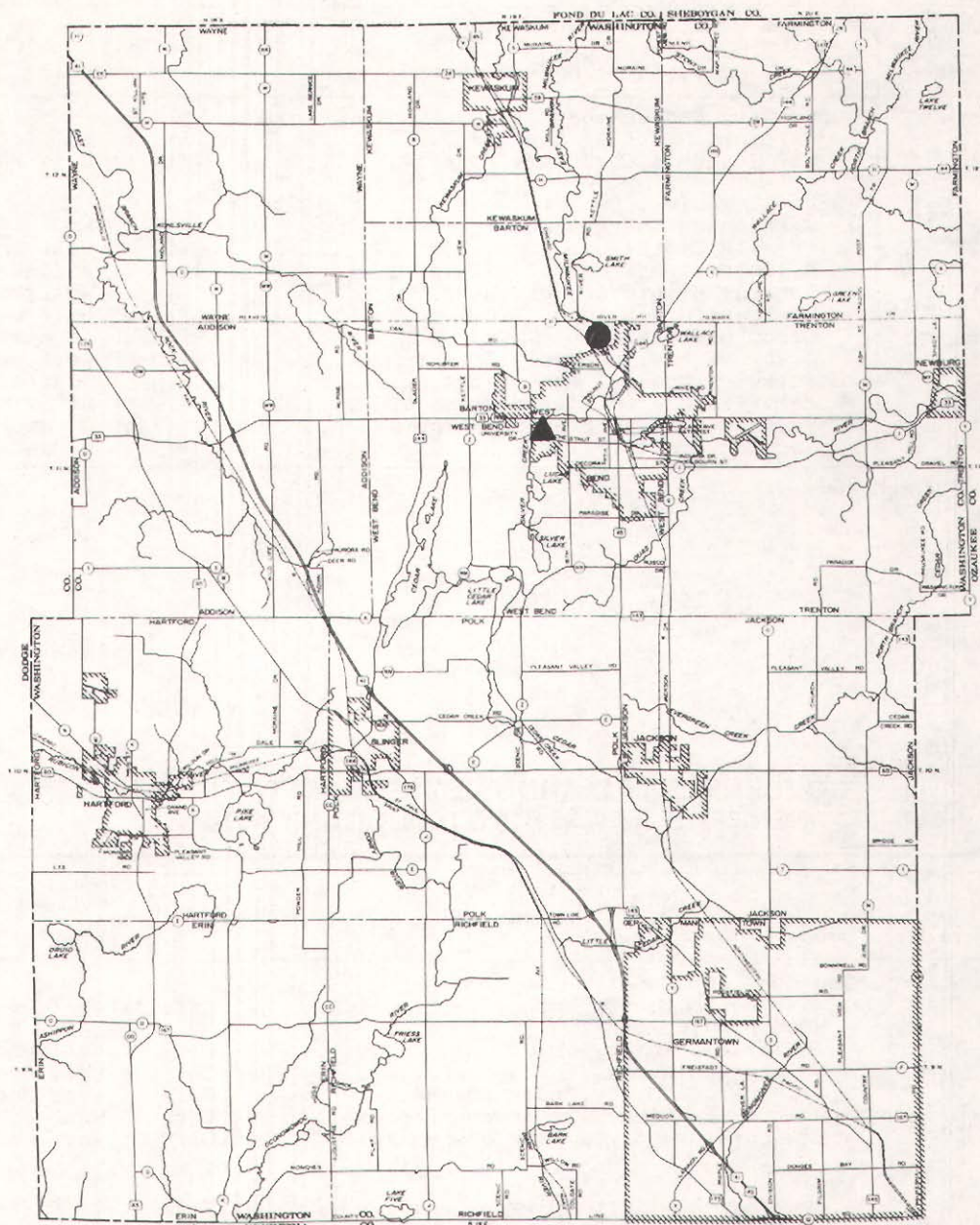
2 ■ Community and Neighborhood

Source: SEWRPC.



Map 9

LOCATION OF MAJOR EDUCATIONAL INSTITUTIONS IN WASHINGTON COUNTY: 1981



LEGEND

- ▲ University of Wisconsin-Washington County
- Moraine Park Technical Institute

Source: SEWRPC.

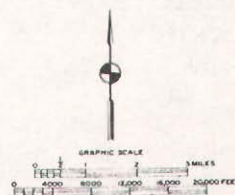


Table 11

**COMMUNITY AND SPECIAL MEDICAL CENTERS
IN WASHINGTON COUNTY: 1981**

| Code Number on Map 10 | Hospital or Medical Center | Location |
|-----------------------------|--|---------------------|
| 1 | Community Medical Centers | |
| 2 | Hartford Memorial Hospital..... | City of Hartford |
| | St. Joseph's Community Hospital..... | City of West Bend |
| 3 | Special Medical Centers | |
| | Washington County Mental | |
| | Health Center..... | City of West Bend |
| 4 | Allenton Area Medical Clinic..... | Town of Addison |
| 5 | General Clinic of West Bend..... | City of West Bend |
| 6 | The Hartford Clinic, S.C..... | City of Hartford |
| 7 | Sison Medical Clinic, Ltd..... | Village of Kewaskum |
| 8 | Oakbrook Family Physicians, S.C..... | City of West Bend |
| 9 | Parkview Medical Associates, Ltd..... | City of Hartford |
| 10 | Parkview Medical Associates, Ltd..... | Village of Slinger |
| 11 | Jackson Medical Service Corporation... | Village of Jackson |
| 12 | Jackson General Clinic..... | Village of Jackson |

Source: SEWRPC.

Table 12

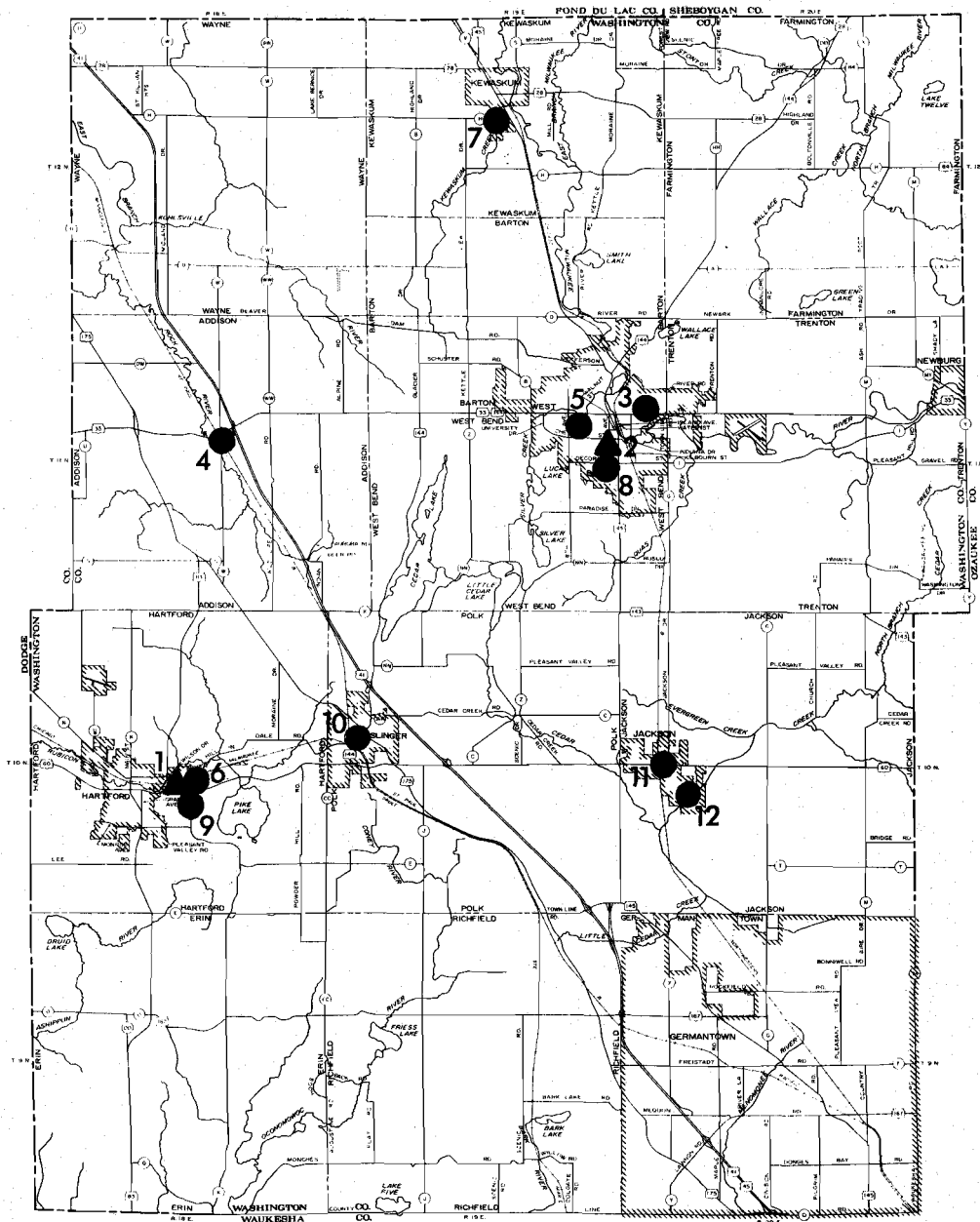
**GOVERNMENTAL AND PUBLIC INSTITUTIONAL
CENTERS IN WASHINGTON COUNTY: 1981**

| Code Number on Map 11 | Center | Location |
|-----------------------------|--|-----------------------|
| 1 | Regional and County | |
| 2 | Washington County Museum..... | City of West Bend |
| | West Bend Community | |
| | Memorial Library..... | City of West Bend |
| 3 | Washington County Courthouse..... | City of West Bend |
| 4 | Washington County Courthouse-Annex I.. | City of West Bend |
| 5 | Washington County Courthouse-Annex II. | City of West Bend |
| 6 | Law Enforcement/Corrections Building.. | City of West Bend |
| 7 | Local | |
| | Kewaskum Public Library..... | Village of Kewaskum |
| 8 | Kewaskum Historical Museum..... | Village of Kewaskum |
| 9 | Duerrwaechter Memorial Library..... | Village of Germantown |
| 10 | Church Museum of Germantown..... | Village of Germantown |
| 11 | Hartford Public Library..... | City of Hartford |
| 12 | Slinger Public Library..... | Village of Slinger |
| 13 | Richfield Public Library..... | Town of Richfield |
| 14 | Church Museum of Jackson..... | Village of Jackson |

Source: SEWRPC.

Map 10

LOCATION OF COMMUNITY AND SPECIAL MEDICAL CENTERS IN WASHINGTON COUNTY: 1981



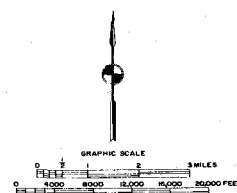
LEGEND

Medical Center (see Table 11)

1 ▲ Community Medical Center

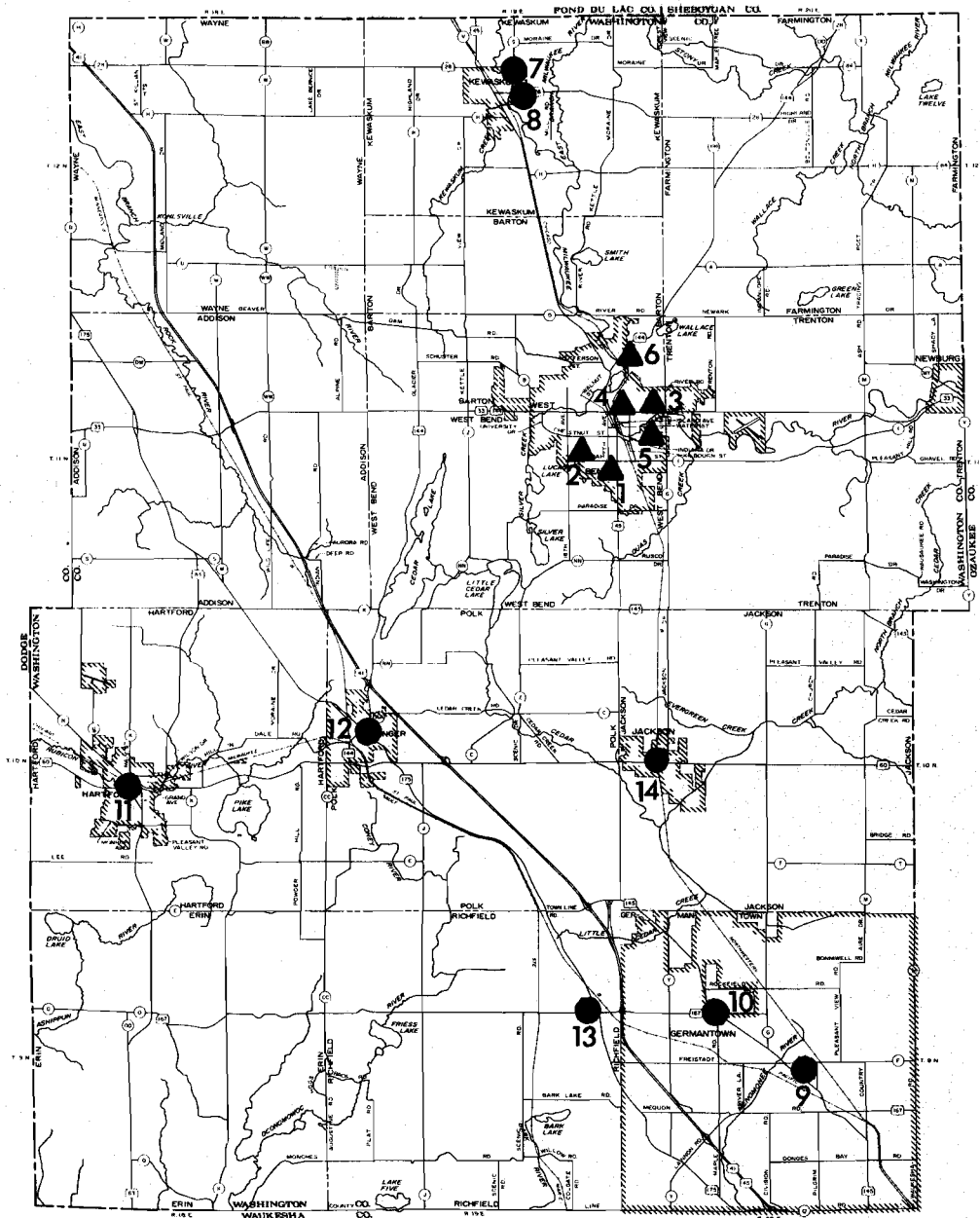
3 ● Special Medical Center

Source: SEWRPC.



Map 11

LOCATION OF GOVERNMENTAL AND PUBLIC INSTITUTIONAL CENTERS IN WASHINGTON COUNTY: 1981



LEGEND

Governmental/Public
Institutional Center (see Table 12)

1 ▲ Regional and County

7 ● Local

Source: SEWRPC.

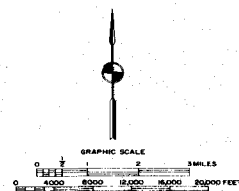


Table 13

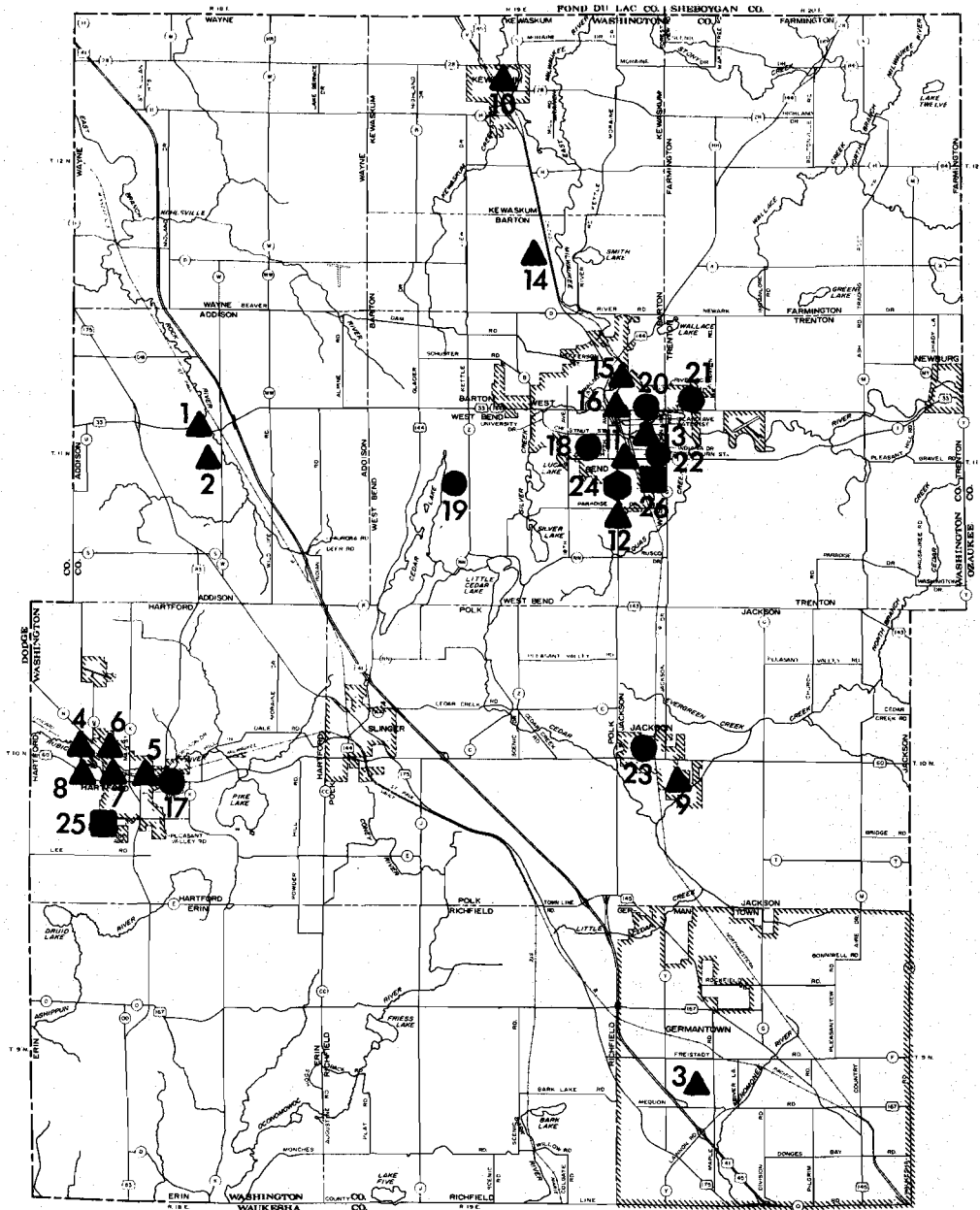
MAJOR EMPLOYMENT CENTERS IN WASHINGTON COUNTY: 1980

| Code Number on Map 12 | Employment Center | Location | Estimated 1980 Employment |
|-----------------------------|---|-----------------------|---------------------------------|
| | Industrial/Manufacturing | | |
| 1 | Kasten Manufacturing Corp..... | Town of Addison | 120 |
| 2 | Maysteel Corp.--Cabinetry Division..... | Town of Addison | 275 |
| 3 | KSM Industries, Inc..... | Village of Germantown | 100 |
| 4 | Broan Manufacturing Company, Inc..... | City of Hartford | 575 |
| 5 | Chrysler Outboard Corp..... | City of Hartford | 700 |
| 6 | International Stamping Company, Inc..... | City of Hartford | 400 |
| 7 | Menasha Corp.--Hartford Container Plant... | City of Hartford | 100 |
| 8 | Micro Design--Division of Bell and Howell Company..... | Town of Hartford | 375 |
| 9 | EVCO Plastics Corp..... | Town of Jackson | 210 |
| 10 | Regal Ware, Inc..... | Village of Kewaskum | 660 |
| 11 | Amity Leather Products Company..... | City of West Bend | 900 |
| 11 | EIS Division, Parker Hannifin Corp..... | City of West Bend | 150 |
| 11 | Serigraph Sales and Manufacturing Company, Inc..... | City of West Bend | 320 |
| 12 | Bend Industries, Inc..... | City of West Bend | 175 |
| 13 | Gehl Company..... | City of West Bend | 1,100 |
| 14 | Weasler Engineering, Inc..... | Town of Barton | 180 |
| 15 | The West Bend Company..... | City of West Bend | 2,300 |
| 16 | B.C. Ziegler and Company..... | City of West Bend | 180 |
| | Governmental/Institutional | | |
| 17 | Hartford Memorial Hospital..... | City of Hartford | 285 |
| 17 | Gateway Nursing Home..... | Town of Hartford | 110 |
| 18 | St. Joseph's Community Hospital..... | City of West Bend | 425 |
| 19 | Cedar Lake Home for the Aged..... | Town of West Bend | 345 |
| 20 | Samaritan Home..... | City of West Bend | 230 |
| 21 | Washington County Courthouse..... | City of West Bend | 115 |
| 22 | Washington County Law Enforcement/ Corrections Building..... | City of West Bend | 100 |
| 23 | Searle Medical Products..... | Village of Jackson | 130 |
| | Commercial | | |
| 24 | West Bend Mutual Insurance..... | City of West Bend | 200 |
| | Educational | | |
| 25 | Hartford Union High School..... | City of Hartford | 105 |
| 26 | West Bend East and West High Schools..... | City of West Bend | 200 |

Source: 1981 Classified Directory of Wisconsin Manufacturers and SEWRPC.

Map 12

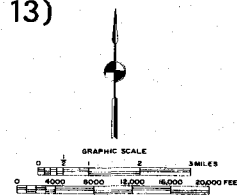
LOCATION OF MAJOR EMPLOYMENT CENTERS IN WASHINGTON COUNTY: 1980



LEGEND

Major Employment Center (see Table 13)

- 1 ▲ Industrial/Manufacturing
- 17 ● Governmental/Institutional
- 25 ■ Educational
- 24 ● Commercial



Source: 1981 Classified Directory of Wisconsin
Manufacturers and SEWRPC.

Recreational Areas

Recreational areas were grouped into two categories based on size, service area, and activities available. The first category consists of major regional recreational areas, defined as public recreation sites of at least 250 acres in size offering multiple recreation opportunities and having a multi-county service area. Only one major regional recreation area, Pike Lake State Park, is located within the County. The second category is comprised of multi-community recreational areas, defined as multiple-use public recreation sites which are county- or multi-community-oriented in service area, and which contain recreational facilities such as baseball or softball diamonds, swimming pools, or tennis courts. The major recreation areas identified within the County are listed in Table 14 and located on Map 13.

TRAVEL HABITS AND PATTERNS

Up to this point in this report, the analysis of the potential demand for transit service has consisted of the identification of transit-dependent population groups and major trip generators in order to determine the probable origins and destinations of potential transit riders in Washington County. The analysis is not complete, however, until an examination is made of the actual travel characteristics of the residents of the County.

In 1963, the Regional Planning Commission undertook a comprehensive inventory of travel habits and patterns within the Region to provide a benchmark of basic data for land use and transportation planning. In 1972 a new inventory of travel habits and patterns was undertaken by the Commission in order to determine the changes which had taken place in such habits and patterns over approximately a decade. The 1972 inventory included not only all the basic origin-destination surveys conducted under the 1963 regionwide travel inventories--namely, the home interview, truck and taxi, and external cordon surveys--but also, for the first time, five special origin-destination surveys. These surveys consisted of a public transit user survey; public transit

Table 14

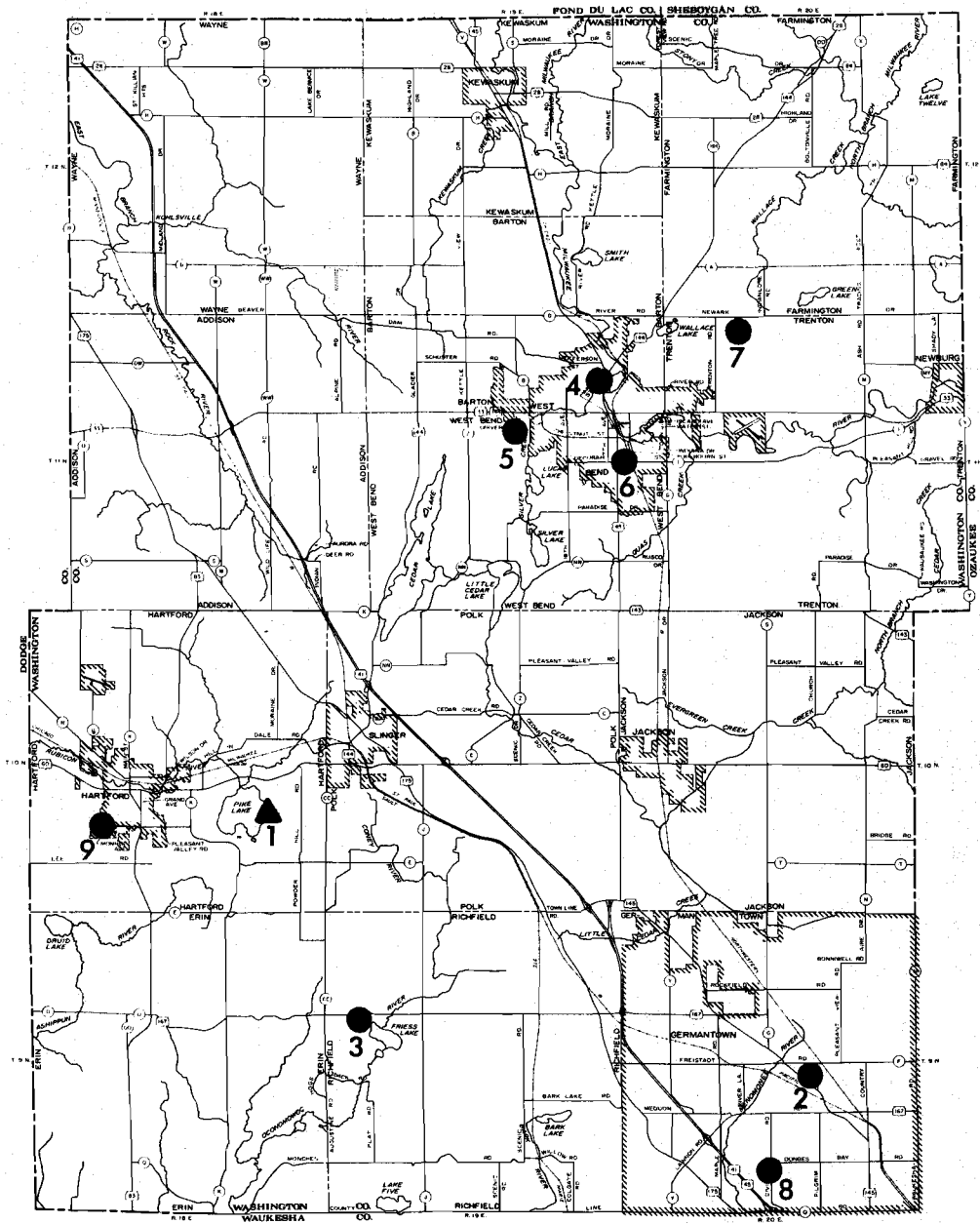
RECREATIONAL AREAS IN WASHINGTON COUNTY: 1981

| Code Number on Map 13 | Recreational Area | Location |
|-----------------------|---|-----------------------|
| 1 | Regional Pike Lake State Park | Town of Hartford |
| 2 | Multi-Community Firemen's Park | Village of Germantown |
| 3 | Glacier Hills County Park... | Town of Richfield |
| 4 | Regner Park | City of West Bend |
| 5 | Ridge Run County Park | Town of West Bend |
| 6 | Riverside Park | City of West Bend |
| 7 | Sandy Knoll County Park... | Town of Trenton |
| 8 | Spassland Park | Village of Germantown |
| 9 | Veterans' Memorial Park | City of Hartford |

Source: SEWRPC.

Map 13

LOCATION OF RECREATIONAL AREAS IN WASHINGTON COUNTY: 1981



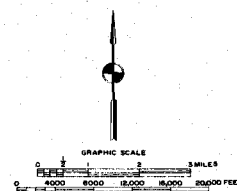
LEGEND

Recreational Area (see Table 14)

1 ▲ Regional

2 ● Multi-community

Source: SEWRPC.



nonuser survey; major traffic generator survey; interregional bus, rail, and carferry survey; and weekend home interview and weekend truck and taxi survey. Using the 1972 home interview data as a base, estimates of 1980 total person travel within the County have since been prepared by applying growth factors based in part on the changes in community population, county household size, and county employment which occurred between 1972 and 1980. An analysis of the 1980 total person travel characteristics and summary of the findings of the 1972 regional surveys pertinent to the feasibility of providing public transit service to Washington County is presented below.

Total Person Trip Characteristics

In the 1972 home interview survey, information was obtained from each sample household on the trips made on an average weekday by household members five years of age and older. Data were ascertained for trips both internal and external to Washington County. Using data available from the 1972 home interview survey and average growth factors determined as described above, estimates of total person travel for 1980 were prepared for Washington County. A breakdown of estimated 1980 total person travel for trips originating within Washington County is presented in Table 15. Of the 213,600 trips estimated to have originated within Washington County on an average weekday in 1980, about 180,700, or 85 percent, were made internal to the County and 32,900 trips, or 15 percent, were made external to the County. The locations of the external trip destinations are shown on Map 14. The two largest concentrations of external trip destinations were the Menomonee Falls area of Waukesha County, which attracted about 10,300 trips, and Milwaukee County, which attracted about 10,100 trips. The Milwaukee central business district is estimated to have attracted 1,200 trips from within the County.

The trip data were grouped into five categories of travel purpose: home-based work, home-based shopping, home-based other, nonhome-based, and school-based trips. Home-based work trips are defined as those trips having one end at home and the other end at work. Home-based shopping trips are defined as those trips having one end at home and the other end at a shopping destination. Home-based other trips are defined as those trips having one end at home and the other end at any location except home, school, work, or shopping areas. Nonhome-based trips are those trips that neither originate nor end at home or school. School-based trips are those trips having at least one end at school. Of the total number of trips estimated to have been generated

Table 15

ESTIMATED TOTAL PERSON TRIPS ORIGINATING WITHIN WASHINGTON COUNTY: 1980

| Trip Purpose | Internal | | External | | Total | |
|--------------------------|-----------------|------------------|-----------------|------------------|-----------------|------------------|
| | Number of Trips | Percent of Total | Number of Trips | Percent of Total | Number of Trips | Percent of Total |
| Home-based Work..... | 42,200 | 23.4 | 12,900 | 39.2 | 55,100 | 25.8 |
| Home-based Shopping..... | 26,100 | 14.4 | 4,400 | 13.4 | 30,500 | 14.3 |
| Home-based Other..... | 69,200 | 38.3 | 10,900 | 33.1 | 80,100 | 37.5 |
| Nonhome Based..... | 21,400 | 11.8 | 2,900 | 8.8 | 24,300 | 11.4 |
| School Based..... | 21,800 | 12.1 | 1,800 | 5.5 | 23,600 | 11.0 |
| Total | 180,700 | 100.0 | 32,900 | 100.0 | 213,600 | 100.0 |

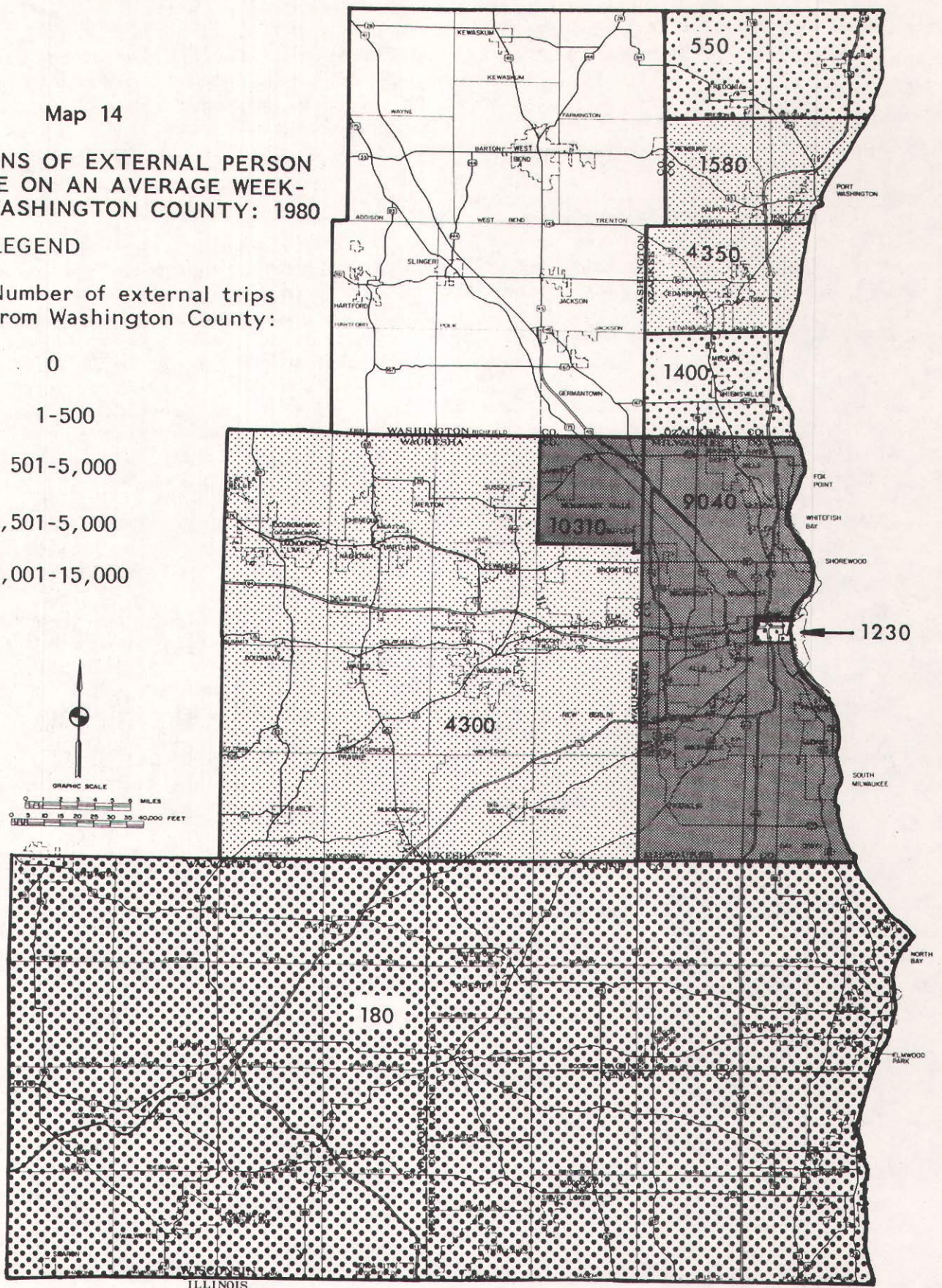
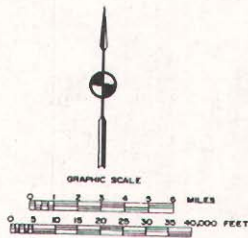
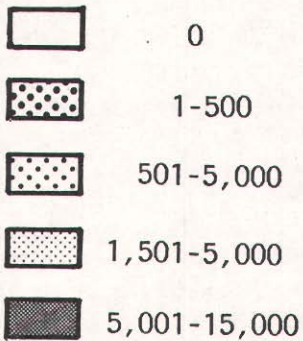
Source: SEWRPC.

Map 14

DESTINATIONS OF EXTERNAL PERSON
TRIPS MADE ON AN AVERAGE WEEK-
DAY FROM WASHINGTON COUNTY: 1980

LEGEND

Number of external trips
from Washington County:



Source: SEWRPC.

within Washington County in 1980, home-based work trips accounted for about 26 percent, home-based shopping trips for about 14 percent, home-based other trips for a little over 37 percent, nonhome-based trips for about 11 percent, and school-based trips for 11 percent.

In 1980, approximately 55,100 home-based work trips were generated within Washington County. Of this total, 42,200 trips, or 77 percent, were made to destinations internal to Washington County. The highest concentrations of these destinations were located within the Cities of West Bend and Hartford, and the Villages of Kewaskum, Jackson, and Germantown. External to Washington County, the area receiving the highest number of home-based work trips originating in Washington County was Milwaukee County, which attracted approximately 6,000 work trips on an average weekday. Milwaukee's central business district, however, attracted only about 600 work trips from Washington County on an average weekday. Other areas receiving significant numbers of home-based work trips originating within Washington County were the Cedarburg-Grafton area, which attracted about 2,200 trips, and the Menomonee Falls area, which received about 2,400 trips.

About 30,500 home-based shopping trips were generated within Washington County in 1980. Approximately 26,100 of these trips, or 86 percent, were made to destinations internal to Washington County. The highest concentrations of these destinations were located in the City of West Bend (13,200 trips), the City of Hartford (2,900 trips), and the Village of Germantown (1,500 trips). Notably, 10,200 of the home-based shopping trips made within the City of West Bend on an average weekday originated within the City itself. The only external area attracting a significant number of shopping trips from Washington County was the Menomonee Falls area of Waukesha County, which attracted about 2,700 shopping trips. In comparison, Milwaukee County received only about 500 home-based shopping trips originating within Washington County.

Of the 80,100 home-based other trips estimated to have originated within Washington County on an average weekday in 1980, approximately 69,200 trips, or 86 percent, were made to destinations within the County. These destinations were concentrated mainly in those areas containing medical facilities, business and government offices, and social-recreational sites. The Menomonee Falls area of Waukesha County was the most popular external destination for home-based other trips originating in Washington County, attracting approximately 3,500 trips. The second most popular area was Milwaukee County, which received about 3,200 home-based other trips originating within Washington County on an average weekday.

About 88 percent, or 21,400, of the 24,300 nonhome-based trips estimated to have originated within Washington County on an average weekday in 1980 were made to destinations internal to the County. Within Washington County, the City of West Bend attracted the highest number of nonhome-based trips--11,500. The Menomonee Falls area of Waukesha County and Milwaukee County received the largest concentrations of external trips originating within Washington County, receiving about 1,100 and 600 daily trips, respectively.

Approximately 23,600 school-based trips were generated within Washington County on an average weekday in 1980. Of this number, about 21,800 trips, or 92 percent, were made within the County. The major destinations of the school-based trips were the middle schools and high schools located within the County. External to Washington County, the only destinations having significant concentrations of school-based trips originating within Washington County were the educational facilities in the Cedarburg-Grafton area, which attracted 700 trips, the Menomonee Falls area of Waukesha County, which attracted 600 trips, and Milwaukee County, which attracted 300 trips.

In an effort to identify the current nature and extent of travel within Washington County, estimates of intercommunity and intercounty total person trip volumes were prepared for trips originating in Washington County using the 1980 estimates of total person travel. Maps 15 and 16 show total person trip "desire lines" for intercommunity travel--travel within Washington County--and for intercounty travel--travel between Washington County communities and other subareas of the Southeastern Wisconsin Region--respectively. As can be seen on the maps, the largest concentrations of total person trip origins and destinations within the County are centered on the City of West Bend and the City of Hartford. These communities attract a large volume of person trips from immediately adjacent smaller communities and also attract a significant volume of trips from more distant communities within the County. It is significant to note that a large volume of person trips originating within the Village of Germantown and Town of Richfield have destinations external to the study area in the Menomonee Falls area of Waukesha County.

In addition to the above-mentioned total person travel patterns for trips from Washington County to areas within the seven-county Region, significant amounts of travel between Washington County communities and surrounding counties outside the Region occurred during 1980. In this respect, the most significant amount of total person travel occurred between the Hartford and Slinger areas of Washington County and Dodge County, with approximately 4,200 trips occurring on an average weekday. Other, smaller external person trip movements occurred between the Kewaskum area and Fond du Lac County--2,700 daily trips, and between the West Bend area and Fond du Lac County--2,400 daily trips.

Personal Opinion Survey--Home Interview

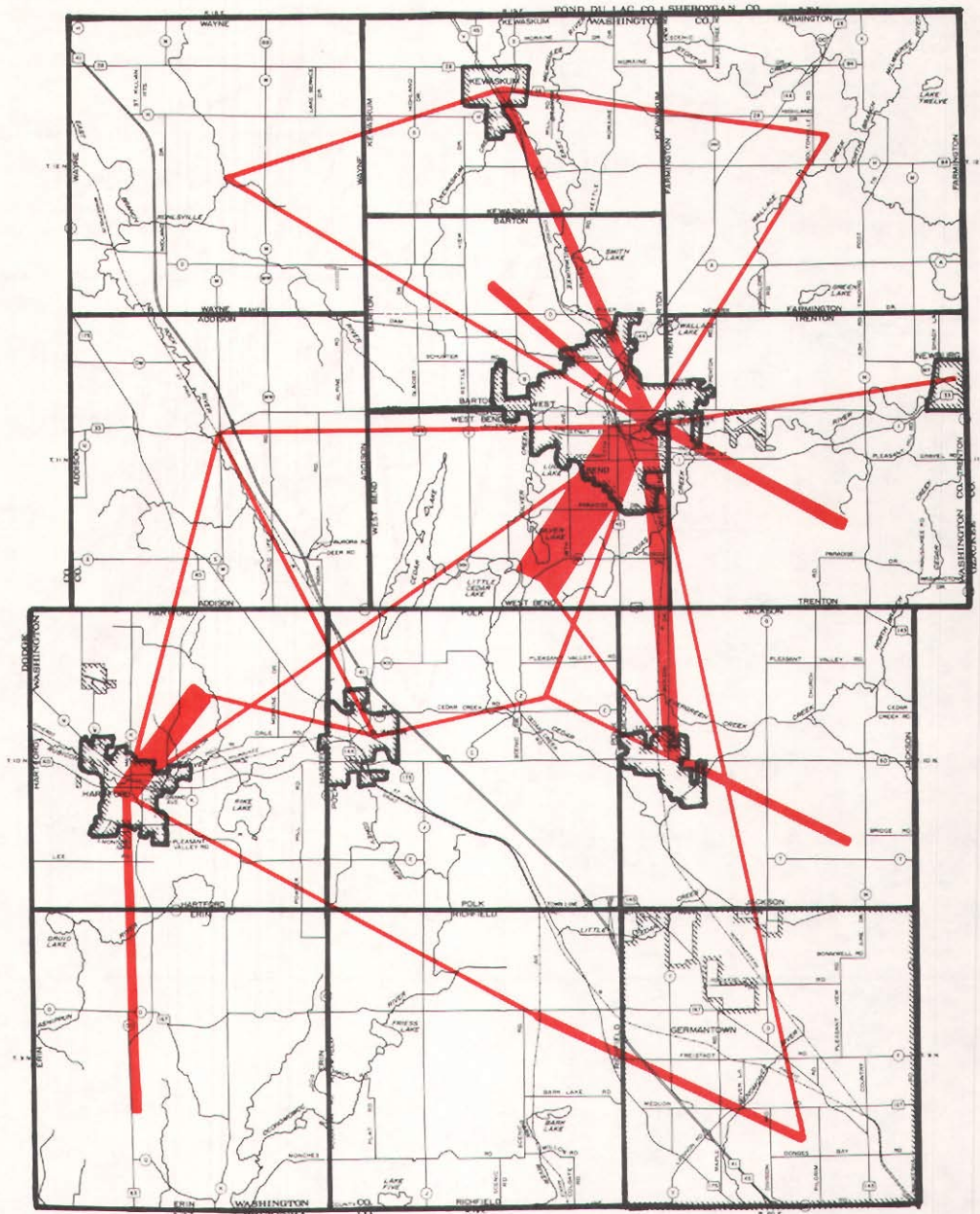
As an integral part of the home interview survey conducted in 1972 by the Commission, information was obtained from the residents of a subsample of households on their opinions, preferences, and attitudes concerning certain aspects of existing and possible future public transportation facilities and services. The responses given were summarized for the Region as a whole and for each county within the Region, and are fully documented in SEWRPC Technical Report No. 13, A Survey of Public Opinion in Southeastern Wisconsin: 1972.

One question asked respondents to indicate whether the lack of adequate public transportation between their homes and certain areas of the Region prevented or severely limited family members from accepting employment, reaching shopping and recreational areas of their choice, conducting necessary personal business, and visiting friends and relatives. Table 16 summarizes these responses for Washington County, which was poorly served by public transportation in 1972, and compares those responses to such responses for Milwaukee County, which was well served by public transportation in 1972, and for the Region as a whole. The only significant affirmative response given in all areas involved the ability to reach shopping areas of the respondent's choice. Approximately 12 percent of those interviewed within Washington County felt that the lack of public transportation made it difficult to reach the shopping area of their choice. In comparison, approximately 16 percent of the respondents in Milwaukee County and in the Region as a whole answered affirmatively to this question. It is significant to note the overall low rate of affirmative responses. Higher rates of affirmative responses to the questions were generally found in areas served by public transportation at the time of the survey. Affirmative responses were fewer in outlying and rural areas poorly served by public transportation at the time of the survey, which may reflect a lesser expectation of public transit service in these areas.

Another question in the home interview survey asked whether the respondents would utilize public transportation on a more or less regular basis if it were provided

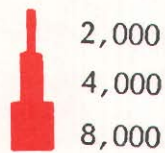
Map 15

AVERAGE WEEKDAY TOTAL INTERNAL PERSON TRIP DESIRE LINES FOR TRIPS ORIGINATING IN WASHINGTON COUNTY: 1980



LEGEND

Person Trip Volume Scale



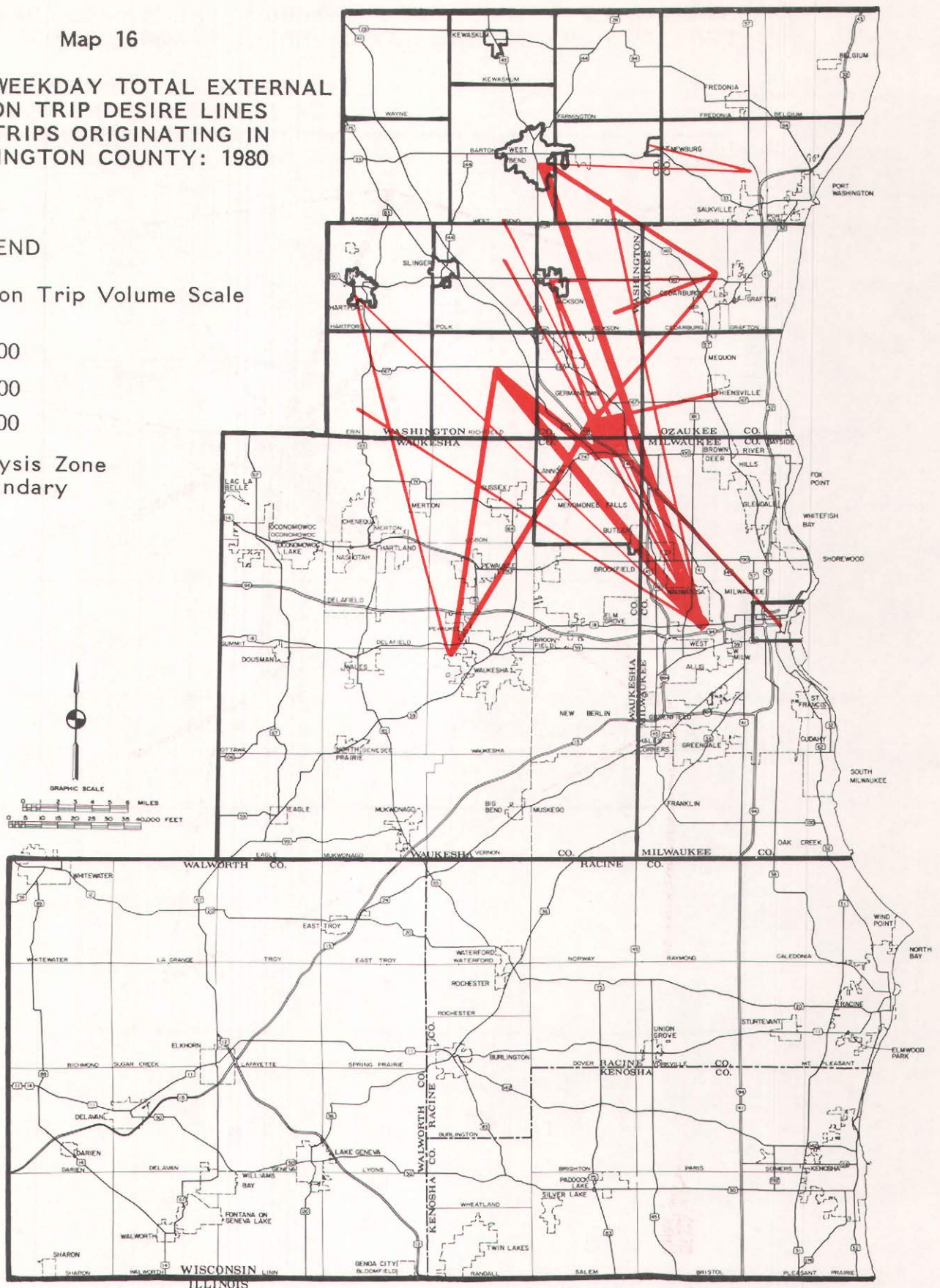
— Analysis Zone Boundary



Source: SEWRPC.

AVERAGE WEEKDAY TOTAL EXTERNAL
PERSON TRIP DESIRE LINES
FOR TRIPS ORIGINATING IN
WASHINGTON COUNTY: 1980

Person Trip Volume Scale



52

Table 16

PERCENT DISTRIBUTION OF RESPONSES TO PERSONAL OPINION SURVEY: 1972

| Responses | Washington County (percent) | Milwaukee County (percent) | Region (percent) |
|---|--------------------------------|-------------------------------|---------------------|
| The Lack of Public Transportation Makes It Difficult to: | | | |
| Accept Employment in Certain Areas: | | | |
| True..... | 4.7 | 12.8 | 11.3 |
| False..... | 79.9 | 76.1 | 78.1 |
| No Response..... | 15.4 | 11.1 | 10.6 |
| Reach Recreational Areas: | | | |
| True..... | 6.7 | 12.5 | 12.0 |
| False..... | 77.2 | 75.3 | 76.6 |
| No Response..... | 16.1 | 12.2 | 11.4 |
| Reach Shopping Areas of Our Choice: | | | |
| True..... | 11.8 | 16.2 | 15.8 |
| False..... | 74.4 | 72.4 | 73.7 |
| No Response..... | 13.8 | 11.4 | 10.5 |
| Conduct Necessary Personal Business: | | | |
| True..... | 5.2 | 9.8 | 8.3 |
| False..... | 78.9 | 78.2 | 80.2 |
| No Response..... | 15.9 | 12.0 | 11.5 |
| Make Social Visits to Friends or Relatives in Certain Areas: | | | |
| True..... | 5.9 | 12.0 | 10.6 |
| False..... | 76.8 | 76.2 | 78.1 |
| No Response..... | 17.3 | 85.8 | 11.3 |

Source: SEWRPC.

without cost to the user. Approximately 55 percent of the respondents within Washington County indicated they would not use public transportation even on that basis, while only 34 percent indicated that they would. About 11 percent gave no response. In comparison, 50 percent of the respondents in Milwaukee County and 44 percent regionwide indicated that they would not use public transportation even on that basis, and 46 percent of the respondents in Milwaukee County and 41 percent regionwide indicated that they would, with 10 percent of the Milwaukee County respondents and 9 percent of the respondents regionwide not replying to the question. Although the 34 percent affirmative response for Washington County may seem low, it should be noted that at the time of the survey, Washington County was poorly served by public transportation, with fewer than 1 percent of those who were asked this question using public transportation at the time.

Finally, it is important to note that the opinions indicated in this section were obtained from a survey conducted prior to the 1973-1974 and 1979 motor fuel shortages and the subsequent increases in the price of motor fuel. These factors have tended to have a positive effect on public opinion toward public transportation, as evidenced by the increases in transit ridership experienced by public transit operators, both nationally and within the Region, during and immediately after motor fuel shortages and price increases.

SUMMARY

The study area consists of the entirety of Washington County, which contains 22 local, general-purpose units of government. The total resident population of the County in 1980 was about 84,800 persons, of which about 45,800 persons, or about 54 percent, reside within the eight incorporated civil divisions within the County. However, the County remains predominantly rural in nature, with over 90 percent of the total land area maintained in agricultural or other open, rural land uses.

Six population groups were identified as requiring special attention in the transit planning effort: the elderly, certain minorities, low-income families, the handicapped, school-age children, and persons living in households with no automobiles available. However, in Washington County only one of these special population groups--persons living in households with no autos available--was found to be concentrated in certain geographic areas. Such persons were found to be concentrated in the Cities of Hartford and West Bend, and in the Kewaskum area of the County. Also identified within the chapter were the major traffic generators located within Washington County, including shopping centers, major educational institutions, hospitals and medical centers, major governmental and public institutional centers, major employment centers, and major recreational areas.

In 1972, the Commission undertook a comprehensive reinventory of travel habits and patterns within the Region to provide a benchmark of basic data for land use and transportation planning, and to determine what changes in travel habits and patterns had occurred since the Commission's 1963 inventory of travel. Using the results of the 1972 home interview survey, estimates of 1980 total person travel for Washington County were prepared by applying average growth factors based upon changes in community population, county household size, and county employment between 1972 and 1980. The 213,600 total person trips estimated to have originated within the County in 1980 were divided into five trip purposes, with about 55,100, or 26 percent, being home-based work trips; 30,500, or 14 percent, being home-based shopping trips; 80,100, or 38 percent, being home-based other trips; 24,300, or 11 percent, being nonhome-based other trips; and 23,600, or 11 percent, being school trips.

Of the 213,600 trips estimated to have originated within the County in 1980, about 180,700 trips, or about 85 percent, were made to destinations within Washington County, and 32,900 trips, or about 15 percent, were made to destinations outside Washington County. Internal to Washington County, the City of West Bend and City of Hartford attracted the highest proportion of trips based upon the five trip purposes. External to Washington County, Milwaukee County and the Menomonee Falls area of Waukesha County attracted the highest proportion of trips identified as originating within the County.

A personal opinion survey conducted by the Commission at the same time that the travel inventories were being conducted indicated that about 12 percent of the Washington County residents felt that shopping trips to the area of their choice were curtailed by the lack of public transportation.

This chapter has described the geographic, land use, and socioeconomic characteristics and travel habits and patterns of Washington County that are pertinent to a transit feasibility study. From the information presented herein, it can be seen that a majority of the major traffic generators identified within the County, along with concentrations of special population groups, are located within or contiguous to the major community centers of Hartford and West Bend. In addition, estimates of total person trips prepared by the Commission indicate that a significant portion of travel

originating within the County is centered upon these communities and the Menomonee Falls area of Waukesha County. Based on this information, the existing community transportation services can be evaluated. The following chapter of this report provides a description and analysis of the existing public transportation services provided within Washington County.

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Chapter IV

EXISTING PUBLIC TRANSIT SERVICES

An understanding of the existing public transportation services is essential to the preparation of any transit feasibility study. Accordingly, this chapter presents a summary description of the existing public transportation services within Washington County as those services were provided in 1981. The chapter also includes an evaluation of the existing public transit services in light of the travel habit and pattern inventory findings presented in Chapter III and the transit development objectives presented in Chapter II of this report.

EXISTING COMMUNITY TRANSIT SERVICES

In Washington County, fixed route special carrier, nonfixed route common carrier, and nonfixed route special carrier intraregional public transportation services are currently being provided by both public and private agencies. In addition, fixed route common carrier interregional public transportation is being provided by private intercity bus operators. Table 17 lists the providers and general characteristics of the existing public transit services within Washington County.

Fixed Route, Special Carrier Transit Service

Fixed route, special carrier transit services are provided in Washington County by The Threshold and by the various school districts within the County. The Threshold, a private social service agency offering referral services, training programs, and employment opportunities for physically and developmentally disabled individuals, provides specialized, fixed route transit service to individuals participating in its programs. The service is presently provided by the agency through the use of both its own private fleet of wheelchair lift-equipped vehicles, and services provided by private yellow school bus companies operating under contract with the agency. In 1981 The Threshold provided special transportation service to about 180 persons making approximately 7,650 one-way trips per month. Included in this figure are clients of two public social service agencies--the Wisconsin Department of Health and Social Services, Division of Vocational Rehabilitation, and the Washington County Combined Community Services Agency, both of which contract with The Threshold for client transportation services to and from The Threshold on various days of the week.

Fixed route, special carrier transportation service is also provided by the 10 school districts operating within Washington County (see Table 17). While specific eligibility requirements vary slightly between school districts, yellow school bus service is generally provided within the school districts to and from public, private, and parochial schools for all pupils who reside in the school district but at a distance of two miles or more--measured "over the road"--from the school they are entitled to attend. Yellow school bus service during the 1980-1981 school year was provided to more than 18,000 students in Washington County school districts making more than 756,000 one-way trips per month.

Nonfixed Route, Common Carrier Transit Service

Nonfixed route, common carrier transit service is available within Washington County in the form of public and private taxicab services. Shared-ride taxicab service within the City of Hartford is currently provided, with the assistance of federal, state, and local subsidies, by the City of Hartford Municipal Recreation Department. Initiated on January 1, 1981, the taxicab service is available to the general public seven days a week for local trips made within the City of Hartford and for longer

Table 17

**PUBLIC TRANSIT SERVICE PROVIDERS AND OPERATING
CHARACTERISTICS IN WASHINGTON COUNTY: 1981**

| Type of Transit Service | Service Provider | Service Area | Service Vehicle | Service Availability | Fare | Eligible Users | Estimated 1981 Service Utilization (monthly one-way trips) |
|---|---|---|-------------------|--|---|--|--|
| Intraregional Fixed Route Special Carrier | The Threshold | Washington County | Yellow school bus | 6:30 a.m.-8:30 a.m. 12:00 p.m.-1:00 p.m. 3:00 p.m.-5:00 p.m. Monday - Friday | No charge | Physically/developmentally disabled adults 18-70 years of age ^a | 7,650 |
| | Germantown School District Hartford Union High School District Hartford Joint School District No. 1 Erin School District No. 2 Richfield School District No. 2 Richfield School District No. 7 Richfield, Erin Joint School District No. 11 Kewaskum School District Slinger School District West Bend Joint School District No. 1 | School districts within and partially outside Washington County | Yellow school bus | 6:45 a.m.-4:45 p.m. Monday - Friday | No charge | Public and private school students meeting specific school district requirements | 756,000 |
| Nonfixed Route Common Carrier | City of Hartford Municipal Recreation Department | City of Hartford and environs | Automobile | 6:00 a.m.-10:00 p.m. Monday and Friday 6:00 a.m.-8:30 p.m. Tuesday and Thursday 6:00 a.m.-8:00 p.m. Wednesday 8:30 a.m.-9:30 p.m. Saturday 8:00 a.m.-6:00 p.m. Sundays and holidays | \$1.00/adults and students \$0.50/elderly, handicapped, and children | Anyone | 1,200 |

Table 17 (continued)

| Type of Transit Service | Service Provider | Service Area | Service Vehicle | Service Availability | Fare | Eligible Users | Estimated 1981 Service Utilization (monthly one-way trips) |
|---|---|--|---------------------------|--|--------------------------------------|---|--|
| Nonfixed Route Common Carrier (continued) | City Cab Service | City of West Bend and environs | Taxicab | 24 hours per day | Distance-related with \$1.50 minimum | Anyone | 690 |
| | Express Cab Service | City of West Bend and environs | Taxicab | 7:00 a.m.-7:00 p.m. daily | Distance-related with \$1.50 minimum | Anyone | 750 |
| Nonfixed Route Special Carrier | American Cancer Society | Washington County and immediate Milwaukee area | Automobiles | 8:00 a.m.-4:30 p.m. Monday - Friday with 24-hour advance reservation | No charge | Cancer patients at area hospitals | 40 |
| | American Red Cross | Washington County and immediate Milwaukee area | Automobiles | 8:00 a.m.-5:00 p.m. Monday - Friday with 24-hour advance reservation | No charge | Anyone | 120 |
| | Washington County Older Adult Transportation | Washington County and immediate area | Lift-equipped small buses | 8:00 a.m.-5:00 p.m. Monday - Friday with 24-hour advance reservation | \$0.50 | Elderly 60 years of age or older and transportation handicapped | 600 |
| | Washington County Department of Social Services | Washington County | Automobiles | 8:00 a.m.-5:00 p.m. Monday - Friday | No charge | Low-income families and elderly | 300 |
| Intraregional Intercity Bus | Greyhound Lines, Inc. | Western U. S. and Canada | Intercity motor bus | Daily | Distance-related | Anyone | -- ^b |
| | Wisconsin Coach Lines, Inc. | Wisconsin, Illinois | Intercity motor bus | Daily | Distance-related | Anyone | -- ^b |

^aThe Threshold provides contract transportation service for clients of the Wisconsin Department of Health and Social Services, Division of Vocational Rehabilitation and the Washington County Comprehensive Community Services Agency.

^bNo trips were made entirely within Washington County.

Source: SEWRPC.

trips--up to 50 one-way miles--that either originate in or are destined for the City of Hartford. One-way adult and student fares for local taxicab service are \$1.00, with a half-fare program in effect for elderly and handicapped users. Taxicab patrons using the service for long-distance travel are charged the basic fare for in-city service plus an additional fee of \$0.60 per mile for the first person, \$0.20 per mile for a second person, and \$0.10 per mile for any additional persons. Nearly 1,200 trips per month were made on the taxi service in 1981.

Within the City of West Bend, two private taxi companies are currently licensed to operate: City Cab and Express Cab Service. Unlike the taxicab company in the City of Hartford, both taxi companies in the City of West Bend operate without public subsidy on primarily an exclusive-ride basis, with shared-ride service provided only with the permission of the first taxi patron. Fare for the services depends upon the distance traveled. City Cab determines fares based on a system of nine zones, charging an initial fee of \$1.50 for single patrons plus \$0.10 per zone boundary crossed. Express Cab Service determines fares directly by distance traveled, charging an initial fee of \$1.50 per single patron plus approximately \$0.90 per mile. A minimum fee of \$1.50 is charged by both companies for travel in the City. In addition, both taxi companies offer reduced rates for elderly persons 60 years of age and older, charging a minimum fee of \$1.35 per single elderly patron. The rate of discount from the regular fare increases with the distance traveled. The overall average discount from the regular fare given by the company to elderly patrons was about 25 percent. In 1981, more than 1,400 one-way trips per month were made on the two private taxi services available in the City of West Bend.

Nonfixed Route, Special Carrier Transit Service

Several public and private organizations and social service agencies currently provide nonfixed route, special carrier service to population groups within Washington County. The American Cancer Society provides door-to-door transportation services in Washington County to individuals for medical purposes only. Eligible users are limited to cancer patients, and reservations for service must generally be made one day in advance of the day required. The service is provided for trips to and from hospitals located both within and outside the County for radiation and chemotherapy treatment. Currently, the American Cancer Society specialized transportation service is provided by volunteer drivers using personal vehicles at no charge to the user between 8:00 a.m. and 4:30 p.m. on weekdays. About two persons per month used the transportation service in 1981, making about 40 one-way trips per month.

Two chapters of the American Red Cross provide specialized transportation in Washington County: the Kettle Moraine Region of the Greater Milwaukee Chapter serving primarily the southwest one-half of the County, including the Hartford and Germantown areas; and the West Bend Chapter, serving primarily the northeast one-half of the County including the West Bend and Jackson areas. Both chapters provide service to Washington County residents primarily for medical purpose trips to destinations within and outside the County using volunteer drivers and vehicles owned by the society. The door-to-door specialized transportation service offered by the American Red Cross is available at no charge to the user on an advance-reservation basis between 8:00 a.m. and 5:00 p.m. on weekdays and during the evenings and on weekends if a driver is available. All ambulatory persons are eligible users of the specialized service. Children under five years of age must be accompanied by an adult. About 20 persons per month used the transportation services offered by the Red Cross chapters in the County in 1981, making about 120 trips per month.

The Washington County Office on Aging administers a special program--the Older Adult Transportation (OAT) program--aimed at providing demand-responsive transportation service to elderly persons, age 60 and older, and handicapped residents of Washington

County. Operated on a contract basis by the City of Hartford Department of Recreation, the OAT program schedules transportation service for eligible users based on three categories of travel demand. Regarded as the highest priority is travel for medical and health needs. Trips made for shopping purposes, particularly grocery shopping, are given second priority. All other trip requests have equal priority under the program and are subject to seat availability. The service is available on a minimum 24-hour, advance-reservation basis at a cost of \$0.50 per trip for elderly and handicapped persons and \$1.00 per trip for nonelderly aides or attendants. In order to completely service the County and still provide a high level of service, the OAT program provides transportation service to different areas of the County on different days of the week as follows: in the West Bend area, on Mondays and Fridays between 8:00 a.m. and 5:00 p.m., and on Tuesdays between 10:00 a.m. and 2:00 p.m.; in the Hartford area, on Tuesdays and Thursdays between 8:00 a.m. and 5:00 p.m.; and in the Germantown area, on Mondays between 10:00 a.m. and 2:00 p.m. and Wednesdays between 8:00 a.m. and 5:00 p.m. The service is primarily provided to serve in-county travel. However, for the Germantown area only, travel outside the County is allowed for medical purposes and grocery shopping purposes to the Village of Menomonee Falls in Waukesha County. In 1981, about 130 persons per month were using the specialized transportation service provided by the OAT program, making about 600 one-way trips per month. About 43 percent of these trips were made for personal business purposes, including shopping; about 40 percent were made for social-related purposes; about 12 percent were made for medical purposes; and about 5 percent were made for nutritional or other nonwork purposes. It is important to note that about 80 percent of the trips utilizing this service are made by persons residing in the Cities of Hartford and West Bend.

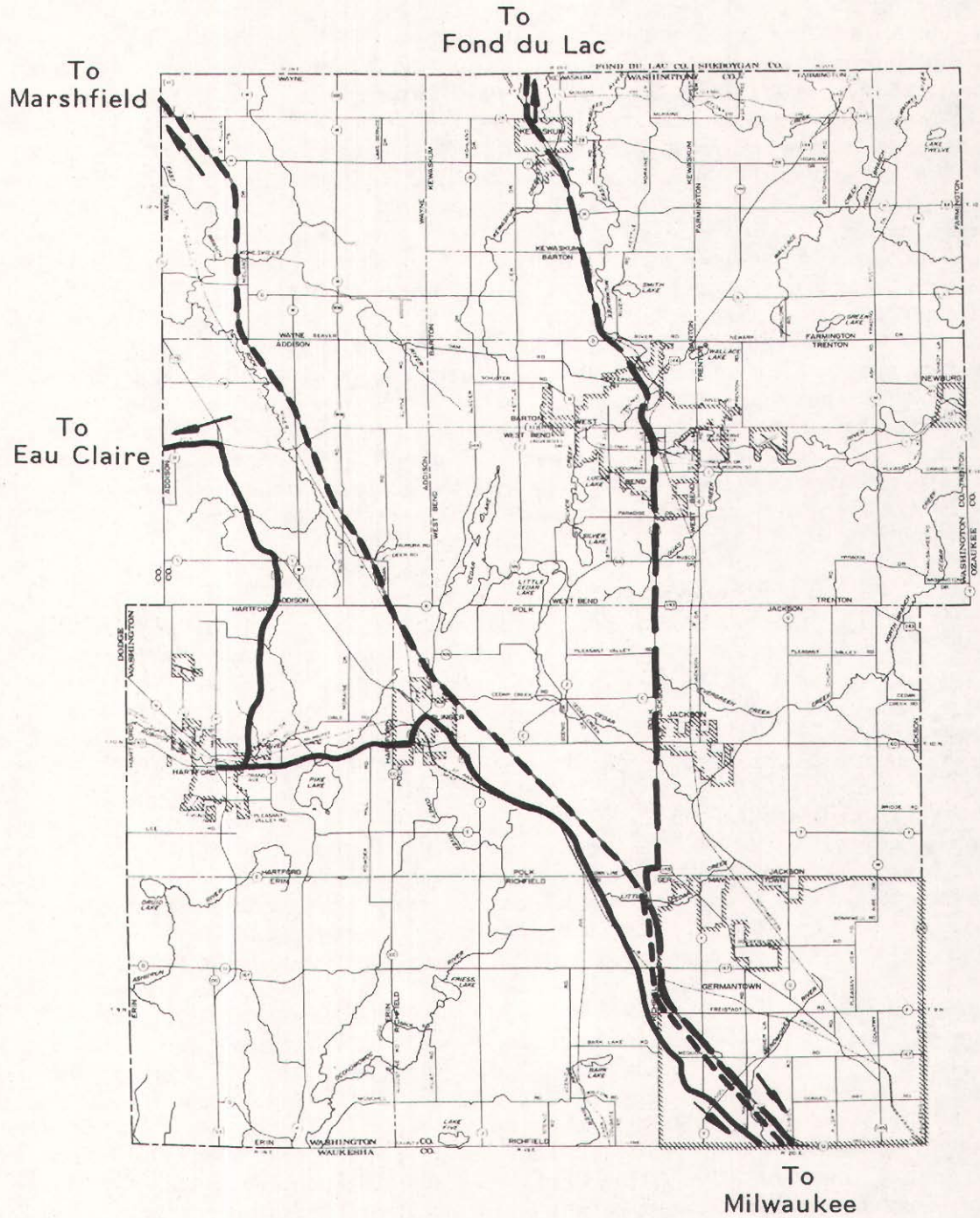
The Washington County Department of Social Services provides specialized transportation services to low-income individuals and families residing in Washington County. The service is made available by the Department for medical and other essential purpose trips between 8:00 a.m. and 5:00 p.m. Monday through Friday and occasionally on weekends. The service is provided with volunteer drivers using personal vehicles at no charge to the user. This service was used by about 10 persons per month making about 300 one-way trips per month in 1981.

Interregional Public Transit Service

Interregional, common carrier fixed route public transportation service is provided through Washington County by three private intercity bus companies, as shown on Map 17: Greyhound Lines, Inc.; Wisconsin Coach Lines, Inc.; and American Coach Lines, Inc. The regularly scheduled bus service provided by Greyhound Lines, Inc., consists of two trips daily in each direction between the Cities of Milwaukee and Eau Claire through the City of Stevens Point, with scheduled stops within Washington County in the Town of Richfield, the City of Slinger, the City of Hartford, and the Town of Addison. The regularly scheduled bus service between the Cities of Milwaukee and Fond du Lac provided by Wisconsin Coach Lines, Inc., consists of two trips Monday through Saturday and one trip on Sundays and holidays, with scheduled stops within Washington County in the Village of Germantown, the Town of Jackson, the City of West Bend, and the Village of Kewaskum. American Coach Lines, Inc., operates a single route through Washington County between the Cities of Milwaukee, Fond du Lac, and Marshfield. However, the service does not carry passengers with destinations between the City of Fond du Lac and the Milwaukee central business district and, therefore, makes no stops within Washington County. A special one-day survey of riders on the two intercity bus routes with stops within the County indicated that 10 persons residing within the County utilized the bus service. However, none of these users made trips entirely within the County. Abbreviated schedules of the two private intercity bus companies providing service to Washington County are provided in Tables 18 and 19. It should be noted that the above-mentioned regularly scheduled stops of the two private

Map 17

INTERCITY BUS SERVICE IN WASHINGTON COUNTY: 1981



LEGEND

Intercity Bus Route

— Greyhound Lines, Inc.

- - - Wisconsin Coach Lines, Inc.

- . - American Coach Lines, Inc.

Source: SEWRPC.

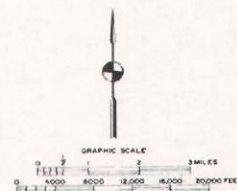


Table 18

ABBREVIATED SCHEDULE FOR GREYHOUND LINES, INC.,
BUS SERVICE: EAU CLAIRE--STEVENS POINT--MILWAUKEE

| Time ^a (read down) | | Bus Stop Location | Time ^a (read up) | |
|----------------------------------|-------|-----------------------|--------------------------------|-------|
| Daily | Daily | | Daily | Daily |
| -- | 12:30 | Eau Claire..... | 7:30 | -- |
| -- | 2:25 | Marshfield..... | 5:35 | -- |
| <i>6:45</i> | -- | Wausau..... | -- | 10:30 |
| <i>7:35</i> | 4:00 | Stevens Point | 4:45 | 9:45 |
| <i>10:10</i> | 6:45 | Beaver Dam | 1:20 | 7:00 |
| <i>11:10</i> | 7:35 | Hartford | 12:30 | 6:10 |
| <i>11:20</i> | 7:45 | Slinger..... | 12:20 | 6:00 |
| <i>11:30</i> | 7:50 | Richfield | 12:10 | 5:50 |
| <i>11:50</i> | 8:10 | Menomonee Falls | <i>11:50</i> | 5:30 |
| 12:10 | 8:30 | Milwaukee | <i>11:30</i> | 5:10 |

^aTimes shown in italics are a.m. times.

Source: Greyhound Lines, Inc., and SEWRPC.

Table 19

ABBREVIATED SCHEDULE FOR WISCONSIN COACH LINES, INC.,
BUS SERVICE: FOND DU LAC--MILWAUKEE

| Time ^a (read down) | | Bus Stop Location | Time ^a (read up) | |
|----------------------------------|-------|-----------------------|--------------------------------|-------|
| Monday-Saturday | Daily | | Monday-Saturday | Daily |
| <i>9:20</i> | 2:15 | Fond du Lac | <i>12:51</i> | 6:59 |
| <i>10:03</i> | 2:52 | Kewaskum | <i>12:08</i> | 6:16 |
| <i>10:20</i> | 3:09 | West Bend..... | <i>11:56</i> | 6:06 |
| <i>10:59</i> | 3:48 | Menomonee Falls | <i>11:15</i> | 5:25 |
| <i>11:16</i> | 4:05 | Milwaukee | <i>10:55</i> | 5:00 |

^aTimes shown in italics are a.m. times.

Source: Wisconsin Coach Lines, Inc., and SEWRPC.

intercity bus companies are major stops, or locations of ticket agencies. However, unscheduled "flag stops" are also generally made along each bus route to serve patrons between major stops.

EVALUATION OF EXISTING TRANSIT SERVICES AND AGENCY COORDINATION EFFORTS

In Chapter I of this report, the six-step planning process involved in the preparation of the transit service plan for Washington County was outlined. The third step of that process consists of an evaluation of the existing transit services, based upon the transit development objectives and standards presented in Chapter II of this report, and an analysis of efforts of the agency transportation providers in the County to coordinate the services provided and thereby avoid needless duplication and cost. The findings of the evaluation conducted using the objectives and standards, along with the land use, socioeconomic, and travel data presented in the previous chapter, revealed a number of deficiencies in the current transit services provided within the study area. Deficiencies were found to exist in the provision of transit service to both priority and general population groups. Deficiencies were also found in the provision of transit service to major trip generators, and in the provision of transit service relative to the existing travel habits and patterns of the study area residents.

Service to Population Groups

In Chapter III, those segments of the population whose dependence on public transit services tends to be greater than that of the population as a whole were identified. These groups include school-age children, elderly persons, handicapped individuals, minorities, low-income families, and those households that do not have access to an automobile. With the exception of minorities, who make up less than 1 percent of the total county population, these population groups were found to comprise significant portions of the total Washington County population. In 1981, specialized transportation services were provided to serve a portion of the needs of all but one of the six transit-dependent population groups, the minority population, identified within the County.

School-age children within the study area are currently provided with yellow school bus service by the various school districts having jurisdiction within the County. Generally, students are eligible to use this service if they reside more than two miles from the school they are entitled to attend. Within each school district, the transportation service has been specially designed for students attending each school and is coordinated with the start and dismissal times of classes. Thus, an adequate level of regularly scheduled transportation service is provided to students within each school district for travel to and from the school they are entitled to attend. School-age children, however, may still be in need of transportation for nonschool purpose travel if they do not have access to an automobile to make the trip.

Specialized transportation service for elderly and handicapped persons residing within the County is offered primarily by a county-sponsored program designed to provide some degree of personal mobility. The Older Adult Transportation program makes available specialized transportation services to all elderly and handicapped persons residing within the County, as discussed earlier in this chapter. While providing a highly accessible form of transportation at a low cost to the tripmaker, this specialized transportation service is available only on a minimum 24-hour, advance-reservation basis to different subareas of the County on different days of the week, with daily travel being restricted to the particular area being served. The advance-reservation requirement and the various daily service schedules necessitate an advance knowledge of travel requirements and, therefore, restrict the ability to make

trips on a spontaneous basis for such common purposes as shopping, recreation, or the conduct of personal business. In addition, the service area restrictions limit the extent of travel which can be made using this service. It should be noted, however, that while the advance-reservation requirements and service area restrictions may, in some cases, limit opportunity for travel, these same requirements and restrictions have enabled the program to provide a reliable transportation service capable of serving the demand generated.

Members of low-income families are eligible to use the specialized transportation services provided by the Washington County Department of Social Services, as discussed earlier in this chapter. While providing for medical and other essential purpose trips, this specialized transportation service does not fully address the daily travel requirements of members of an average household.

At the present time, persons who do not have access to an automobile are provided with specialized transportation services only if they belong to one of the four priority population groups identified as receiving specialized transportation services: school-age children, elderly persons, handicapped individuals, and low-income families. Persons residing in households which otherwise do not choose or cannot afford to own automobiles, as well as the remaining county population, must generally rely on regular, common carrier public transit services provided by the public and private taxicab services and the private intercity bus companies previously identified in this chapter. In this respect, it is important to note that all three areas of the County identified as containing a high proportion of zero-automobile households are served by either a local taxicab service or an intercity bus route, or both.

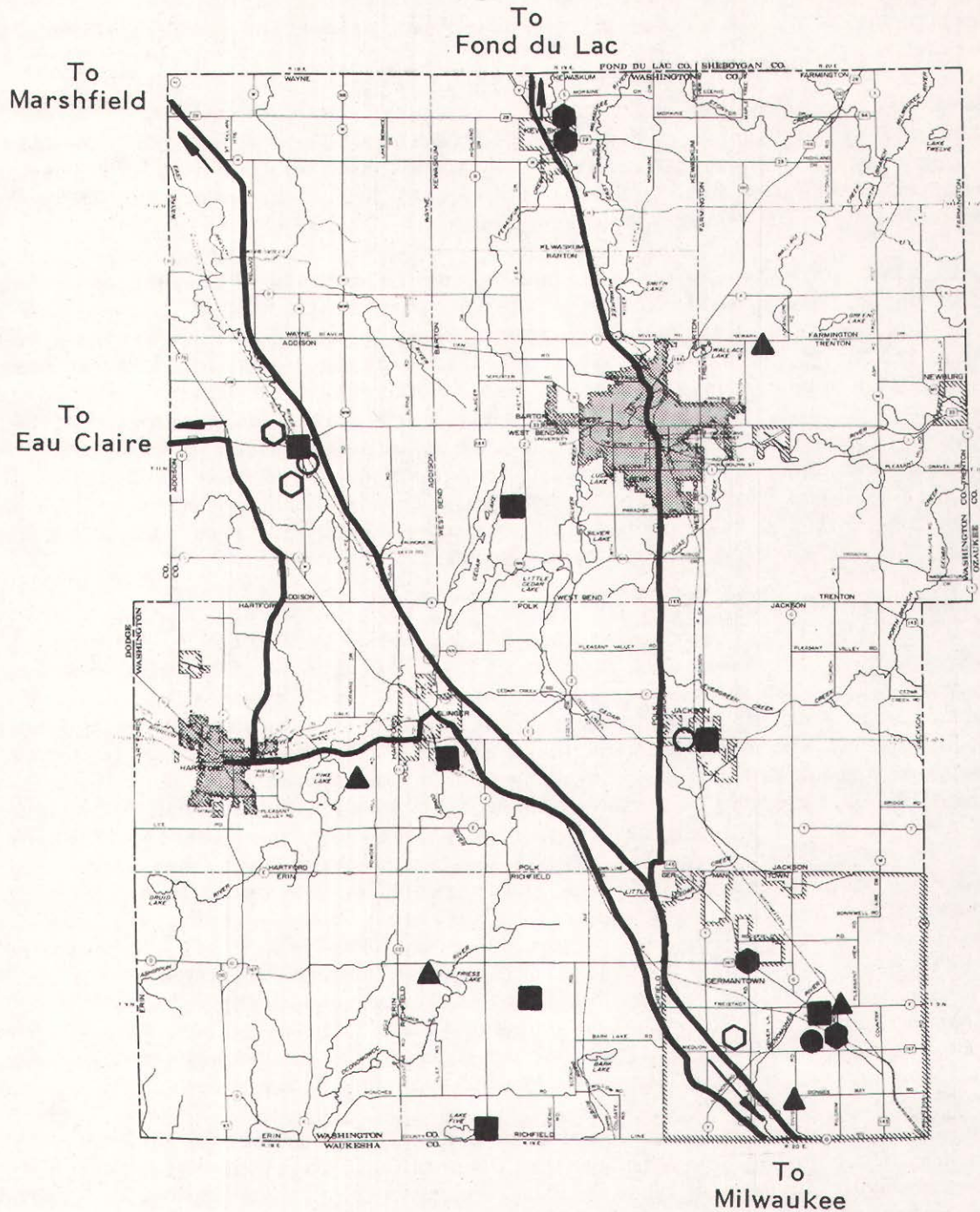
Service to Major Trip Generators

In accordance with the objectives and standards set forth in Chapter II of this report, public transportation services should connect urban and rural community centers, and should serve major land use activity centers. Only the private intercity bus companies offer to the general public, public transportation services which, at least partially, connect the community centers identified in Chapter I. Currently, public transit is efficient between community centers served by common bus routes; for example, Wisconsin Coach Lines, Inc., provides service between Kewaskum, West Bend, Jackson, and Germantown, and Greyhound Lines, Inc., provides service between Hartford, Slinger, and Germantown. However, since the routes of the two private intercity bus companies have only one common stop location or transfer point--the Greyhound Bus Depot in the Milwaukee central business district--travel by intercity bus between Washington County communities located on different bus routes, such as between the City of Hartford and the City of West Bend, must pass through the Milwaukee central business district. This results in travel which is both indirect and time-consuming. In addition, the communities of Allenton and Newburg are presently not served by any form of general public transportation, making travel by public transportation between these community centers and the other community centers located within the County impossible.

Major land use activity centers in Washington County were identified in Chapter III, and include major shopping centers, major educational institutions, hospitals and medical centers, major governmental and public institutional centers, major employment centers, and major recreational areas. Currently, only the taxicab services within the Cities of Hartford and West Bend and the intercity bus routes provide the general public with transit service to major trip generators within the County. Major trip generators not presently served by general public transportation are shown on Map 18.

Map 18

MAJOR TRIP GENERATORS IN WASHINGTON COUNTY NOT SERVED BY GENERAL PUBLIC TRANSPORTATION



LEGEND

- | | |
|---------------------|---|
| ■ Elderly Facility | ● Governmental or Public Institutional Center |
| ● Shopping Center | — Intercity Bus Route |
| ○ Medical Center | ▨ Urban Taxi Service Area |
| ⬡ Employment Center | |
| ▲ Recreational Area | |

Source: SEWRPC.

With respect to employment, the objectives and standards set forth in Chapter II indicate that public transportation should provide access to areas of employment for all segments of the population. In Chapter III of this report, 29 major employers, with an estimated labor force of more than 10,800 persons, were identified within the County. Of the total number of employers identified, 22, with an estimated labor force of more than 9,800 persons, are currently served by public transportation as provided by the taxicab and intercity bus operators.

Service Relative to Existing Travel Habits and Patterns

The preceding sections have evaluated existing transit services to residential locations of population groups and to major trip generators. To complete the analysis, it is necessary to examine the service relative to the known travel patterns of residents of the study area, as documented in Chapter III.

Estimates of 1980 total person travel for the study area indicate that approximately 213,600 person trips are currently generated within the County on an average weekday. An analysis of historic travel patterns indicated that about 85 percent, or about 180,700, of these trips are made to destinations within the County. Community areas identified in Chapter III as attracting large numbers of internal trips include the Cities of Hartford and West Bend and the Village of Germantown. Excluding yellow school bus service, the specialized transportation services currently provided to certain groups of the general population serve only about 500 one-way trips per weekday, or less than 1 percent of the total demand for internal travel on an average weekday within the County.

As described in Chapter III, the largest concentration of total person trip origins and destinations within the County is centered on the City of West Bend, with smaller but significant concentrations centered on the City of Hartford and the Village of Germantown. These communities attract a large volume of person trips from immediately adjacent smaller communities, and attract a significant volume of longer trips from more distant communities within the County. Both the City of Hartford and the City of West Bend have taxicab operations which provide for local transportation needs within each community and, to some degree, serve a portion of the immediate area surrounding each community. The Village of Germantown is presently unserved by any form of local public transportation. While the local taxi operators will provide some long-distance service to areas outside their normal service area, the additional charge for such service--ranging from \$0.60 to \$1.00 per mile--for a single patron can result in high travel costs, thereby discouraging consideration of the taxi mode by the general public as a viable public transportation alternative for longer distance trips within the County.

Intercity bus service, which is designed to serve longer distance trips at a reasonable cost to the user, is, as discussed earlier, provided within the County over two routes which provide service to all community centers within the County except Newburg and Allenton. Therefore, intercity bus service satisfies a portion of the nonlocal intercommunity travel demands within the County. However, the limited amount of service provided over each route--two trips per day in each direction--and the long intervals between scheduled bus trips can result in long wait times for return trip service and, therefore, long round-trip travel times for trips made within the County. In addition, the previously noted lack of a common stop location or transfer point for the two routes results in indirect and inconvenient travel for trips made between Washington County communities served by different intercity bus routes. Finally, a review of the schedules for each of the two routes indicates that the service provided within the County is not scheduled at times which would enable the service to be used for large volumes of work purpose trips.

The inventory of travel patterns also revealed significant external trip movement between Washington County and Milwaukee and Waukesha Counties. Nearly one-third of all external trips originating within the County, or about 10,600 trips, had destinations distributed throughout Milwaukee County. Of this number, approximately 6,000 trips were made to Milwaukee County for work purposes. At the present time, only the private intercity bus companies provide public transportation service between Washington and Milwaukee Counties. As noted above, the schedules of the existing intercity bus companies serving Washington County are not designed to conveniently serve the work purpose trip.

As noted in Chapter III of this report, a large volume of person trips originating within the Village of Germantown and Town of Richfield have destinations external to the County in the Menomonee Falls area of Waukesha County. No form of local public transportation is presently available to the general public to serve these areas. It is important to note, however, that the specialized transportation service provided by the OAT program recognizes the interaction between these communities and allows for limited purpose travel outside Washington County to the Menomonee Falls area of Waukesha County.

Existing Agency Coordination Efforts

The adopted regional plan for the transportation handicapped recommends that efforts be made to coordinate existing agency transportation services which currently function independently of one another and frequently provide needlessly overlapping and duplicative services. The coordination of such agency services should significantly improve the efficiency of existing agency operations with no increase in costs, and possibly with reduced costs.

Five agency transportation programs within Washington County were identified in previous sections of this chapter. These programs are administered by The Threshold, the American Cancer Society, two chapters of the American Red Cross, the Washington County Office on Aging, and the Washington County Department of Social Services. Table 20 sets forth the costs and utilization of the transportation services provided by social service agencies in Washington County. Currently, agency coordination efforts can be found in the area of vehicle dispatching and ride-sharing.

Both the OAT program administered by the Washington County Office on Aging and the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross utilize the City of Hartford Municipal Recreation Department to schedule and dispatch the vehicles used to provide their transportation services. The vehicles utilized in the OAT program consist of two small lift-equipped buses, with one vehicle stationed in Hartford and one vehicle stationed in West Bend. The Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross presently utilizes one station wagon to provide transportation services, but has been awarded a UMTA 16(b)(2) capital assistance grant for a lift-equipped van to be used as a second vehicle, and is presently awaiting delivery of the vehicle. Upon delivery, the vehicle will be turned over to the City of Hartford Municipal Recreation Department for service scheduling and dispatching. In addition to providing the above-mentioned specialized transportation services, the City of Hartford Municipal Recreation Department schedules and dispatches the shared-ride taxi service in the City of Hartford. Through its involvement in these three programs, the Department is able to review requests received for transportation service and schedule such requests for the program best able to provide the needed transportation.

"Ride-sharing" occurs when geographic and temporal proximity dictates that client X can be more easily carried on agency Y's vehicle than on agency X's vehicle. Washington County agencies that are involved in ride-sharing include both chapters of the American Red Cross, the American Cancer Society, and the Washington County Department

Table 20

**COSTS AND UTILIZATION OF TRANSPORTATION SERVICES
PROVIDED BY WASHINGTON COUNTY SOCIAL SERVICE AGENCIES: 1981**

| Service Provider ^a | Type of Service | Status of Drivers | Average Daily Scheduled Hours of Service | Average Vehicle Utilization ^b (percent) | Monthly Individuals Served | Monthly One-way Trips | Monthly Cost | Monthly Cost per Individual | Cost per Trip | Funding Sources |
|---|-----------------------------|-------------------|--|--|----------------------------|-----------------------|--------------|-----------------------------|---------------|---|
| The Threshold | Fixed route, fixed schedule | Paid | 5.0 | 95 | 180 | 7,650 | \$8,830 | \$49.05 | \$1.15 | Wisconsin Department of Health and Social Services, Division of Vocational Rehabilitation Washington County Board Donations |
| American Cancer Society | Demand responsive | Volunteer | 8.5 | N/A | 2 | 40 | N/A | N/A | N/A | Donations |
| American Red Cross | Demand responsive | Volunteer | 9.0 | 65 | 20 | 120 | N/A | N/A | N/A | United Way |
| Washington County Older Adult Transportation | Demand responsive | Paid | 7.5 ^c | 75 | 130 | 600 | \$3,720 | \$28.61 | \$6.20 | Wisconsin Department of Transportation Washington County Board Fares |
| Washington County Department of Social Services | Demand responsive | Volunteer | 9.0 | N/A | 10 | 300 | \$ 500 | \$50.00 | \$1.67 | Title XX, Social Security Act of 1935 Washington County Board |

NOTE: N/A indicates data not available.

^aOperating characteristics were obtained from a representative of each agency and represent approximations of each agency's transportation operations.

^bVehicle utilization is a measure of the time a vehicle is operated compared to the scheduled hours during which a vehicle is available for service. For example, if service hours are 9:00 a.m. to 5:00 p.m. and a vehicle operates four hours, the vehicle utilization is 50 percent.

^cRepresents the average scheduled daily service hours in a week for two vehicles serving three areas. Scheduled daily service hours ranged from four to nine per day, depending upon the weekday examined.

Source: SBWRPC.

of Social Services. Because of insurance limitations, the American Cancer Society and the Washington County Department of Social Services are restricted to transporting only their own clients, while the American Red Cross is able to transport any ambulatory person. Consequently, current ride-sharing efforts have been limited to the transporting of clientele of other agencies by the American Red Cross.

At the present time, each agency transportation provider is independently responsible for vehicle maintenance and supply purchases. For the two agencies utilizing volunteer drivers with personal automobiles, volunteer drivers are reimbursed for transportation costs on a mileage basis, and the drivers themselves are thus responsible for maintenance costs and vehicle supply purchases. The remaining three agency providers each have separate arrangements for vehicle maintenance and supply purchases.

To be effective, coordinated or centralized vehicle maintenance generally requires similar vehicles operating in geographic proximity, based on the principle that maintenance service can be purchased or provided at less expense in large volumes. Only two agency transportation programs utilize similar vehicles: The Threshold, which privately owns the vehicles used to provide transportation service; and the Older Adult Transportation program, which utilizes vehicles owned by the City of Hartford and supplied under a service contract. However, these agency providers are not located in geographic proximity to each other, with the OAT program being centered in the City of Hartford and The Threshold being located in the City of West Bend. Common maintenance services could, therefore, result in additional costs for deadheading vehicles to a common maintenance site.

Areas of coordination which have not been utilized but which appear to have some potential for the agency providers in the County include outreach and information coordination, volunteer driver coordination, and purchasing coordination. Under the first coordination concept, the outreach and information function of agencies would be combined into one "outreach coordination office." A client or prospective client who is having trouble getting transportation would contact one office to determine which agency or agencies could best provide suitable transportation. The referral given to the client would depend upon his or her eligibility, group residence, income, need for travel, and other factors established by the agencies themselves but communicated by the outreach coordination office to the client. The potential of this concept to reduce costs is limited; however, the concept offers the advantage of reducing confusion for those clients looking for an agency to provide transportation.

The second concept involves the merging of volunteer driver resources for all participating agencies into one large pool. This concept results in a larger pool of volunteers being available to each agency, thus reducing the possibility that a particular client cannot be served because of a lack of volunteers. Since three of the five agency transportation providers utilize volunteer drivers to provide transportation services, this concept warrants further examination.

Purchasing coordination is the bulk purchase of parts and supplies, which allows discounts and, therefore, cost savings to agencies. This concept would not be applicable to those two agency providers that utilize personal vehicles with volunteer drivers--the American Cancer Society and the Washington County Department of Social Services. However, purchasing coordination by the remaining three agency providers could be feasible, and could result in some cost savings for the individual agency transportation programs.

SUMMARY

Existing transit services provided within Washington County consist of specialized transportation services to certain population groups, local taxicab services, and intercity bus service. Specialized transportation is provided as both fixed and nonfixed route, special carrier service to students and to elderly, handicapped, and low-income persons residing within the County. Local taxicab services and intercity bus service are the only public transportation services available to the general public.

Specifically, fixed route, special carrier bus service is provided to more than 18,000 students by the 10 school districts having jurisdiction within Washington County, and to about 180 individuals per day by The Threshold. Nonfixed route, special carrier transportation services are provided by several public and private social service agencies, including the Washington County Office on Aging, which administers the Older Adult Transportation program--a demand-responsive transportation service provided to about 130 elderly and handicapped persons throughout the County; the American Red Cross, which provides transportation service to about 20 persons through two local chapters for medical and other essential purpose trips; the American Cancer Society, which provides transportation service to cancer patients for trips to and from area hospitals for radiation and chemotherapy treatments; and the Washington County Department of Social Services, which provides transportation services to about 10 persons who are members of low-income households and in need of transportation for medical and other essential purpose trips.

Local taxicab service is provided in two Washington County communities: the City of Hartford and the City of West Bend. In the City of Hartford, publicly subsidized, shared-ride taxi service is provided by the City of Hartford Municipal Recreation Department and is used by residents of the city to make about 1,200 one-way trips per month. In the City of West Bend, exclusive-ride taxi service is provided without public subsidy by two private taxicab companies, which together are used by residents of the city to make about 1,400 rides per month. Interregional bus service is provided by two private intercity bus companies having stops within the County: Greyhound Lines, Inc., and Wisconsin Coach Lines, Inc. These companies provide limited daily bus service to communities both within and outside the County.

Several deficiencies were noted in the current level of public transit service provided within the County. Specialized transportation services to priority population groups provide some degree of mobility to these groups, but often restrict the level and extent of usage through advance-reservation requirements or service-area limitations. While taxicab and intercity bus services do provide a significant portion of the general public in the County with local and long-distance transportation services, not all communities within the County are served by these services. Local taxicab services, while providing for local transportation to residents of the City of Hartford and the City of West Bend, charge additional fares for long-distance service to other areas of the County, which can result in high travel costs and discourage consideration of the taxi mode as a public transportation alternative for this type of travel within the County. Intercity bus service, while serving longer trips at a reasonable cost to the user, can be inconvenient and time-consuming to use because of the lack of a common stop or transfer point for the two routes within the County, and the limited amount of service offered in the County and long intervals between scheduled trips.

Existing efforts toward agency coordination of specialized transportation services include the vehicle scheduling and dispatching performed commonly for the OAT program and the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red

Cross by the City of Hartford Municipal Recreation Department; and the ride-sharing efforts involving the American Cancer Society, the Washington County Department of Social Services, and both local chapters of the American Red Cross. At the present time, the maintenance of the vehicles utilized by the agency transportation providers is not coordinated, and such coordination would not appear to be applicable. Coordination efforts not presently utilized but which appear to have merit for further consideration include coordinated outreach and information services, volunteer driver coordination, and parts and supply purchase coordination.

This chapter has set forth a description and analysis of the community public transit services currently provided within Washington County, and of the existing efforts toward coordination of the specialized transportation services offered by social service agencies within the County. Before alternative methods of correcting the transit deficiencies within the study area can be formulated, a review of existing legal, institutional, and financial constraints affecting the provision of mass transit services within the study area is necessary to complete the inventory and analysis phase of the planning process. A review of existing legislation pertaining to the provision of transit service in the study area is set forth in the following chapter.

Chapter V

EXISTING TRANSIT LEGISLATION AND REGULATIONS

INTRODUCTION

Legal, institutional, and financial constraints affecting the provision of public transit service are important considerations in the preparation of any transit service plan. This chapter summarizes legislation and related regulations existing at the federal, state, and local levels affecting the provision of general public and specialized transit services in Washington County. Federal legislation and related administrative rules regulate the availability and distribution of federal financial aid for research and demonstration projects, capital improvement projects, and operating subsidies. State legislation specifies the institutional structure for public transit systems and tax relief measures, and provides for operating subsidies and financial support of planning programs and capital improvement projects. Local ordinances include certain regulations affecting transit service and define the local role in the provision of public transit service.

FEDERAL LEGISLATION

Currently, federal aid for providing transportation services is available under several laws and their subsequent amendments. With regard to the provision of transportation services for residents of Washington County, the following sections describe the relevant provisions of four laws which provide for potential financial support of either general public or specialized transportation services.

Urban Mass Transportation Act of 1964, as Amended

The landmark Urban Mass Transportation Act of 1964 represented the first significant federal effort to provide for financial assistance of transit service by the establishment of a comprehensive program of matching grants for preserving, improving, and expanding urban public transit service. The stated purposes of the Act were: "1) to assist in the development of improved mass transportation facilities, equipment, techniques, and methods, with the cooperation of mass transportation companies both public and private; 2) to encourage the planning and establishment of areawide urban mass transportation systems needed for economical and desirable urban development, with the cooperation of mass transportation companies both public and private; and 3) to provide assistance to state and local governments and their instrumentalities in financing such systems, to be operated by public or private mass transportation companies as determined by local needs." The 1964 Act was subsequently amended by the Urban Mass Transportation Assistance Act of 1970, by the National Mass Transportation Assistance Act of 1974, and by the Surface Transportation Act of 1978. The federal reorganization of 1968 transferred responsibility for administering the Act from the U. S. Department of Housing and Urban Development to the U. S. Department of Transportation through the establishment of the Urban Mass Transportation Administration (UMTA) within that Department. Programs under the Act which offer designated eligible local recipients sources of federal funds to assist them in carrying out local public transportation projects are described below.

Section 3 Funds: Discretionary capital matching grants are authorized under Section 3 of the Urban Mass Transportation Act of 1964, as amended by the Surface Transportation Act of 1978. Section 3 grants are approved on a project-by-project basis at the discretion of the Secretary of the U. S. Department of Transportation.

They are intended primarily for state or local public agencies that operate or assist in the operation of transit systems in urbanized areas (urban areas having a central city of 50,000 or more population).¹ Section 3 grants provide up to 80 percent of the costs for eligible projects, which are limited to the construction of new and the extension of existing fixed guideway rapid transit systems, including the acquisition of real property, the initial acquisition of rolling stock needed for such systems, and the detailed alternatives analyses relating to the development of such systems; the acquisition, construction, reconstruction, and improvement of facilities and equipment for use in the provision of public transportation service; the introduction into public transportation service of new technology in the form of innovative and improved products; and joint development and urban initiative projects. In addition to being available as matching grants, Section 3 funds may be used as loans for the acquisition of real property and interest in real property for use as rights-of-way, station sites, and related purposes.² Urban transit systems within the Region that have utilized Section 3 funds include the Milwaukee County Transit System, serving primarily Milwaukee County; the Belle Urban System, serving the City of Racine; and the Kenosha Transit Commission, serving the City of Kenosha.

Section 5 Funds: Federal assistance in the form of formula grant program funds for urbanized areas is authorized under Section 5 of the Urban Mass Transportation Act of 1964 as amended by the National Mass Transportation Assistance Act of 1974. Under this program, Section 5 funds can be used by eligible recipients within the urbanized area either to defray transit operating expenses on a 50 percent federal-50 percent local matching basis, or to make transit capital improvements on an 80 percent federal-20 percent local basis. Under this program, funds for urbanized areas of 200,000 or more population are allocated directly to the designated recipients,³ and funds for urbanized areas of less than 200,000 population are allocated to the Governor.

With the passage of the Surface Transportation Act of 1978, the Section 5 assistance program was divided into four separate funding categories: 1) basic, or first-tier funding, 2) second-tier funding, 3) bus capital project funding, and 4) commuter rail/fixed guideway rapid transit funding. The basic, or first-tier, funds provided under the Section 5 program are distributed among the urbanized areas based upon a formula which takes into consideration both the population and population density of each area. These funds can be used to offset a portion of eligible operating and/or capital improvement expenditures. Second-tier funds are distributed using the same population-population density formula and may also be used for either operating or

¹The 1980 boundaries of the urbanized areas in southeastern Wisconsin have not as yet been delineated by the U. S. Bureau of the Census. Presently, however, the entire Village of Germantown and a small portion of the City of Milwaukee are the only portions of Washington County located within an urbanized area--namely, the Milwaukee urbanized area.

²Legislation under consideration by the U. S. Congress would alter the present Section 3 transit assistance program by immediately eliminating federal capital assistance for all new fixed guideway rapid transit systems and for joint development and urban initiative projects.

³Within the Milwaukee urbanized area, the Milwaukee, Ozaukee, Washington, and Waukesha County Boards have been designated as the recipient agencies of applicable Section 5 monies. Thus, any grant application for federal operating assistance to offset transit operating deficits incurred by transit service for the Village of Germantown would have to be submitted through the Washington County Board.

capital assistance projects. However, 85 percent of the second-tier funds are distributed to urbanized areas of 750,000 or more population, with the remaining 15 percent being distributed to urbanized areas of less than 750,000 population. Bus capital project funds may be used only for bus-related capital acquisition projects, including the purchase of buses and bus-related equipment, and the construction of bus-related facilities. The bus capital allocation, like the basic and second-tier allocation, is also based 50 percent on population and 50 percent on population density. The fourth category of Section 5 assistance, the commuter rail/fixed guideway allocation, is available only to those eligible recipients which operate commuter rail/fixed guideway facilities and services, of which there are none in the Region.⁴

All urban public transit services provided within the urbanized areas of the Region currently use Section 5 funds to partially support either operating or capital purchase costs.

Section 8 Funds: Grants for technical studies are provided under Section 8. Activities funded under this section include studies related to the management, operations, capital requirements, and economic feasibility of urban public transportation projects; the preparation of engineering and architectural surveys, plans, and specifications; the evaluation of previously funded transit projects; and other similar and related activities preliminary to and in preparation for the construction, acquisition, or improved operation of public transportation systems, facilities, and equipment. Typically, these technical study grants finance planning studies which recommend transit improvements. These improvements, in turn, may later be implemented with the assistance of capital and operating assistance grants. Although technical study grants may cover up to 100 percent of the study costs, current UMTA policy is to award all technical study grants on an 80 percent federal-20 percent local matching basis. Urban transit development studies conducted as a part of the Regional Planning Commission's continuing land use-transportation study are funded in part with Section 8 funds.

Section 16 Funds: Capital grants are available under Section 16 to equip a transit system to meet the specialized transportation needs of the elderly and handicapped. These grants are available to private, nonprofit agencies or corporations providing specialized transportation services. This aid is provided to fill service gaps in areas where existing transit vehicles and routings cannot safely or conveniently provide transportation service to the elderly and handicapped. Recipients of UMTA Section 16 funds within Washington County include The Threshold and the Hartford Chapter of the American Red Cross.

Section 18 Funds: Under Section 18 of the Urban Mass Transportation Act, a formula grant program is provided that offers public transportation assistance to small urban and rural public transportation systems in nonurbanized areas (areas of less than 50,000 population) of each state. The Section 18 program, administered by the U. S. Department of Transportation, Federal Highway Administration (FHWA) is designed to enhance the accessibility of people in nonurbanized areas to health care facilities, shopping centers, education facilities, recreation areas, public service facilities, and employment centers by encouraging the maintenance, development, improvement, and use of public transportation services. Under this program, funds are apportioned to each state based upon the population of the nonurbanized areas, and may be used for capital equipment purchases on an 80 percent federal-20 percent local matching basis,

⁴*Legislation now under consideration by the U. S. Congress would alter the current Section 5 transit assistance program by eliminating by 1985 federal subsidies used to partially offset operating deficits for urban transit services.*

for operating assistance on a 50 percent federal-50 percent local matching basis,⁵ or for the conduct of planning studies. Eligible recipients of these funds include state agencies, local public bodies, nonprofit organizations, and operators of public transportation services. Within the State of Wisconsin, the Wisconsin Department of Transportation administers the Section 18 program for the FHWA and is the recipient of all Section 18 funds apportioned to the State. This Washington County transit service study is being conducted on a contract basis using Section 18 funds made available for planning purposes by the Wisconsin Department of Transportation. Because the Village of Germantown is part of the Milwaukee urbanized area, transit services for this area of Washington County are not eligible for assistance under this Section 18 program. Section 18 funds represent the primary source of federal funds which could be available to support general public transit service in Washington County should such service be deemed feasible. The City of Hartford received Section 18 funds to support its shared-ride taxicab service in 1981.

UMTA Administrative Regulations: The availability of federal funds under the previously described Urban Mass Transportation Act of 1964, as amended, is restricted by several administrative regulations. Below are the more important of these regulations which have relevance to the use of UMTA and FHWA funds within Washington County:

1. No grants will be made unless the facilities and equipment proposed are part of a program for the development of a unified or officially coordinated transportation system within the comprehensively planned development of the area.
2. All applications for Sections 3, 5, and 18 assistance projects must be supported by a regularly updated transit development program prescribing a staged, multiple-year program of federally and nonfederally funded mass transportation improvements as set forth in an adopted transportation systems management plan. This must be supplemented by an annual program of projects incorporating Sections 3 and 5, or Section 18, projects. Progress in the implementation of previously programmed projects must be demonstrated in order for federal funding of projects to continue.
3. When federal funds provide part of the cost of a project, the remaining share must come from sources other than federal funds, with the exception of federal revenue sharing funds and funds from federal programs (other than UMTA or FHWA programs) which have been certified to be eligible as local share funds. In order for funds from federal programs to be eligible as local share funds, the UMTA and FHWA require certification by the sponsoring federal program agency that the funds to be used as local match money for UMTA or FHWA grant programs will be used in accordance with all requirements and regulations governing the distribution and expenditure of the particular program's funds.
4. All applicants for Section 5 funds must guarantee that current levels of non-federal public transportation funding will be maintained. The level must be equal to the average amount of state and local government funds and nonfare box public transportation revenues, excluding reimbursements for the transportation of school children, expended on the operation of public transportation service during the two years preceding the application.
5. All project applications must include a detailed submission indicating compliance with the provisions of Title VI of the Civil Rights Act of 1964 regarding nondiscrimination on the grounds of race, color, or national origin.

⁵Legislation under consideration by the U. S. Congress would alter the present Section 18 program by eliminating transit operating assistance funds after 1982.

Nondiscriminatory practices must be demonstrated for all UMTA-supported activities regarding: a) the distribution of transit facilities and services and the benefits derived from such facilities and services; b) the locational accessibility of transit facilities and services; c) the adverse impacts of transit facilities and services on persons residing in the affected communities; and d) the opportunity and ability to participate in the planning, programming, and implementation of transit facilities and services.

6. Public transportation programs and activities receiving federal financial assistance must comply with Section 504 of the Rehabilitation Act of 1973 regarding nondiscrimination on the basis of handicap. In order to comply with the federal regulations promulgated to implement the provisions of Section 504 as they apply to public transportation, funding recipients must meet the following requirements:
 - a. Funding recipients who employ 15 or more persons must adopt and file with the U. S. Department of Transportation procedures that incorporate appropriate due process standards which provide for the prompt and equitable resolution of complaints or grievances alleging any discriminatory action prohibited by federal regulations.
 - b. Funding recipients must submit to the U. S. Department of Transportation certification that "special efforts" to provide transportation services that handicapped persons can effectively use are being made within their transit service area.
7. All capital project applications must include a detailed statement on the environmental impact of the proposed project. Buses acquired with federal assistance must meet the emission standards under Section 202 of the Clean Air Act and Section 6 of the Noise Control Act and, whenever possible, must meet special criteria for low-emission vehicles and low-noise emission products. In addition, Section 5 capital projects must include an analysis to consider the best overall public interest in relation to such factors as:
 - a. Air, noise, and water pollution.
 - b. Destruction or disruption of man-made and natural resources, aesthetic values, community cohesion, and the availability of public facilities and service.
 - c. Adverse employment effects and tax and property value losses.
 - d. Injurious displacement of people, businesses, and farms.
 - e. Disruption of desirable community and regional growth.
8. No federal assistance may be provided for any construction project unless an adequate housing relocation program is developed for any families displaced by the project. Financial assistance obtained may be used to help defer relocation costs, not to exceed specified amounts.
9. All applications for federal assistance must certify that they have afforded an adequate opportunity for public hearings on each proposed project. For Section 3, 5, and 18 projects, notice for the hearing must be given at least 30 days in advance, and such notice must inform the public of all significant

economic, social, or environmental issues and invite them to examine all project documents. Public hearings must be held prior to increases in general levels of transit fares, or substantial changes in transit services.

10. No federal assistance may be provided for the purchase or operation of buses unless the applicant first agrees not to engage in charter bus operations in competition with private bus operators outside the area where the applicant provides regularly scheduled service. The applicant must also agree to charge a rate which will cover the entire cost of providing the charter bus service.
11. No federal assistance may be provided for the purchase or operation of buses unless the applicant agrees not to engage in school bus operations for the exclusive transportation of students and school personnel in competition with private school bus operators. This rule does not apply, however, to tripper service provided for the transportation of school children along with other passengers by regularly scheduled bus service at either full or reduced rates.
12. No federal financial assistance may be provided until fair and equitable arrangements are made as determined by the Secretary of Labor to protect the interests of employees affected by such assistance. Such arrangements must include provisions protecting individual employees against a worsening of their positions with respect to their employment, collective bargaining rights, and other existing employee rights, privileges, and benefits.
13. All accounting systems for all transit systems eligible for federal aid must conform to a uniform system of account and record-keeping. This system, entitled "Uniform System of Accounts and Records," is used to facilitate a clear definition of the economics and operating conditions of a transit system in the interest of more efficient planning, administration, and operation.

Social Security Act of 1935, as Amended

Title XX of the Social Security Act of 1935, as amended, is one of two sources of federal funds presently used to support specialized transportation services provided by the Washington County Department of Social Services. The Title XX program--Services to Individuals and Families--is a federal-state formula grant program allocated to each state on a 75 percent federal-25 percent state matching basis which provides for the provision of social services, including transportation, to individuals who meet income criteria established by each state or who are recipients of funds under the Aid to Families with Dependent Children or Supplemental Security Income programs. In order to qualify for Title XX monies, states are required to develop and implement a plan for social services which meets the needs of their residents and which supports five national goals. These goals are: economic self-support; personal self-sufficiency; protection of the individual and prevention of personal and social dysfunction; community-based living alternatives; and appropriate care in institutions. In Wisconsin, the services which address these goals are usually provided by county departments of social services. Transportation is a state-required service under the Title XX goals of economic self-support and protection of the individual.

In Wisconsin, the Title XX program is administered by the Wisconsin Department of Health and Social Services under the state Grants-In-Aid Program of Community Aids for Social and Mental Health Services. Community aids include categorical funds for special programs. However, the bulk of the community aids is distributed as block grants on a formula basis to county social service departments, human service departments, and community service agencies. Within Washington County, the Washington County Department of Social Services utilizes Title XX funds available through the state community aids program to support specialized transportation services.

Federal Rehabilitation Act of 1973

Title I of the Federal Rehabilitation Act of 1973 authorizes federal assistance for programs designed to restore or develop skills and work habits needed by handicapped persons to obtain jobs in the competitive market. Similar to the Title XX program described above, the Title I program distributes federal funds to the states on an 80 percent federal-20 percent state matching basis. The Wisconsin Department of Health and Social Services, Division of Vocational Rehabilitation, administers this federal aid program in the State directly through a system of counselors located in field offices throughout the State. Each field office has a specific geographic service area consisting of one or more counties. Allocation of funds within the State is based on several factors, including the estimated number of disabled persons in the service area. Within Washington County, The Threshold is a recipient of Title I funds through the Division of Vocational Rehabilitation.

Services eligible for Title I funding include education; training; job placement; counseling; and physical restoration involving artificial limbs, mechanical aids, or other services which will enhance the individual's employability. Eligibility for vocational rehabilitation services is established when a person has a physical, sensory, or mental disability which results in a substantial handicap to employment, and when there is a reasonable expectation that vocational rehabilitation will improve an individual's employment prospects.

No specific grant for transportation is made under this program. However, transportation may be purchased for vocational rehabilitation clients, or the clients themselves may be reimbursed for travel expenses. In either case, eligible transportation expenses must be incurred for travel to and from vocational rehabilitation services. Both capital and operating expenses can be reflected in a rate paid for transportation, but capital equipment, such as a van or private automobile, is not ordinarily purchased through this program.

Older Americans Act of 1965

Title III of the Older Americans Act of 1965, as amended, authorizes federal assistance for programs designed to foster the development of comprehensive and coordinated services for older persons which will enable them to live with maximum independence in the home of their choice. The Title III program annually allocates Wisconsin and other states with a grant of funds, the majority of which are then allocated by the Bureau on Aging within the Wisconsin Department of Health and Social Services, Division of Community Services, through the area agencies on aging to the counties and American Indian tribes within the State. Each county or Indian tribe must match its allocation on a 90 percent federal-10 percent local basis.

One objective of the program is to aid elderly persons who need selected supportive services to maintain their independence. Therefore, the program's regulations state that Title III aid should be used where necessary to make services accessible to the elderly through the development and support of secondary services such as transportation. Title III money is not, however, earmarked by the state or state or federal government for transportation.

Transportation services funded with Title III money are available to any person who is 60 years of age or older. There are no state or federal restrictions on trip purposes. However, counties and tribes must provide those transportation services that are determined to be of greatest need. The program does not allow fixed fees to be charged for transportation services. General operating expenses of transportation systems may be paid. Capital purchases (such as the purchase of vans or buses) can also be funded if clearly needed, and if such purchases will be fully utilized among

all service providers. No Title III funds are being used to support the transportation programs of the agency transportation providers in Washington County. However, Title III funds have been used in previous years by the Washington County Office on Aging to support the operation of the Older Adult Transportation program and by the City of Hartford to purchase vehicles used in providing the service.

Title III also includes an elderly nutrition program that was authorized separately under Title VII of the Older Americans Act until late 1979. The former Title VII authorized and funded not only noon meal programs, but also transportation services to and from those programs. In 1980, the nutrition program was "folded into" Title III, and transportation could no longer be charged as an expense to a nutrition program. Transportation can still be provided under Title III, but only as a support service not exclusively connected with the nutrition program.

STATE LEGISLATION

Two types of legislation which affect the provision of public transportation services have been enacted by the State of Wisconsin: 1) legislation authorizing financial assistance for the provision of general public and specialized transportation services, and 2) legislation involving the administrative regulations and controls governing the establishment and operation of transit services.

Financial Assistance

General Public Transportation Assistance Programs: Financial assistance provided by the State for general public transportation includes indirect aid, principally in the form of tax relief, and direct aid in the form of operating subsidies and planning grants. Indirect aid to urban public transit systems in Wisconsin was introduced in 1955 on the basis of the findings and recommendations of the 1954 Governor's Study Commission on Urban Mass Transit. The most significant of the 1955 measures is Section 71.18 of the Wisconsin Statutes, which provides a special method that can be used by privately owned urban public transit organizations to calculate their state income tax. To encourage urban bus systems to invest their profits in new capital facilities and stock, the formula provides that net income after payment of federal income taxes is taxed by the State on the following basis:

1. An amount equivalent to 8 percent of the depreciated cost of carrier operating property is exempt from the tax; and
2. The remaining portion of the net income is taxed at a rate of 50 percent.

Other Wisconsin Statutes giving urban public transportation systems tax relief are:

1. Section 76.54, which prohibits cities, villages, and towns from imposing a license tax on vehicles owned by urban transit companies.
2. Section 78.01 (2)(d), which excludes vehicles engaged in urban public transportation from the special fuel tax imposed upon gasoline used in vehicle operation.
3. Section 78.40 (2)(c), which excludes vehicles engaged in urban public transportation from the special fuel tax imposed upon the special fuel used in vehicle operation.
4. Section 78.75(1)(a), which allows taxi companies to obtain rebates of the \$0.11 per gallon paid in state fuel tax.

5. Section 85.01 (4)(dm), which requires that each vehicle engaged in urban public transportation service be charged an annual registration fee of \$1.00.

Direct financial aid for public transit became available with passage of the 1973 State Budget Act, which established two transit aid programs to be administered by the Wisconsin Department of Transportation. The first program, set forth in Section 85.05 of the Wisconsin Statutes, provided \$5 million in general-purpose revenue funds during the 1973-1975 biennium for operating assistance; the second program, set forth in Section 85.06 of the Wisconsin Statutes, provided \$2 million in general-purpose revenue funds for planning and demonstration projects. These programs were continued under the 1975 State Budget Act, which increased the allocation available for public transit operating assistance for the 1975-1977 biennium to \$6.8 million.

Passage of the 1977 State Budget Act enabled, for the first time, monies from the State Transportation Fund to be used for transit projects. In addition to substantially increasing the biennial appropriation for the State's urban public transit operating assistance program to \$17.5 million, the 1977 State Budget Act contained two major changes to the State's transit aid programs under Sections 85.05 and 85.06. Beginning with calendar year 1979, state urban transit operating assistance funds were allocated based upon a system which guaranteed each transit system a base amount of financial assistance, and which allocated supplemental funds which were distributed based on formulas which incorporated factors indicating for each transit system the relative increase in annual operating deficits over those of the previous year and its share of total statewide transit ridership. Secondly, the State's public transit planning and demonstration program was substantially reduced in size and limited to transit planning and technical assistance activities undertaken by the Wisconsin Department of Transportation, thereby eliminating state-funded public transit demonstration projects. Other significant changes to the statutory language of Section 85.05 included: the broadening of the definition of public transit to specifically include shared-ride taxicabs; the limiting of communities eligible for state transit operating assistance aids to those with populations of 5,000 or more; the requirement that a transit system provide a reduced-fare program for elderly and handicapped persons during nonpeak hours of operation in order to be eligible for state operating assistance transit aids; and the exemption of all transit systems receiving state aids under Section 85.05 from regulation by the Wisconsin Transportation Commission. The 1979 State Budget Act and the 1980 State Budget Review Act continued funding for the urban transit operating assistance program. Approximately \$37.5 million for urban transit operating assistance was appropriated for this program during the 1979-1981 biennium.

The 1981 State Budget Act appropriated a total of \$58.6 million for the state urban transit operating assistance program, and proposed significant changes to the program. Under the current operating assistance program which will remain in effect through calendar year 1981, local public bodies in urban areas having public transit services are eligible for reimbursement by the State of Wisconsin of up to 72 percent of the nonfederal share of the operating deficit--not to include return on investment--incurred on their local transit systems. Beginning with calendar year 1982, the basis for distributing state aids under this program will be total operating costs rather than operating deficits, with the maximum amount of state aids a recipient can receive under the program being established at 30 percent of total system operating costs. The 1981 State Budget Act also renumbered the authorizing statute for this program from Section 85.05 to Section 85.20 of the Wisconsin Statutes. The City of Hartford received about \$11,100 under the state transit operating assistance program in 1981 to support its shared-ride taxicab service.

Only those local public bodies that provide financial operating assistance to, or that actually operate, an urban mass transit system are eligible for state urban

transit operating assistance. In addition, eligible projects must provide at least two-thirds of their transit service--measured in vehicle miles--within an urban area. Other restrictions of the State's operating assistance program include the following:

1. Projections of operating revenues and expenses must be based on an approved one-year "management plan" governing the operations of the participating transit system during the contract period.
2. The commitments of state funds and quarterly payments must be based upon projections of operating revenues and operating expenses for a calendar year contract period.
3. Departmental audits of each participating transit system must determine the actual operating deficit of the system during the contract period.
4. Contracts between the Wisconsin Department of Transportation and recipients may not exceed one year in duration.
5. Recipients must annually submit to the Wisconsin Department of Transportation a four-year program of transit improvement projects for their systems.

The 1979 State Budget Act provided for further expansion of the state aid programs available to public transportation providers through the creation of a state program which provided for capital assistance to urban transit systems. The program, authorized under Section 85.055 of the Wisconsin Statutes, allowed those cities and counties that were eligible for state urban public transit operating assistance to apply for state aids to pay up to 50 percent of the costs of purchasing buses. This program was appropriated \$2.0 million for the 1979-1981 biennium, but was discontinued by the 1981 State Budget Act.

The 1979 State Budget Act also created new statutory language under Section 85.08(7) of the Wisconsin Statutes to allow the Wisconsin Department of Transportation to expand and pass on federal funds for rural and small city public transportation services as authorized under Section 18 of the Urban Mass Transportation Act of 1964, as amended. The Department of Transportation, under a set of administrative policy and procedural guidelines, administers the Section 18 program for the FHWA, and is responsible for distributing the statewide Section 18 allocation among small urban and rural transit operators for capital and operating assistance projects and the Department itself for administrative purposes and technical projects. As previously noted, the City of Hartford in Washington County used Section 18 funds in 1981 to purchase the vehicle and support the operating costs of its shared-ride taxi service. The authorizing statute for this program was changed by the 1981 State Budget Act to Section 85.23 of the Wisconsin Statutes.

Specialized Transit Assistance Programs: The 1977 State Budget Act created two funding programs for elderly and handicapped specialized transportation services under Section 85.08 of the Wisconsin Statutes to be administered by the Wisconsin Department of Transportation. The 1981 State Budget Act subsequently amended these programs and changed the authorizing Statutes to Section 85.21 and Section 85.22. Section 85.21 authorizes the provision of financial assistance to counties within the State for specialized transportation programs serving elderly and handicapped persons who would not otherwise have an available or accessible method of transportation. A proportionate share of funds under this state program is allocated to each county in Wisconsin based on the estimated percent of the total statewide elderly and handicapped population residing in the county. In general, counties may use these funds for either operating assistance or capital projects to directly provide transportation services for the elderly and handicapped; to aid other agencies or organizations

which provide such services; or to create a user-side subsidy program through which the elderly and the handicapped may purchase transportation services from existing providers at reduced rates. In order to receive their allocations, counties must provide a local match equal to 10 percent of their allocations. Transportation services supported by funds available under this program may, at the direction of the county, carry members of the general public on a space-available basis, provided that priority is given to serving elderly and handicapped patrons. In addition, Section 85.21 requires that a "copayment" or fares be collected from all users of the specialized transportation service. Funding for this program during the 1981-1983 biennium was established at \$5.8 million by the 1981 State Budget Act. The Washington County Office on Aging currently participates in this program to help support the Older Adult Transportation program. The 1981 budget for the county transportation program utilized approximately \$31,500 obtained under this state program.

The second of the State's elderly and handicapped transportation programs, authorized under Section 85.22 of the Wisconsin Statutes, supplies private, nonprofit organizations that provide transportation services to the elderly and handicapped with financial assistance for the purchase of capital equipment. This program represents the State's component of the previously referenced federal aid program authorized under Section 16(b)(2) of the Urban Mass Transportation Act of 1964, as amended. The state aids available under this program are distributed to applicants within the State on an 80 percent state/federal-20 percent local matching basis. The program is administered jointly with the federal Section 16(b)(2) program by the Wisconsin Department of Transportation, with the highest ranked applicants receiving 80 percent federal grants and the lower ranked applicants receiving 80 percent state grants until both federal and state funds are exhausted. In all cases, the applicant is responsible for providing the 20 percent local share of capital project costs.

The state Grants-In-Aid Program of Community Aids for Social and Mental Health Services provides the basic fiscal means by which the Wisconsin Department of Health and Social Services provides financial assistance to the counties in order to develop and operate a statewide system of comprehensive human services. Community aids are composed of monies from state general revenues and, as previously noted, Title XX of the Social Security Act of 1935, as amended. The funds are distributed on a formula basis to county departments of social services, human service departments, and community service agencies. Transportation and other services offered under this program are authorized under Sections 51.42(8) and 49.51(3) of the Wisconsin Statutes. Under this program, funds can be used to provide transportation services only to low-income persons receiving aid from county departments of social services and persons receiving care or treatment from county community service agencies for mental illness, developmental disabilities, alcoholism, or drug abuse. Recipients of state aids under this program within Washington County include the Washington County Department of Social Services and the Washington County Comprehensive Community Service Agency.

Administrative Regulations and Controls

In addition to providing financial assistance to urban public transit systems within the State, the Wisconsin Statutes provide many organizational alternatives to counties for the operations of an urban public transit system. The following state legislation defines municipal government powers for operation of a transit system:

1. Municipal Contract with Private Transit System Operator--Section 66.064 of the Wisconsin Statutes permits a city or village served by a privately owned urban public transit system to contract with the private owners for the leasing, public operation, joint operation, subsidizing, or extension of service of the system.

2. Municipal Operation of Transit System--Section 66.065(5) of the Wisconsin Statutes provides that any city or village may, by action of its governing body and with a referendum, vote to own, operate, or engage in an urban public transit system in either of two circumstances; 1) if the city or village does not have an existing urban public transit system; or 2) if the city or village does have an existing urban public transit system and the city had: a) obtained the consent of the existing system operator, b) been empowered to do so by the State Legislature, or c) secured a certificate of public convenience and necessity from the Wisconsin Transportation Commission. The first provision would apply at this time to the local municipalities within Washington County. This section of the Wisconsin Statutes permits a city or village to establish a separate department to undertake transit operation under municipal ownership or to expand an existing city department to accommodate the added responsibility of municipal transit operation. Thus, the local municipalities within Washington County could establish a new transit department or expand an existing department if any municipality were to establish a new transit system.
3. City Transit System--Section 66.943 of the Wisconsin Statutes provides for the formation of a city transit commission composed of not fewer than three members appointed by the mayor and approved by the city council. No member of the commission may hold any other public office. The commission is empowered to "establish, maintain, and operate a bus system, the major portion of which is located within, or the major portion of the service is supplied to, such a city." Initial institution of the urban transit system is subject to the limitations of Section 66.065(5) of the Wisconsin Statutes discussed above. The city transit commission is permitted to extend the urban transit system into adjacent territory beyond the city but not more than 30 miles from the city limits. In lieu of directly providing transportation services, the transit commission may contract with a private organization for such services.
4. City Transit-Parking Commission--Sections 66.068, 66.079, and 66.943 of the Wisconsin Statutes provide for the formation of city transit and city parking commissions. A combined transit-parking commission may be organized under this enabling legislation, and not only may have all of the powers of a city transit commission, as defined under Section 66.943 of the Wisconsin Statutes discussed above, but may be empowered to regulate and operate on-street and off-street parking facilities as well.
5. Municipal Transit Utility--Section 66.068 of the Wisconsin Statutes provides for the management of a public utility. The statutes provide for the formation of a management board of 3, 5, or 7 commissioners elected by the city council or village or town board to supervise the general operation of the utility. Initial institution of the urban transit system as a public utility is subject to the limitations of Section 66.065(5) of the Wisconsin Statutes discussed above. In cities with populations of less than 150,000, the city council may provide for the operation of the utility by the board of public works or by another officer in lieu of the above commission.
6. Joint Municipal Transit Commission--Section 66.30 of the Wisconsin Statutes permits any municipality to contract with another municipality or municipalities for the receipt or furnishing of services or the joint exercise of any power or duty authorized by statute. For purposes of this law, a "municipality" is defined as any city, village, town, county, or regional planning commission. Thus, the law would permit any city or village to contract with any other county, city, or village to receive or furnish transit services or even to establish a joint municipal transit commission.

Below is state legislation defining county government powers for operation of a transit system:

1. County Contract with Private Transit System Operators--Sections 59.968(1) to (3) of the Wisconsin Statutes permit a county to financially assist private urban public transit companies operating principally within the county by: 1) direct subsidies, 2) purchasing buses and leasing them back to the private company, and 3) acting as the agent for the private operator in filing applications for federal aid.
2. County Ownership and Operation of Transit Systems--Sections 59.98(4) to (8), 59.969, 63.03(2)(x), and 67.04(1)(aa) of the Wisconsin Statutes permit a county to acquire a transportation system by purchase, condemnation, or otherwise and to provide funds for the operation and maintenance of such systems. "Transportation system" is defined as all land, shops, structures, equipment, property, franchises, and rights of whatever nature for the transportation of passengers. The acquisition of a transit system must be approved by a two-thirds vote of a county board. The county would have the right to operate into contiguous or cornering counties. However, where such operation into other counties would be competitive with the urban or suburban operations of other existing common carriers of passengers, the county must coordinate the proposed operations with such other carriers to eliminate adverse financial impact for such carriers. Such coordination may include, but is not limited to, route overlapping, transfers, transfer points, schedule coordinations, joint use of facilities, lease of route service, and acquisition of route and corollary equipment. The law permits a county to use any street for transit operations without obtaining a license or permit from the local municipality concerned. The law requires the county to assume all the employer's obligations under any contract between the employees and management of the system and to negotiate an agreement protecting the interest of employees affected by the acquisition, construction, control, or operation of the transit system. This labor protection provision is similar to Section 13(c) of the Federal Urban Mass Transportation Act of 1964, as amended. Milwaukee County assumed public ownership of the Milwaukee and Suburban Transport Company under provision of these statutes.
3. County Transit Commission--Section 59.967 of the Wisconsin Statutes provides for the creation of county transit commissions which are authorized to operate a transportation system to be used chiefly for the transportation of persons or freight. A county transit commission is to be composed of not less than seven members appointed by the county board. Members of the transit commission may not, however, hold any other public office. A county transit commission is permitted to extend its transit system into adjacent territory within 30 miles of the county boundary. Initial institution of the transit system is subject to the limitations of Section 66.065 of the Wisconsin Statutes. This statute also allows any county to contract under Section 66.30 to establish a joint municipal transit commission.

State legislation also provides for the formation of certain special public transit districts and authorities. Section 66.94 of the Wisconsin Statutes permits the establishment of a metropolitan transit authority having the legal power to acquire, operate, and maintain a public transportation system. A public transportation system is defined to include subways, railways, and buses. The largest city within the boundaries of the metropolitan transit authority must have a population of 125,000 or more. Therefore, this act could apply to the Milwaukee urbanized area, of which the Village of Germantown is a part. Significantly, authorities created under the enabling legislation do not have taxing powers.

Prior to January 1978, the regulation of public and private utilities, railroads, and common motor carriers⁶ was the responsibility of the Wisconsin Public Service Commission. With the passage of the 1977 State Budget Act, a new regulatory body, the Wisconsin Transportation Commission, was created from the then existing Wisconsin Highway Commission and charged with the transportation regulatory functions formerly assigned to the Public Service Commission. The Wisconsin Transportation Commission holds the authority to regulate certain matters pertaining to the daily operations of both public and private transit operators within the State, except, as previously noted, those transit systems which receive state aids for operating assistance under Section 85.05 of the Wisconsin Statutes. Transit systems receiving state financial aids are subject to direct regulation by the Wisconsin Department of Transportation.

Current regulations require public or private organizations wishing to provide public transit services to file an application with the Wisconsin Transportation Commission in order to receive a common carrier certificate. The application may be either for original authority or for the transfer of assignment from an existing authority. The Transportation Commission also regulates the fare structure, route configuration, and schedules established by transit operators. No changes in the base fare, route structure, or schedule may be made without the approval or order of the Transportation Commission. Present procedure requires that a transit operator file a report containing intended changes and the justification for those changes with the Transportation Commission and with the clerk of the affected municipality at least five days in advance of the proposed change. Depending on the circumstances, the extent of the change, and the evidence presented at the time of the request, the Transportation Commission may approve the change, disapprove the change, or order a public hearing concerning the change. The Transportation Commission does have the power of special approval, as the public interest may require, to authorize changes on less notice than is required by the guidelines set above, especially when the affected municipality has no objections. Any action by the Transportation Commission on an informal basis is subject to reconsideration or public hearing if a proper complaint or protest is made. Finally, all transit operators are required to file annual and monthly reports with the Transportation Commission that include such information as revenues, expenses, vehicle miles of travel, and vehicle hours of operation. To ensure strict compliance with this function, the Commission may also, upon demand, inspect the accounts and records of all common motor carriers.

LOCAL LEGISLATION

Existing transit legislation at the local level is confined to the regulation of taxicab services. Chapter 45 of the West Bend Municipal Code governs the license and operation of taxicab companies within the City of West Bend. Included within the ordinance are provisions for the licensing of each taxicab company and taxicab driver. The ordinance requires vehicles to be regularly maintained and inspected by city officials and requires taxicab companies to carry set minimum amounts of insurance. The taxicab ordinance restricts the provision of shared-ride taxi service

⁶Section 194.01 of the Wisconsin Statutes defines "common motor carrier" as any individual, company, or association which indicates to the public a willingness to undertake for hire the transport by motor vehicle between fixed termini or over a regular route upon public highways passengers or property other than farm products or supplies transported to or from farms. "For hire" means for compensation, and includes compensation obtained by a motor carrier indirectly. The transport of passengers in taxicabs is not considered to be a common motor carrier service.

unless permission is given by the first passenger served. The ordinance also prohibits the pickup and delivery of passengers along the route of a common motor carrier unless specifically requested and dispatched to do so.

Section 32.07 of the Hartford Municipal Code governs the license of taxicab operators within the City of Hartford. The ordinance requires that any person, firm, or corporation operating a taxicab service must be licensed by the City and, prior to receiving such a license, must pass an investigation of character and provide evidence of sufficient liability insurance coverage to the City Clerk. Unlike the ordinance for the City of West Bend, this ordinance does not restrict taxicab operators from providing service under a shared-ride mode of operation.

LEGISLATIVE ANALYSIS

Publicly owned and operated urban transit systems have not been able to support their operations from passenger revenue alone. This is particularly true when fares are kept low for the general public and even lower for special groups such as the elderly and handicapped. In exploring the feasibility of countywide general transit service in Washington County, it is important to explore all possible sources of state and federal financial assistance which may be used to reduce any local financial burden associated with the provision of such service.

As noted earlier, there is a program under Section 18 of the Urban Mass Transportation Act of 1964, as amended, that provides federal funding for small urban and rural transit services. This program, which is currently being utilized within the County by the City of Hartford, is the primary federal program which can provide a portion of the financial aid necessary for the capital and operating expenditures associated with the establishment of general public transit services within Washington County. To become eligible for this program, a number of federal requirements must be met by the County. This transit service study, when considered within the framework of the Regional Planning Commission's comprehensive, areawide transportation planning program, is intended to meet all planning requirements. In this respect, should general public transportation be deemed feasible in the County, later chapters of this report will identify a five-year program of transit development projects for inclusion in the transportation improvement program and transportation systems management plan for the Region.

Any general public transit service believed to be feasible for Washington County should participate in the state general public transit operating assistance program, as state aids could be used to further reduce the local financial burden. Participation in the State's transit operating assistance program would also exempt the County from regulation by the Wisconsin Transportation Commission, thus reducing additional administrative concerns.

State and federal regulations for transportation funding programs can cause barriers to the coordination of services. For example, the UMTA Section 18 and Section 16 programs are presently utilized to obtain funds used to support transit services in Washington County. However, vehicles purchased with funds obtained through a UMTA 16(b)(2) grant are limited to use by elderly and handicapped persons and cannot be utilized to provide general public transit service, which can be funded under Section 18. In addition, restrictive eligibility requirements for federal and state human service programs providing specialized transportation can inhibit agency coordination by limiting the ability to place the clients of one program on the transportation provided by another, even though it may be more efficient to do so.

The Wisconsin Statutes provide several institutional alternatives for the provision of general transit services by both municipal and county governmental bodies, ranging from subsidization of a private carrier to public ownership and operation. While subsidization of a private carrier may not require a large capital outlay by a municipality or county and would eliminate almost all involvement of a municipality or county in the day-to-day operational problems of any proposed transit service or system, it has a major disadvantage in that the governmental unit lacks direct control over the levels and costs of services provided. Some level of public control in providing transit service is generally necessary to ensure that both quality of service and efficiency of operation are maintained.

Local legislation pertaining to transit service was limited to similar ordinances within the City of Hartford and City of West Bend governing licensing and operation of taxicab services. As previously mentioned, a major difference between the two ordinances is the type of taxicab service allowed within each community. The Hartford Municipal Code specifies no restriction with regard to how passengers can be transported. The West Bend Municipal Code, however, restricts taxi operators to providing exclusive-ride service to passengers unless authorized by the first taxicab passenger to share the service with other passengers. Only shared-ride taxicab services, such as the service provided in the City of Hartford, are eligible for federal and state financial assistance, whereas exclusive-ride taxi services are not eligible for such aid. Consequently, the exclusive-ride nature of taxicab services in the City of West Bend would restrict the eligibility of these services for federal and state financial subsidies.

SUMMARY

This chapter has summarized pertinent federal, state, and local legislation and regulations as they apply to the provision of financial assistance for general and specialized transportation service, and as they apply to transit organization and operation. The federal government is a major source of financial assistance for general and specialized public transit services through four major programs relevant to Washington County. The Urban Mass Transportation Administration administers several programs made available under the Urban Mass Transportation Act of 1964, as amended. Financial assistance for urban public transit systems is available under Section 3 for capital purchase projects and rapid transit system construction costs, and under Section 5 on a formula grant basis to urbanized areas for operating assistance or capital equipment purchases. Financial assistance under Section 8 is available for technical studies. Section 16 provides financial assistance for the purchase of vehicles and equipment to private nonprofit agencies or corporations that provide specialized transportation to elderly and handicapped individuals. Section 18, which represents the primary source of federal funds available to Washington County for rural transportation, provides operating and capital assistance for rural public transit projects.

Federal financial assistance is also available for specialized transportation under three programs which provide human services. Title XX of the Social Security Act of 1935, as amended, provides financial assistance for services designed to aid low-income individuals. Title I of the Federal Rehabilitation Act of 1973 authorizes federal assistance for programs designed to restore and develop skills and work habits needed by handicapped persons to obtain jobs in the competitive market. Title III of the Older Americans Act of 1965, as amended, authorizes federal assistance for programs designed to foster the development of services for older persons to enable them to live with maximum independence in the home of their choice. All three programs allow the use of financial assistance for specialized transportation

services which aid in attaining other program goals. Numerous regulations must be met before an application for federal funds under any of the four federal programs can be approved.

The Wisconsin Statutes provide several programs for financing transportation services. The Wisconsin Department of Transportation administers programs providing financial assistance for both general and specialized transportation, including: an urban transit operating assistance program authorized under Section 85.20 of the Wisconsin Statutes which provides operating assistance to communities with populations of more than 5,000 persons supporting general public transit systems; a specialized transportation assistance program authorized under Section 85.21 of the Wisconsin Statutes which provides financial assistance to counties for elderly and handicapped transportation projects; a specialized transit assistance program authorized under Section 85.22 of the Wisconsin Statutes which, together with funds available through the UMTA Section 16(b)(2) program, provides capital assistance to private nonprofit organizations providing specialized transportation services; and a program for distributing UMTA Section 18 rural transit funds to applicants within the State authorized under Section 85.23 of the Wisconsin Statutes. The Wisconsin Department of Health and Social Services administers a program under the State Grants-In-Aid Program which provides financial assistance for human service projects, which can include transportation.

The Wisconsin Statutes also provide several organizational alternatives to municipalities and counties for the operation of public transit services. For municipalities, these alternatives include: contract for services with a private operator; public ownership and operation as a municipal utility; and public ownership and operation by a single municipal or joint municipal transit commission. For counties, these alternatives include: county contract for services with a private operator; county ownership and operation of an existing or new county department; and county ownership and operation through a single county or joint county transit commission.

The Wisconsin Statutes provide for the regulation of common motor carriers by the Wisconsin Transportation Commission except those operators receiving state transit operating assistance funds. The Wisconsin Department of Transportation regulates those operators exempted from regulation by the Wisconsin Transportation Commission.

Local legislation in Washington County pertaining to transit service is limited to similar ordinances in the City of Hartford and the City of West Bend governing the licensing and operation of taxicab services. While the taxicab ordinance for the City of Hartford is relatively unrestrictive regarding the method of transporting patrons, the taxicab ordinance for the City of West Bend restricts taxicab operators to providing exclusive-ride service to taxicab patrons unless patrons give permission to share the vehicle with other patrons. This restriction would limit the eligibility of taxicab services in the City of West Bend for federal or state financial assistance.

This chapter has presented the findings of an inventory of relevant federal, state, and local legislation which authorizes financial assistance for public transportation services, along with organizational alternatives for providing such services. From the information contained within this chapter it can be seen that there are currently several programs which either are providing or could provide financial assistance for public transportation services in Washington County, as well as several organizational alternatives which could be used to provide such services in the County. Based on the information provided in this chapter, the following chapter presents a series of alternatives for providing transportation service in the County.

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Chapter VI

ALTERNATIVE GENERAL PUBLIC TRANSIT SERVICES

INTRODUCTION

Previous chapters of this report have presented a description and analysis of the existing land use, socioeconomic characteristics, travel patterns, and public transit services within Washington County. Based upon that information, this chapter examines the need for countywide public transportation within Washington County, and presents alternatives for meeting the needs so identified. Specifically, five basic alternative courses of action were formulated and evaluated: 1) do nothing; 2) promote countywide ride-sharing activities; 3) provide countywide demand-responsive public transit service; 4) provide countywide fixed route public transit service; and 5) provide a combination of countywide demand-responsive and fixed route bus public transit service. Each alternative was evaluated on the basis of its ability to accommodate the existing and potential need for public transportation in a cost-efficient manner. Where possible, information concerning ridership projections, operating and capital project costs, and public funding requirements was developed for the alternatives examined.

NEED FOR IMPROVED PUBLIC TRANSPORTATION SERVICE

The people of Washington County depend heavily upon the availability of transportation for obtaining the basic goods, services, employment, and social interactions necessary to sustain even a moderate standard of living. This transportation dependence is characteristic of present society, since modern industrial civilization is based upon a specialization of labor which makes people dependent upon each other for essential goods and services, and thereby magnifies the importance of transportation in the pursuit and fulfillment of basic personal needs. As a result of this dependence, those in society who are restricted in their mobility because they have no personal means of transportation may endure a relatively lower quality of life.

Over the past three decades, American society has grown to rely on the private automobile as the primary mode of transportation. However, those persons living in households without an automobile available must generally depend upon others or upon public transportation, if available, in order to make necessary trips. In those households in which only a single automobile is available, and it is preempted for use by some member or members of the household, the remaining household members become dependent upon others or upon public transportation for tripmaking. The 1972 Commission inventory of travel indicated that, within Washington County, approximately 7 percent of the 19,600 households did not have an automobile available and an additional 36 percent of the households had only one automobile available. Significant concentrations of zero- and one-automobile households were identified within the Cities of Hartford and West Bend and the Villages of Jackson, Kewaskum, and Slinger. Public transit services were available in the County during 1981 to serve the travel needs of persons who did not have access to an automobile and included: specialized transportation services available only to certain population groups; local taxicab services provided in the Cities of Hartford and West Bend; and intercity bus services provided to most, but not all, community centers within the County. However, several deficiencies were noted in the current level of public transit service provided within the County which limit the attractiveness and effectiveness of existing transit services.

Specialized transportation services to priority population groups, as offered by both public and private service agencies and organizations, are available within the County. However, because of restrictions in the level and extent of usage attendant to each program, these services often cannot fully serve the travel needs of all members of these population groups.

As noted in Chapter III, major concentrations of total person travel for trips originating within the County were centered on the Cities of West Bend and Hartford and the Village of Germantown, with these communities attracting a large volume of trips from the immediately adjacent townships as well as significant volumes of trips from more distant communities located within or just outside the County. While both the City of Hartford and the City of West Bend are presently served by local taxicab services, the Village of Germantown is presently unserved by any form of local public transportation. Taxicab and intercity bus services within the County represent the only form of local public transportation available to the general public for access to the major land use and employment centers in the County. For those members of the county population who do not have access to an automobile, these services often represent the only means of satisfying the personal need for travel. Therefore, these services are important to the local communities. However, local taxicab services, while providing local transportation to residents of the two communities--the City of Hartford and the City of West Bend--identified as the major centers of total person travel within the County, charge additional fares for long-distance travel to areas of the County outside their normal service area. This can result in high travel costs and discourage consideration of the taxi mode as a public transportation alternative for nonlocal travel within the County. Intercity bus service is available within the County to serve a portion of the nonlocal intercommunity travel demands. However, the limited amount of and scheduled times for bus service, and the lack of a common stop or transfer point within the County for the intercity bus routes, result in both inconvenient and lengthy travel for persons utilizing intercity bus service within the County.

The existing public transit services have not offered the general public with an effective, cost-competitive alternative to the private automobile for travel throughout the County. This deficiency becomes of particular importance in light of the effects of the "energy crisis" on automobile travel. Actions by the Organization of Oil Exporting Countries (OPEC) have had a substantial impact on the cost and availability of motor fuel in the United States and upon the public's attitude toward automobile travel. With the imposition of substantial increases in the price of crude oil and the control of its production by OPEC nations, the cost of motor fuel increased and the availability of motor fuel in the United States became uncertain. The transportation systems in the United States, tied to the use of automobile transportation, were significantly affected by motor fuel shortages, which occurred as a result of an embargo on crude oil exports to the United States by Arab nations in the fall of 1973, and more recently by the cutoff of all crude oil exports by Iran in 1979. As a result of these actions, the price of motor fuel increased dramatically.

These past and more recent increases in the price of motor fuel have had significant impacts on the cost of owning and operating an automobile and also on household expenditures for travel. Responses by many households to the increased cost of travel by automobile have included the purchase of more fuel-efficient automobiles, a reduction in the amount of travel by automobile, and increased use of alternative modes of transportation. This last response has been particularly evident in the Milwaukee urbanized area, where significant increases in public transit ridership were experienced by both the Milwaukee County Transit System and the Wisconsin Coach Lines, Inc., commuter bus service during and immediately after periods in which major increases occurred in the price of motor fuel.

Accordingly, there are two major reasons for examining the feasibility of improved public transit service within Washington County at this time. The first reason acknowledges a public responsibility to the captive users of public transportation--those persons who do not have access to an automobile--who, even though they may represent a relatively small segment of the total population, should be provided, in the interest of social justice, with some form of transportation capable of satisfying their basic travel needs. The second major reason recognizes the need to make available to the general population a viable alternative to the private automobile in light of the uncertain future regarding the cost and availability of motor fuel.

NEED FOR PUBLIC SUBSIDY

It is a generally accepted tenet that it is presently neither desirable nor possible to recover the total cost of transit service from farebox revenue alone. To charge fares that would completely recover the cost of operation would result in a diversion of choice riders to other modes of transportation, leaving the captive riders to bear alone the high cost of the service provided. This response was common practice in the private transit industry over the past three decades, and eventually led to the collapse of almost all private transit operations. If public transportation is to provide a reasonable level of service at a reasonable cost to the user, it usually must be publicly subsidized. The regular riding of the captive user alone cannot sustain the cost of supplying the community with a public transportation system.

In many communities, public transportation is considered to be an essential public service. In this respect, the cost of providing a public transportation service for residents of an area to use as they need or desire must be weighed against the value derived from the publicly supported service, just as the costs of providing public fire and police protection, public recreational facilities, and public library facilities must be weighed against the value derived from these services. The community must decide whether the value of a public transportation system outweighs the costs entailed in its operation. Within the State of Wisconsin, 27 transit systems are presently in operation and receive some level of financial assistance from the communities they serve. Table 21 lists the 27 urban transit systems operating within the State during 1981, and indicates the projected amount of local financial support to be contributed by the responsible local unit of government toward the operation of each transit system.

DEVELOPMENT OF TRANSIT SERVICE ALTERNATIVES

As noted in Chapter I of this report, the plan design phase of a transit development planning effort includes the postulation and evaluation of a number of feasible transit service alternatives. In order to fully evaluate the feasibility of providing improved transit services within Washington County, a number of alternative management structures and operational techniques for transit service were examined and evaluated.

Management Alternatives

The cost entailed in providing an adequate and effective level of urban public transportation depends in part upon the ownership and management structure of the transit system. Three of the alternative management structures described in Chapter V of this report under which transit service could be provided within the County were found to warrant further consideration: 1) county contract for transit services with an existing transit operator; 2) county ownership of equipment and operation by service contract; and 3) county ownership of equipment and operation with public employees. Since these management structures could be

Table 21

**PROJECTED EXPENSES, REVENUES, AND PUBLIC FUNDING REQUIREMENTS
FOR TRANSIT SYSTEMS IN WISCONSIN: 1981**

| Area | Operating Expenses | Operating Revenue | | Public Funding Requirement | |
|------------------------|--------------------|-------------------|---------------------|----------------------------|-------------|
| | | Total | Percent of Expenses | Total | Local Share |
| Appleton..... | \$ 1,375,000 | \$ 434,000 | 31.6 | \$ 941,000 | \$ 129,000 |
| Beloit..... | 620,000 | 89,000 | 14.4 | 531,000 | 223,000 |
| Eau Claire..... | 1,211,000 | 441,000 | 36.4 | 770,000 | 162,000 |
| Fond du Lac..... | 665,000 | 145,000 | 21.8 | 520,000 | 149,000 |
| Green Bay..... | 2,113,000 | 662,000 | 29.4 | 1,491,000 | 206,000 |
| Hartford (taxi)..... | 54,000 | 14,000 | 25.9 | 40,000 | 21,000 |
| Janesville..... | 1,170,000 | 260,000 | 22.2 | 910,000 | 263,000 |
| Kenosha..... | 1,993,000 | 417,000 | 20.9 | 1,576,000 | 277,000 |
| La Crosse..... | 1,431,000 | 427,000 | 29.9 | 1,004,000 | 132,000 |
| Madison..... | 12,291,000 | 4,635,000 | 37.7 | 7,257,000 | 2,257,000 |
| Manitowoc..... | 384,000 | 93,000 | 24.2 | 291,000 | 78,000 |
| Marshfield (taxi)..... | 73,000 | 43,000 | 58.9 | 30,000 | 7,000 |
| Merrill..... | 152,000 | 33,000 | 21.7 | 119,000 | 38,000 |
| Milwaukee County..... | 61,278,000 | 28,928,000 | 47.2 | 32,350,000 | 8,165,000 |
| Oshkosh..... | 1,135,000 | 301,000 | 26.5 | 834,000 | 144,000 |
| Racine..... | 1,890,000 | 619,000 | 32.8 | 1,271,000 | 161,000 |
| Rhineland | | | | | |
| (taxi)..... | 125,000 | 100,000 | 80.0 | 25,000 | 6,000 |
| Rice Lake..... | 117,000 | 25,000 | 21.4 | 92,000 | 22,000 |
| Ripon (taxi)..... | 35,000 | 18,000 | 51.4 | 17,000 | 4,000 |
| Sheboygan..... | 1,328,000 | 432,000 | 32.5 | 896,000 | 188,000 |
| Stevens Point..... | 266,000 | 47,000 | 17.7 | 219,000 | 81,000 |
| Stoughton (taxi)..... | 30,000 | 13,000 | 43.3 | 17,000 | 4,000 |
| Superior..... | 513,000 | 121,000 | 23.6 | 392,000 | 106,000 |
| Watertown..... | 182,000 | 21,000 | 11.5 | 161,000 | 88,000 |
| Waukesha County..... | 899,000 | 388,000 | 43.1 | 511,000 | 143,000 |
| Wausau..... | 806,000 | 271,000 | 33.6 | 535,000 | 112,000 |
| Wisconsin Rapids | | | | | |
| (taxi)..... | 98,000 | 63,000 | 64.3 | 35,000 | 12,000 |

Source: Wisconsin Department of Transportation, Bureau of Transit and SEWRPC.

utilized under any of the transit operation alternatives calling for the provision of new transit service, they will be considered separately from those alternatives.

Under the first management alternative, the County would contract for the provision of improved or new transit service with an existing transit service provider in a manner similar to the current contract arrangement between the County and the Hartford Municipal Recreation Department for the provision of specialized transportation service under the Older Adult Transportation (OAT) program. The major advantages of this alternative are that a capital outlay is not required by the County for the purchase of operating equipment, and personnel problems regarding such matters as labor contracts, pension plans, and employee benefits are avoided. A disadvantage of this type of management is the lack of direct control by the County over the levels of and costs for the contract services provided, including costs associated with private equipment purchases and depreciation of equipment. In addition to the Hartford Municipal Recreation Department mentioned above, private yellow school bus companies, public and private taxicab operators, and private intercity bus companies currently provide transit service within the County and, in this respect, represent potential operators with which the County could contract for the provision of public transit service.

More practical short-term management alternatives for the County would be acquisition of the necessary operating equipment by the County and operation by service contract with an existing transit service provider, or operation of a transit system with public employees. Both management structures assume at least partial public ownership of the necessary operating equipment, with operation by service contract assuming county purchase, for lease to the contract service provider, of all of the vehicles used to provide the contract transit service. Under both management structures, the County would have some control over the costs of the transit service provided. An added advantage of operation by service contract is that, as mentioned above, it avoids the personnel problems associated with operation with public employees since the personnel providing the transit service would be employees of the transit operator and not of the County. The major disadvantage of these two management structures is the capital outlay required by the County for the purchase of necessary operating equipment. However, the County's capital outlay requirement could be reduced to 20 percent of the costs associated with required equipment purchases through the public purchase of operating equipment using federal funds made available under Section 18 of the Urban Mass Transportation Act of 1964, as amended, and administered by the Federal Highway Administration (FHWA).

Operations Alternatives

As mentioned previously, five basic transit service alternatives were developed and evaluated during the course of the study: 1) do nothing to encourage or support improved transit service; 2) promote countywide ride-sharing activities; 3) provide demand-responsive public transit service; 4) provide fixed route public transit service; and 5) provide a combination of demand-responsive and fixed route public transit service. Each transit service alternative represents a possible course of action which could be taken in response to the deficiencies associated with the existing level of transit service. Each of these alternatives is described in succeeding sections of this chapter in terms of operating characteristics and, where possible, ridership projections and operating and capital costs. In addition, sub-alternatives representing different levels of transit service have been developed for two of the three alternatives calling for increased levels of public transit service. To facilitate ready comparison of the costs of the various levels of public transit service, operating and capital project costs are presented in constant 1981 dollars for the five-year planning period, and do not reflect the possible effects of inflation. The possible effects of general price inflation are considered in the discussion of the financial commitment required for implementation of the recommended plan.

ALTERNATIVE 1--STATUS QUO

The first alternative action considered in this study was a continuation of the present situation. Under this alternative, no changes or improvements in the present level of public transit service in the County that would require an expenditure of public funds are proposed. Specialized transit services and general public transit services are assumed to continue to be provided at the present level and to be supported through the budgets of the sponsoring public and private agencies and through fares charged for use of those services.

The status quo alternative represents a continuation of the present level of public transit service provided within the County and, as such, does not attempt to alleviate the problems and deficiencies associated with that level of service. Consequently, while the specialized transportation services currently provided to certain population segments could be expected to continue over the five-year planning period, the restrictions associated with the services would continue to result in only a partial fulfillment of the travel needs of the population segments served.

Similarly, the taxicab and intercity bus services for the general public would continue to be provided over the planning period with the previously noted deficiencies.

For the general public, this alternative would not offer a solution to the problems associated with the lack of a viable alternative to the automobile for travel within many areas of the County. Currently, the only forms of public transportation available to the general public within the County are the taxicab services in the Cities of Hartford and West Bend, and the intercity bus service. Consequently, many parts of the County would continue to be left unserved by these public transit services. In addition, deficiencies in these services, as previously noted, would continue to discourage consideration of their use as an alternative to the private automobile.

ALTERNATIVE 2--RIDE-SHARING

As noted earlier in this chapter, the heavy dependence of contemporary lifestyles on the automobile and petroleum products was "brought home" to the American public by the 1973-1974 and 1979 motor fuel shortages and subsequent motor fuel price increases. With increasing motor fuel prices and the potential for future motor fuel shortages, many rural workers have joined the ranks of the transportation disadvantaged. Along with improved public transportation service, ride-sharing in carpools or vanpools represents perhaps the best hedge against the rising costs of private transportation. Besides the obvious energy conservation and pollution benefits of carpooling and vanpooling, ride-sharing is important for its employment implications--that is, as a means of getting workers to and from their place of employment--and as a means of transporting social service clients as an adjunct to social service and public transportation programs. Alternative 2 represents an attempt to alleviate deficiencies identified in the current level of transit service provided within the County through the promotion of countywide ride-sharing activities.

The formation of a formal ride-sharing program for Washington County would not be unique within the Region. A formal Milwaukee area carpooling program was conducted by Milwaukee County over a three-year period in the mid-1970's. After receiving approval of a federal funding request during the latter portion of 1979, Milwaukee County renewed its efforts at promoting ride-sharing activities by beginning a three-year continuing carpooling promotion program for the four-county Milwaukee area, including Washington County. The primary purpose of the current Milwaukee County carpool promotion program is to increase the extent of carpooling in the Milwaukee area, in particular for trips having destinations within Milwaukee County. Approximately 120 Washington County residents have participated in this program since it began in 1979, with all participants from the County seeking carpool-matching services for destinations within Milwaukee County.

The Wisconsin Department of Transportation and the University of Wisconsin-Extension have also established programs aimed at promoting ride-sharing activities. The Wisconsin Department of Transportation administers a program authorized by the Federal Highway Administration aimed at promoting and supporting vanpool activities. A major provision of this program is the issuance of low-cost loans by the State for the acquisition of vans by major employers or public agencies interested in establishing their own vanpool programs. Within Washington County, a vanpool program for employees of the Empire Generator Corporation and surrounding industries in the Village of Germantown has been established with the assistance of this state program. The University of Wisconsin-Extension--through the Division of Urban Outreach, Office of Statewide Transportation Programs--has established a program of customer designing ride-sharing programs for employers, including carpooling and vanpooling, and has

cooperated with both the Milwaukee County carpool promotion program and the Wisconsin Department of Transportation in this area.

Under this alternative, the County would establish a countywide ride-sharing program to promote ride-sharing activities for travel within the County. This program should include media promotion of ride-sharing activities, contact with major employers to encourage carpooling and vanpooling, and carpool-matching services for potential carpoolers. It is envisioned that the primary tasks of the proposed ride-sharing program would be the dissemination of information on available carpooling and vanpooling programs, and carpool-matching services for potential carpoolers within the County. Requests by interested groups for vanpooling information would be referred to the Wisconsin Department of Transportation or the University of Wisconsin-Extension. Similarly, requests for carpool-matching services for trips with destinations in Milwaukee County would be referred to the Milwaukee County carpool promotion program. Cooperation with existing ride-sharing programs in this manner would allow the county program to focus primarily on the internal travel needs of its residents.

Assuming establishment as a separate county program, the costs entailed in establishing the proposed ride-sharing program would be approximately \$20,000 per year. Included in this figure are the costs of one full-time staff person, program materials, and office overhead. Should the program be established with existing staff or as part of a broader transportation program, such as a coordinated information and outreach program, the costs entailed in operating the program could possibly be reduced.

ALTERNATIVE 3--DEMAND-RESPONSIVE PUBLIC TRANSPORTATION SERVICE

Alternative 3 represents an attempt to alleviate deficiencies in the current level of public transit service provided within Washington County through the provision of demand-responsive public transportation to the general population. Under demand-responsive operation, public transportation service is provided on a door-to-door basis over flexible routes by, typically, small vehicles. Demand-responsive public transportation service can be provided on an immediate-response basis, such as that provided by the taxicab service serving the City of Hartford, or on an advance-reservation basis, such as that provided by the Older Adult Transportation program sponsored by the Washington County Office on Aging.

Under this alternative, a publicly subsidized demand-responsive public transit service would be provided to serve the general population of the County. Operation of the transit service is assumed to begin during calendar year 1982. Because of the time required to acquire new operating equipment under federal transit assistance programs--approximately one year would be required for grant approval, soliciting of bids, and vehicle delivery--transit service would be provided with vehicles provided by a contract service provider or with older, surplus vehicles leased by the County until new vehicles could be put into service, most likely in 1983. Two subalternatives were developed for providing this type of public transit service within the County. The following sections of the chapter describe the relevant operating characteristics, ridership projections, and operating and capital costs for each subalternative.

Subalternative 3A--Expand Existing Older Adult Transportation Program to Include the General Public

Under this subalternative, the eligibility requirements for users of the existing specialized transportation service provided by the county-sponsored Older Adult Transportation program would be expanded to include the general public. The expansion of the eligibility for this service is made possible by the 1981 State Budget Act,

which made several statutory changes to the State's program of financial assistance to counties for transportation of the elderly and handicapped which currently funds a significant portion of the 1981 OAT program budget. Of most significance to this subalternative is the change which allows counties providing specialized transportation services supported by state funds available under this program to make extra space on these services available to the general public at their own discretion, provided that priority is still given to elderly and handicapped patrons of the service. The actual ridership experienced on the OAT service during the first half of 1981 of about 600 trips per month was below the budget ridership of about 830 trips per month. At the present time, the service is used to capacity only during certain times of the day for trips made to various senior centers and nutrition sites for the elderly. This information indicates that additional space is available on the existing OAT service which could possibly be utilized by the general public.

Operating Characteristics: No changes in the existing operating characteristics of the OAT service would be proposed under this subalternative. The transit service provided under the OAT program would continue to be operated on a contract basis by the Hartford Municipal Recreation Department as a 24-hour, advance-reservation transit service provided to three different areas of the County on different days of the week. The three service areas of the existing OAT service are shown on Map 19. Specifically, transit service would be made available within these areas based on the scheduled hours of service indicated in Table 22. Fares charged for the proposed transit service would be identical to those charged for the existing OAT service, or \$0.50 per one-way trip for elderly and handicapped users and \$1.00 per one-way trip for the general public.

Under this subalternative, two vehicles would be required to provide the proposed transit service, with one vehicle being stationed in the City of Hartford and one vehicle being stationed in the City of West Bend. Initially, the service would be provided utilizing vehicles supplied by the Hartford Municipal Recreation Department, which presently operates one 1975 16-passenger, lift-equipped minibus and one 1980 8-passenger, lift-equipped minibus, both owned by the Department, in providing the

Table 22

**SCHEDULE OF PUBLIC TRANSPORTATION SERVICE
AVAILABILITY UNDER SUBALTERNATIVE 3A**

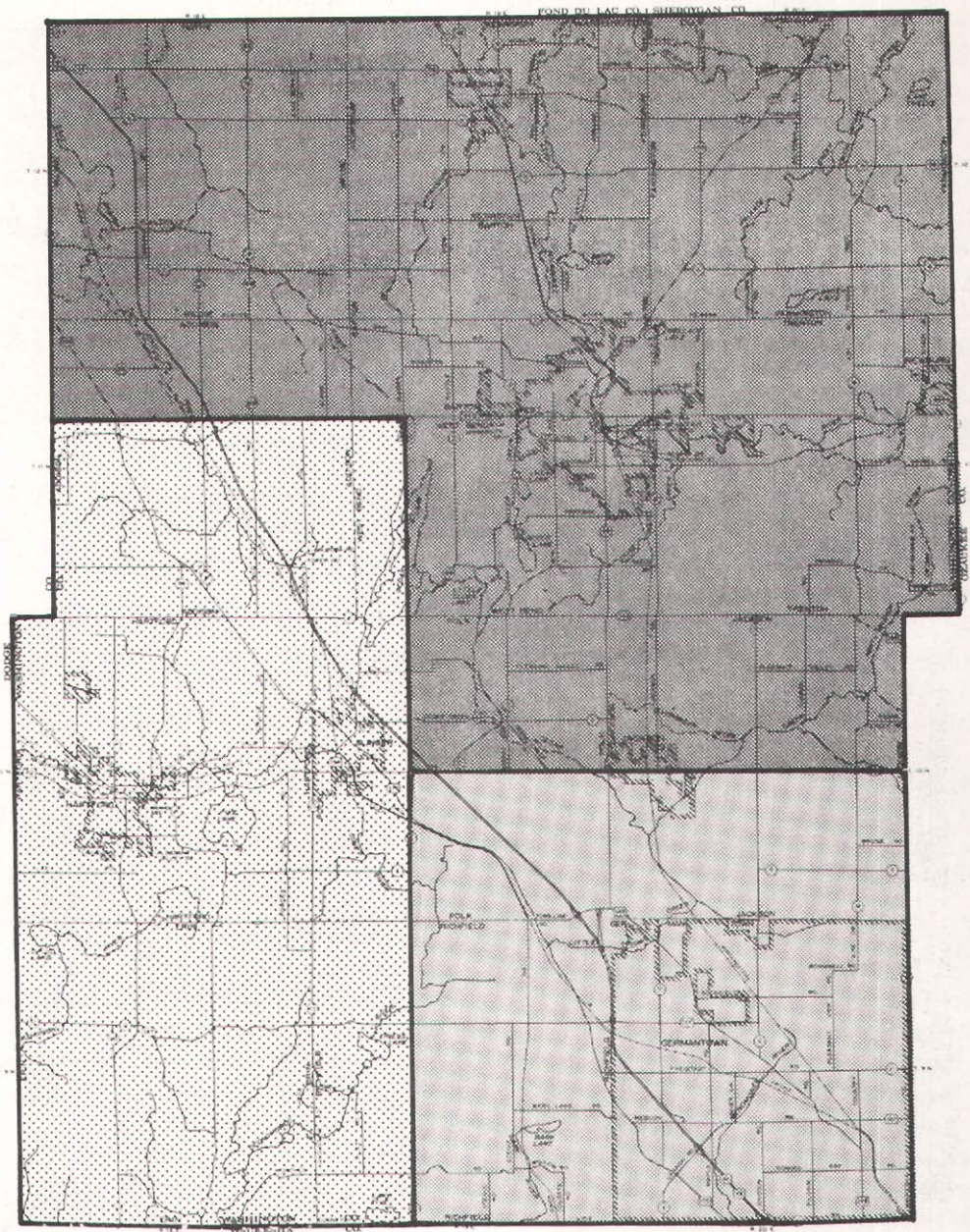
| Service Area | Days of Service ^a | Hours of Service |
|--------------|------------------------------|------------------------|
| West Bend | Monday..... | 8:00 a.m. - 5:00 p.m. |
| | Tuesday..... | 10:00 a.m. - 2:00 p.m. |
| | Friday | 8:00 a.m. - 5:00 p.m. |
| Hartford | Tuesday..... | 8:00 a.m. - 5:00 p.m. |
| | Thursday | 8:00 a.m. - 5:00 p.m. |
| Germantown | Monday..... | 10:00 a.m. - 2:00 p.m. |
| | Wednesday | 8:00 a.m. - 5:00 p.m. |

^aExcludes holidays.




Source: SEWRPC.

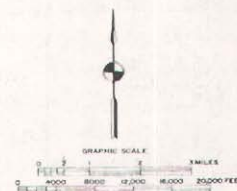
Map 19

LOCATION OF OLDER ADULT TRANSPORTATION PROGRAM SERVICE AREAS IN WASHINGTON COUNTY AS PROPOSED UNDER SUBALTERNATIVE 3A



LEGEND

-  West Bend Service Area
-  Germantown Service Area
-  Hartford Service Area



Source: SEWRPC.

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PLANNING DEPARTMENT

OAT service. Based upon an average vehicle life of five years for vehicles of this size, both vehicles presently used in providing the OAT service would need to be replaced over the five-year planning period.

Implementation of the transit service proposed under this subalternative would provide a basic level of public transportation service to the general population of the County. As such, this subalternative represents the lowest level of public transit service which could be considered to be a reasonable response to the current need for public transportation within the County. The transit service would provide complete service-area coverage of all residential areas within the County. Because of the extensive geographic coverage provided by the service, 100 percent of the county population would be provided with public transportation of a limited nature. In addition, the transit service proposed under this subalternative would be provided to all elderly and handicapped population concentrations and special facilities within the County and to the major concentrations of zero- and one-automobile households within the County not currently served by local public transportation. All major trip generators identified within the County would be served by the proposed transit service. However, the service availability proposed under this subalternative would probably limit consideration of this service for all but essential nonwork purpose travel.

Ridership Projections: Based upon the level of service proposed under this subalternative, ridership on the expanded OAT transit service could be expected to range from 680 to 720 one-way trips per month in 1982, resulting in an annual ridership ranging from 8,200 to 8,600 one-way trips at the end of the first year of expanded eligibility. By 1986, ridership on the OAT transit service could be expected to range from 840 to 960 one-way trips per month, or from 10,100 to 11,500 one-way trips annually. Vehicle hours of service would remain constant over the planning period at about 2,700 hours per year, while vehicle miles of service would be expected to increase slightly each year in the planning period in response to projected ridership demand--from about 25,200 miles in 1982 to about 34,400 miles in 1986. Based on projected ridership increases, vehicle productivity should increase over the planning period from about 3.0 to 3.2 passengers per hour in 1982 to about 3.7 to 4.3 passengers per hour by 1986.

Capital Project and Operating Costs: Implementation of the transit service proposed under this subalternative would require the acquisition of one 16-passenger minibus and one 8-passenger minibus to replace the vehicles currently operated by the Hartford Municipal Recreation Department in providing the OAT service. Both vehicles would be equipped with mobile radios and wheelchair lifts to accommodate the handicapped. The capital investment for this subalternative would total about \$51,700. Assuming public purchase of the equipment by the County using funds available under the federal Section 18 transit assistance program, \$41,360, or 80 percent of the total project costs, would represent the federal share, and \$10,340, or 20 percent of the total project costs, would represent the county share. The estimated costs of the capital equipment necessary to implement this alternative are presented in Table 23.

Total operating deficits for the transit service proposed under this subalternative may be expected to increase slightly over the planning period because of increases in vehicle miles traveled and, consequently, in total operating costs. However, the operating deficit per ride would be expected to decline over the planning period, ranging between \$4.75 and \$5.01 per ride in 1982 and between \$3.76 and \$4.26 per ride in 1986. Assuming the use of state funds available under the State's financial aid program to counties for elderly and handicapped transportation, the county share of the public funding requirement in 1982 is anticipated to range from \$4,100 to \$4,300, or about \$0.48 to \$0.52 per ride. By 1986, the county share of the public funding requirement is expected to increase slightly, ranging from \$5,400 to \$6,200, or about

Table 23

**CAPITAL PROJECTS AND EXPENDITURES REQUIRED UNDER
SUBALTERNATIVE 3A: EXPAND EXISTING OLDER ADULT
TRANSPORTATION PROGRAM TO INCLUDE THE GENERAL PUBLIC**

| Quantity | Capital Equipment | Unit Cost ^a | Total Cost ^a |
|---|--|------------------------|-------------------------|
| 1 | 16-Passenger Minibus Equipped with Wheelchair Lift | \$24,000 | \$24,000 |
| 1 | 8-Passenger Minibus Equipped with Wheelchair Lift | 21,000 | 21,000 |
| 2 | Mobile Radio Units..... | 1,000 | 2,000 |
| Total Capital Investment..... | | -- | \$47,000 |
| Contingency Fund | | -- | 4,700 |
| Total | | -- | \$51,700 |
| Federal Share (80 percent) ^b | | -- | 41,360 |
| Local Share (20 percent) | | -- | 10,340 |

^aConstant 1981 dollars.

^bFederal funds available under UMTA Section 18 transit assistance program.

Source: SEWRPC.

\$0.47 to \$0.61 per ride. In comparison, the county share of the 1981 budget for the OAT program is \$10,000, or about \$1.00 per ride. Information on forecast ridership, operating costs, system deficits, and public subsidy requirements for this subalternative can be found in Table 24.

Subalternative 3B--Expand Countywide Advance-Reservation Public Transit Service

This subalternative was developed on the principle of providing the urban and rural areas of the County presently unserved by local public transportation with a general public transit service which could be utilized to satisfy the majority of the travel demands and trip purposes experienced on a daily basis by the general population. Under this subalternative, the County would expand upon and replace the existing OAT service with a general public, demand-responsive transit service available on a regular basis 12 hours per day, five days per week, within the areas served by the proposed transit system.

Operating Characteristics: Operation of the demand-responsive transit service proposed under this subalternative would be similar to the operation of the existing OAT service. The proposed transit service would be available on a 24-hour advance-reservation basis and would be provided using the three service areas presently utilized by the existing OAT program (see Map 19). However, the transit service available under this subalternative would be expanded from that proposed under Subalternative 3A, with transit service provided within each service area five days per week, Monday through Friday, excluding holidays, between the hours of 6:00 a.m.

Table 24

**OPERATING CHARACTERISTICS OF SUBALTERNATIVE 3A:
EXPAND OLDER ADULT TRANSPORTATION PROGRAM
TO INCLUDE THE GENERAL PUBLIC**

| Characteristic ^a | Year | | | | |
|------------------------------|-----------------|-----------------|-----------------|-----------------|-----------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Ridership Forecast | | | | | |
| Monthly..... | 680-720 | 720-780 | 760-840 | 800-900 | 840-960 |
| Annual..... | 8,200-8,600 | 8,600-9,400 | 9,100-10,100 | 9,600-10,800 | 10,100-11,500 |
| Annual Vehicle Miles..... | 25,200 | 27,000 | 28,800 | 30,600 | 32,400 |
| Annual Vehicle Hours..... | 2,700 | 2,700 | 2,700 | 2,700 | 2,700 |
| Operating Cost | | | | | |
| Per Year..... | \$45,900 | \$46,700 | \$47,400 | \$48,200 | \$48,900 |
| Per Ride..... | \$5.33-5.60 | \$4.97-5.43 | \$4.69-5.21 | \$4.46-5.02 | \$4.25-4.84 |
| Revenue | | | | | |
| Per Year..... | \$4,800-5,000 | \$5,000-5,500 | \$5,300-5,900 | \$5,600-6,300 | \$5,900-6,700 |
| Percent of Operating Cost... | 10.5-10.9 | 10.7-11.8 | 11.2-12.4 | 11.6-13.1 | 12.1-13.7 |
| Operating Deficit | | | | | |
| Per Year..... | \$40,900-41,100 | \$41,200-41,700 | \$41,500-42,100 | \$41,900-42,600 | \$42,200-43,000 |
| Per Ride..... | \$4.75-5.01 | \$4.38-4.84 | \$4.11-4.63 | \$3.88-4.44 | \$3.67-4.26 |
| Public Funding Requirement | | | | | |
| State..... | \$36,800 | \$36,800 | \$36,800 | \$36,800 | \$36,800 |
| Local..... | \$4,100-4,300 | \$4,400-4,900 | \$4,700-5,300 | \$5,100-5,800 | \$5,400-6,200 |
| Total | \$40,900-41,100 | \$41,200-41,700 | \$41,500-42,100 | \$41,900-42,600 | \$42,200-43,000 |
| Local Cost per Ride. | \$0.48-0.52 | \$0.47-0.57 | \$0.47-0.58 | \$0.47-0.60 | \$0.47-0.61 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)

Elderly, handicapped..... 85
Nonelderly, nonhandicapped..... 15

2. Fare

Elderly, handicapped..... \$0.50
Nonelderly, nonhandicapped..... \$1.00
Average fare..... \$0.58

3. Service will be provided in the same areas, on the same days, and during the same hours as under the existing service provided by the Older Adult Transportation program, and will be provided on a space-available basis to the general public. Top priority will be given to serving elderly and handicapped trip requests.

4. All costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes state funding under the elderly and handicapped transportation assistance program for counties up to the expected 1982 level.

Source: SEWRPC.

and 6:00 p.m. Unlike the transit service proposed under Subalternative 3A, transit service under this subalternative would be provided for both travel within and travel between the individual service areas. Fares for the proposed service would be established at \$0.50 per one-way trip for elderly and handicapped persons and \$1.50 per one-way trip for the general public.

The proposed demand-responsive transit service would initially be provided as a many-origin-to-many-destination type of service. However, it is envisioned that as demand increases and the need arises, the operation would be expanded to include many-to-one, many-to-few, and regular subscription services serving major trip generators. Including these other types of services should increase vehicle productivity and minimize costs for the total system.

A total fleet of five minibuses would be required to provide the proposed transit service under this subalternative. One vehicle would be assigned to each service area to serve the travel demand generated within the area, and one vehicle would be available to serve trips between service areas and to serve any peak demands for service which could not be handled by the single vehicle assigned to a service area. One vehicle would also be required to serve as a spare bus for use when a regular vehicle requires maintenance.

Implementation of the transit service proposed under this subalternative would provide residents of the County with the highest quality and level of public transit service considered under the alternatives presented in this chapter. The proposed transit service would provide a door-to-door service with complete service-area coverage of the County, similar to that provided by the transit service proposed under Subalternative 3A. However, the level of service proposed under this subalternative would offer to the general public the opportunity to utilize public transportation for most trips made on a routine basis in the County, including work purpose trips and intercommunity trips.

Ridership Projections: Upon implementation in 1982 of the demand-responsive transit service proposed under the subalternative, ridership is forecast to range from 900 to 1,300 one-way trips per month, resulting in an annual ridership of between 10,800 to 15,600 one-way trips. By 1986, ridership on this service could be expected to range from 1,600 to 2,400 one-way trips per month, or about 19,200 to 28,800 one-way trips annually. Vehicle hours of service for the transit service would remain constant over the planning period at about 12,200 hours per year, while vehicle miles of service would be expected to increase each year in the planning period in response to increases in ridership demand--from about 110,200 miles in 1982 to about 134,600 miles by 1986. Because of projected ridership increases, vehicle productivity would be expected to increase from about 0.9 to 1.3 passengers per hour in 1982 to about 1.6 to 2.4 passengers per hour in 1986.

Capital Project and Operating Costs: Implementation of the transit service proposed under this subalternative would require the acquisition of one 16-passenger minibus and four 12-passenger minibuses. All buses would be equipped with fareboxes, two-way mobile radios, and wheelchair lifts to accommodate the handicapped. The capital investment required for this alternative would total about \$146,000, of which \$116,000, or 80 percent, would represent the federal share under the federal Section 18 transit assistance program, and \$29,200, or 20 percent, would represent the county share. The estimated costs of the capital equipment necessary to implement this subalternative are presented in Table 25.

Table 25

**CAPITAL PROJECTS AND EXPENDITURES REQUIRED UNDER
SUBALTERNATIVE 3B: EXPANDED COUNTYWIDE
ADVANCE-RESERVATION PUBLIC TRANSIT SERVICE**

| Quantity | Capital Equipment | Unit Cost ^a | Total Cost ^a |
|---|--|------------------------|-------------------------|
| 1 | 16-Passenger Minibus Equipped with Wheelchair Lift | \$24,000 | \$24,000 |
| 4 | 12-Passenger Minibuses Equipped with Wheelchair Lifts .. | 23,500 | 94,000 |
| 5 | Mobile Radio Units..... | 1,000 | 5,000 |
| 5 | Nonregistering, Lock Vault Fareboxes | 2,000 | 10,000 |
| Total Capital Investment..... | | -- | \$133,000 |
| Contingency Fund | | -- | 13,000 |
| Total | | -- | \$146,000 |
| Federal Share (80 percent) ^b | | -- | 116,800 |
| Local Share (20 percent) | | -- | 29,200 |

^aConstant 1981 dollars.

^bFederal funds available under UMTA Section 18 transit assistance program.

Source: SEWRPC.

Total operating deficits for the transit service proposed under this subalternative would be high and would be expected to remain at about the same level over the planning period. The operating deficit per ride for the proposed transit service would be expected to decline over the planning period because of forecast ridership increases, with the deficit ranging between \$12.39 and \$18.30 per ride in 1982 and between \$6.66 and \$10.44 per ride in 1986. Assuming the use of federal Section 18 transit operating assistance funds, the County's share of the public funding requirement in 1982 is anticipated to range from \$96,700 to \$98,850, or from about \$6.19 to \$9.15 per ride. It is presently anticipated that federal transit operating assistance funds will not be available after 1982, which will require the County to assume 100 percent of any operating deficit for the public transit service after 1982. As a result of the anticipated loss of federal transit operating assistance funds after 1982, the County's share of the public funding requirement for the proposed service would increase significantly, ranging from \$191,600 to \$198,100, or about \$9.39 to \$15.00 per ride, in 1983, and from \$191,900 to \$200,500, or about \$6.66 to \$10.44 per ride, in 1986. Information on forecast ridership, operating costs, system deficits, and public subsidy requirements for this subalternative can be found in Table 26.

Table 26

**OPERATING CHARACTERISTICS OF SUBALTERNATIVE 3B:
EXPAND COUNTYWIDE ADVANCE-RESERVATION PUBLIC TRANSIT SERVICE**

| Characteristic ^a | Year | | | | |
|-----------------------------|-------------------|-------------------|-------------------|-------------------|-------------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Ridership Forecast | | | | | |
| Monthly..... | 900-1,300 | 1,100-1,700 | 1,400-2,100 | 1,500-2,300 | 1,600-2,400 |
| Annual..... | 10,800-15,600 | 13,200-20,400 | 16,800-25,200 | 18,000-27,600 | 19,200-28,800 |
| Annual Vehicle Miles..... | 110,200 | 116,300 | 122,400 | 128,500 | 134,600 |
| Annual Vehicle Hours..... | 12,200 | 12,200 | 12,200 | 12,200 | 12,200 |
| Operating Cost | | | | | |
| Per Hour..... | \$17.00 | \$17.21 | \$17.42 | \$17.63 | \$17.85 |
| Per Year..... | \$207,400 | \$210,000 | \$212,600 | \$215,200 | \$217,800 |
| Per Ride..... | \$13.29-19.20 | \$10.29-15.90 | \$8.44-12.65 | \$7.80-11.95 | \$7.56-11.34 |
| Revenue | | | | | |
| Per Year..... | \$9,700-14,000 | \$11,900-18,400 | \$15,100-22,700 | \$16,200-24,800 | \$17,300-25,900 |
| Percent of Operating Cost. | 4.5-6.8 | 5.7-8.8 | 7.1-10.7 | 7.5-11.5 | 7.9-11.9 |
| Operating Deficit | | | | | |
| Per Year..... | \$193,400-197,700 | \$191,600-198,100 | \$189,900-197,500 | \$190,400-199,000 | \$191,900-200,500 |
| Per Ride..... | \$12.39-18.30 | \$9.39-15.00 | \$7.54-11.75 | \$6.90-11.05 | \$6.66-10.44 |
| Public Funding Requirement | | | | | |
| Federal | \$96,700-98,850 | \$ -- | \$ -- | \$ -- | \$ -- |
| Local..... | \$96,700-98,850 | \$191,600-198,100 | \$189,900-197,500 | \$190,400-199,000 | \$191,900-200,500 |
| Total | \$193,400-197,700 | \$191,600-198,100 | \$189,900-197,500 | \$190,400-199,000 | \$191,900-200,500 |
| Local Cost per Ride..... | \$6.19-9.15 | \$9.39-15.00 | \$7.54-11.75 | \$6.90-11.05 | \$6.66-10.44 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)

| | |
|---------------------------------|----|
| Elderly, handicapped..... | 60 |
| Nonelderly, nonhandicapped..... | 40 |

2. Fare

| | |
|---------------------------------|--------|
| Elderly, handicapped..... | \$0.50 |
| Nonelderly, nonhandicapped..... | \$1.50 |
| Average fare..... | \$0.90 |

3. Operating Characteristics

Monday-Friday (excluding holidays)
6:00 a.m. - 6:00 p.m.
255 days per year

4. All costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes federal funding under the UMTA Section 18 program to defray 50 percent of total operating deficit.

Source: SBMRPC.

ALTERNATIVE 4--FIXED ROUTE PUBLIC TRANSIT SERVICE

Whereas the previous alternative considered within this chapter proposed demand-responsive transit service to resolve the current deficiencies in the existing level of public transit service within the County, the fourth alternative considers and evaluates the feasibility of fixed route transit service to accomplish the same objective. Under this alternative, publicly subsidized transit service would be provided using fixed bus routes designed to connect the urban and rural community centers identified in Chapter I of this report (see Map 1). The transit service proposed under this alternative would primarily serve nonlocal intercommunity travel demands, although local travel on the proposed fixed routes would not be restricted. Whereas the demand-responsive transit services considered under Alternative 3 were proposed to be provided in conjunction with or to replace the specialized transportation service provided by the OAT program within the County, no such coordination is proposed under this alternative. Consequently, it is assumed that the existing OAT program, as well as other current specialized transportation programs, taxicab services, and intercity bus services within the County, will continue to be provided in addition to transit services proposed under this alternative. As proposed under Alternative 3, countywide transit service under this alternative would begin to be provided during calendar year 1982 using equipment supplied by contract service providers or vehicles leased by the County until new equipment could be put into service, most likely in 1983.

Two subalternatives were developed and evaluated for providing this type of public transit service within the County. The following sections describe the relevant operating characteristics, ridership projections, and operating and capital costs for each subalternative.

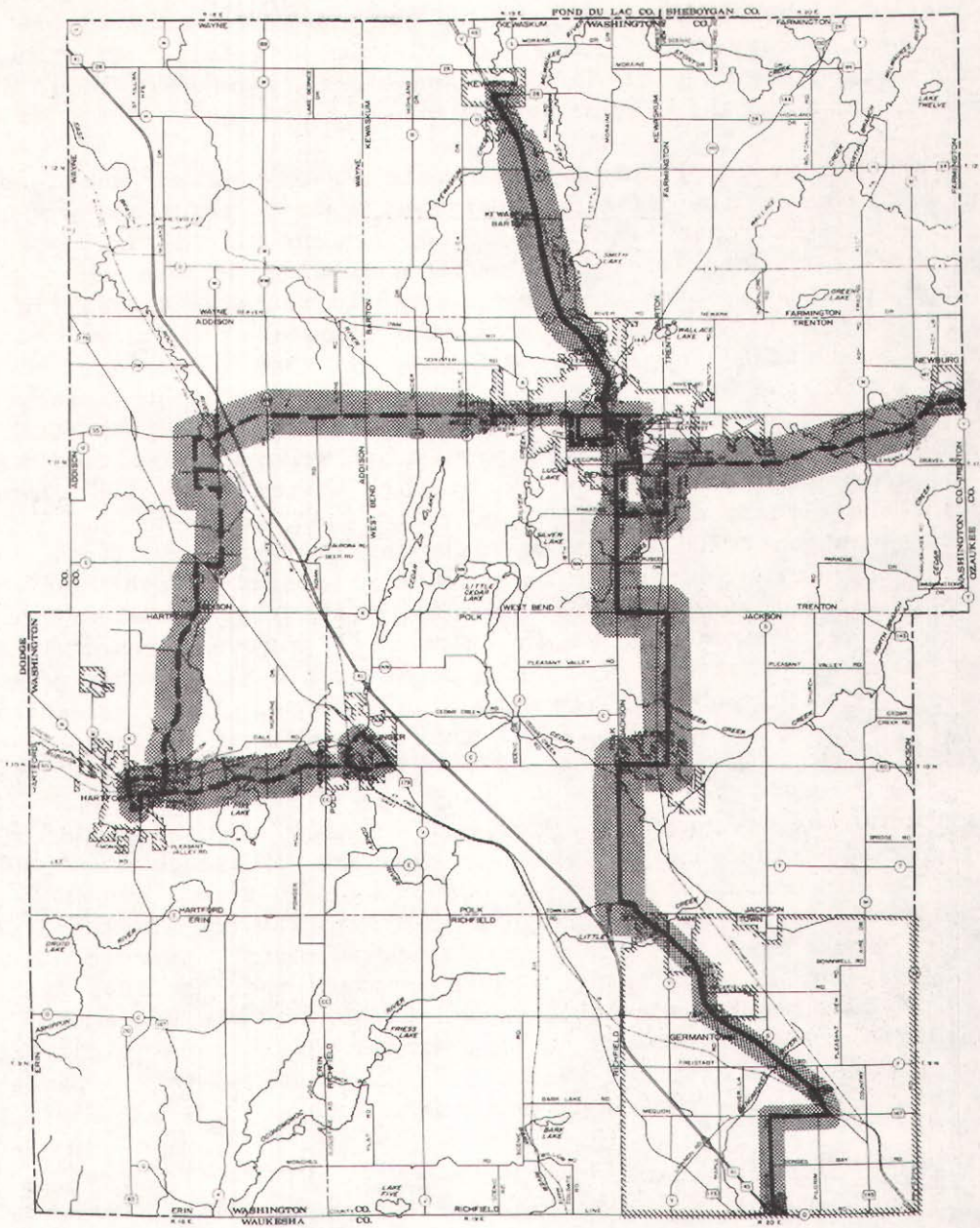
Subalternative 4A--Connect All Community Centers with Fixed Route Public Transit Service

This subalternative was developed on the principle of providing all urban and rural community centers identified within the County with fixed route bus service, thereby serving the nonlocal intercommunity and, to some degree, the local community travel demands identified in Chapter III of this report. The fixed route transit service proposed under this subalternative would consist of two lineal fixed routes connecting the eight urban and rural community centers within the County. The two fixed routes proposed to provide service under this alternative are shown on Map 20.



Operating Characteristics: The first bus route proposed under this subalternative would have one terminus in the Village of Kewaskum and the other terminus in the Village of Menomonee Falls, and would serve to connect these communities as well as the City of West Bend, the Village of Jackson, and the Village of Germantown. The second bus route proposed under this subalternative would have one terminus in the Village of Newburg and the other terminus in the Village of Slinger, and would provide a connection by public transportation between communities served by the route which, in addition to the above two, would include the City of West Bend, the unincorporated community of Allenton, and the City of Hartford. Both routes would serve the City of West Bend, where a coordinated transfer between the routes would be possible to enable persons traveling between communities served by different routes to complete their trip with a minimum of inconvenience. One-way travel times between the termini of the proposed routes would range from 80 to 90 minutes for both routes. Service on the routes would be available between the hours of 8:00 a.m. and 5:30 p.m. Mondays through Fridays, excluding holidays, with three round trips per day provided between the communities served by each route. A total of three buses would be

Map 20

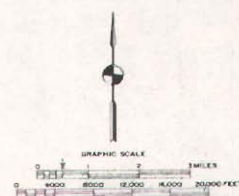
LOCATION OF FIXED ROUTE TRANSIT SERVICE IN WASHINGTON COUNTY AS PROPOSED UNDER SUBALTERNATIVE 4A



LEGEND

-  Bus Routes
-  Service Area

Source: SEWRPC.



required under this subalternative, with one vehicle required to provide the proposed level of transit service on each route, and one vehicle required for use as a spare bus. Fares for the proposed service would vary with the length of the trip, with elderly and handicapped patrons and the general public charged \$0.50 and \$1.00 per one-way trip, respectively, for shorter trips, such as those trips made between the Village of Kewaskum, Newburg, or Jackson and the City of West Bend, or those made between the Village of Slinger or the unincorporated community of Allenton and the City of Hartford. Elderly and handicapped patrons and the general public would be charged \$0.75 and \$1.50 per one-way trip, respectively, for long-distance trips, such as those trips made between the City of Hartford and the City of West Bend, or between the Village of Germantown and the City of West Bend.

The fixed route transit system proposed under this subalternative would not provide the geographic coverage of the demand-responsive transit services proposed under Alternative 3, since fixed route transit services can be considered to serve only a narrow band approximately one-quarter to one-half mile wide on both sides of a fixed bus route. However, both bus routes would be located to maximize the service provided to the major residential locations of both the general population and special transit-dependant population subgroups. Because of the incomplete coverage of residential areas within the County, about 35,000 persons, or about 41 percent of the total resident population of the County, would be served by this transit system. The major concentrations of transit-dependant population groups identified within the County would, however, be completely served by this system, as would almost all of the facilities for the elderly and handicapped population subgroups, with facilities not served by the proposed transit service including The Threshold, Inc., Cedar Lake Home for the Aged, and those senior citizens centers located outside the eight community centers within the County. Almost all major shopping areas and medical and public institutional centers identified in Chapter III of this report and located within the eight community centers within the County would be directly provided with transit service or lie within the service area of a proposed route. No attempt would be made by this proposed service to serve the employees of the major employment centers within the County.

Ridership Projections: Based upon the level of transit service offered by this subalternative, transit ridership in 1982 is forecast to range from 300 to 500 one-way trips per month, or about 3,600 to 6,000 one-way trips annually. By 1986, ridership on the system is forecast to range from 650 to 950 one-way trips per month, or about 7,800 to 11,400 one-way trips annually. Both vehicle hours of service and vehicle miles of service are forecast to remain constant over the five-year planning period at about 4,800 hours and 110,200 miles per year. Projected ridership increases, along with constant service levels, should result in a slight increase in vehicle productivity over the planning period of from about 0.8 to 1.3 passengers per hour in 1982 to about 1.6 to 2.4 passengers per hour in 1986.

Capital Project and Operating Costs: The transit service proposed under this subalternative would require the acquisition of three 14-passenger minibuses--one bus for operation on each of the two proposed routes and one bus to be used as a spare. All buses would be equipped with fareboxes and two-way mobile radios. In addition, bus stop signs would be required to mark major bus stops within the community centers and to prohibit parking in these areas. The capital investment required for this subalternative would total about \$75,500, of which \$60,400, or 80 percent, would represent the federal share under the Section 18 transit assistance program, and \$15,100, or 20 percent, would represent the county share of the total project cost. The estimated costs of the capital equipment necessary to implement this alternative are presented in Table 27.

Table 27

**CAPITAL PROJECTS AND EXPENDITURES REQUIRED UNDER
SUBALTERNATIVE 4A: CONNECT ALL COMMUNITY
CENTERS WITH FIXED ROUTE PUBLIC TRANSIT SERVICE**

| Quantity | Capital Equipment | Unit Cost ^a | Total Cost ^a |
|---|---------------------------------|------------------------|-------------------------|
| 3 | 14-Passenger Minibuses | \$18,000 | \$54,000 |
| 3 | Nonregistering Lock | | |
| | Vault Fareboxes | 2,000 | 6,000 |
| 3 | Mobile Radio Units..... | 1,000 | 3,000 |
| 125 | Bus Stop Signs (installed)..... | 45 | 5,600 |
| Total Capital Investment..... | | -- | \$68,000 |
| Contingency Fund..... | | -- | 6,900 |
| Total | | | |
| Federal Share (80 percent) ^b | | -- | \$75,500 |
| Local Share (20 percent) | | -- | 60,400 |
| | | -- | 15,100 |

^aConstant 1981 dollars.

^bFederal funds available under UMTA Section 18 transit assistance program.

Source: SEWRPC.

Operating deficits under the proposed system should decrease over the planning period with the growth of transit ridership. A high operating deficit per ride, ranging from \$14.13 to \$25.38, would be expected during 1982 because of the low initial forecast ridership. Based upon forecast ridership growth, the operating deficit per passenger would decline by 1986, ranging from \$7.33 to \$11.18. Assuming the use of federal Section 18 transit operating assistance funds, the County's share of the public funding requirement in 1982 is expected to range from \$44,500 to \$45,700, or from about \$7.41 to \$12.69 per ride. Because of the loss of federal transit operating assistance funds anticipated after 1982, the County's share of the public funding requirement for the proposed service would increase to 100 percent of the total operating deficit for the proposed transit service, and would range from \$87,200 to \$89,000, or about \$11.18 to \$16.59 per ride, in 1983, and from \$83,600 to \$87,200, or about \$7.33 to \$11.18 per ride, in 1986. Information on forecast ridership, operating costs, system deficits, and public funding requirements for this subalternative can be found in Table 28.

**Subalternative 4B--Connect Major Community Centers
with Fixed Route Public Transit Service**

This subalternative was developed on the principle of providing public transit service within the major travel corridors identified within the County while

Table 28

**OPERATING CHARACTERISTICS OF SUBALTERNATIVE 4A:
CONNECT ALL COMMUNITY CENTERS WITH
FIXED ROUTE PUBLIC TRANSIT SERVICE**

| Characteristic ^a | Year | | | | |
|---------------------------------|-----------------|-----------------|-----------------|-----------------|-----------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Ridership Forecast | | | | | |
| Monthly..... | 300-500 | 450-650 | 550-850 | 600-900 | 650-950 |
| Annual..... | 3,600-6,000 | 5,400-7,800 | 6,600-10,200 | 7,200-10,800 | 7,800-11,400 |
| Annual Vehicle Miles..... | 110,200 | 110,200 | 110,200 | 110,200 | 110,200 |
| Annual Vehicle Hours..... | 4,800 | 4,800 | 4,800 | 4,800 | 4,800 |
| Operating Cost | | | | | |
| Per Year..... | \$95,000 | \$95,000 | \$95,000 | \$95,000 | \$95,000 |
| Per Ride..... | \$15.83-26.38 | \$12.18-17.59 | \$9.31-14.39 | \$8.79-13.19 | \$8.33-12.17 |
| Revenue | | | | | |
| Per Year..... | \$3,600-6,000 | \$5,400-7,800 | \$6,600-10,200 | \$7,200-10,800 | \$7,200-11,400 |
| Percent of Operating Cost... | 3.8-6.3 | 5.7-8.2 | 6.9-10.7 | 7.5-11.4 | 8.2-12.0 |
| Operating Deficit | | | | | |
| Per Year..... | \$89,000-91,400 | \$87,200-89,600 | \$84,800-88,400 | \$84,200-87,800 | \$83,600-87,200 |
| Per Ride..... | \$14.13-25.38 | \$11.18-16.59 | \$8.31-13.39 | \$7.80-12.19 | \$7.33-11.18 |
| Public Funding Requirement..... | | | | | |
| Federal ^b | \$44,500-45,700 | \$ -- | \$ -- | \$ -- | \$ -- |
| Local..... | \$44,500-45,700 | \$87,200-89,000 | \$84,800-88,400 | \$84,200-87,800 | \$83,600-87,200 |
| Total | \$89,000-91,400 | \$87,200-89,000 | \$84,800-88,400 | \$84,200-87,800 | \$83,600-87,200 |
| Local Cost per Ride..... | \$7.41-12.69 | \$11.18-16.59 | \$8.31-13.39 | \$7.80-12.19 | \$7.33-11.18 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)

Elderly, handicapped..... 50
Nonelderly, nonhandicapped..... 50

2. Fare

Elderly, handicapped..... \$0.50-0.75
Nonelderly, nonhandicapped..... \$1.00-1.50
Average fare..... \$1.00

3. Operating Characteristics

Monday-Friday (excluding holidays)
8:00 a.m. - 5:30 p.m.
255 days per year

4. All costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes federal funding under the UMTA Section 18 program to defray 50 percent of the total operating deficit.

Source: SEWRPC.

primarily connecting the larger or more densely developed urban community centers of Hartford and West Bend. This subalternative, therefore, represents a reduction in the amount of area coverage from that proposed under Subalternative 4A. Under this subalternative, transit service would be provided over a single fixed bus route connecting five of the eight urban and rural community centers within the County. The three urban community centers left unserved under this alternative--the Village of Germantown, the Village of Newburg, and the unincorporated community of Allenton--represent areas with low overall population density, low transit-dependant or total population, or few major trip generators. The single, fixed bus route proposed under this subalternative is shown on Map 21.

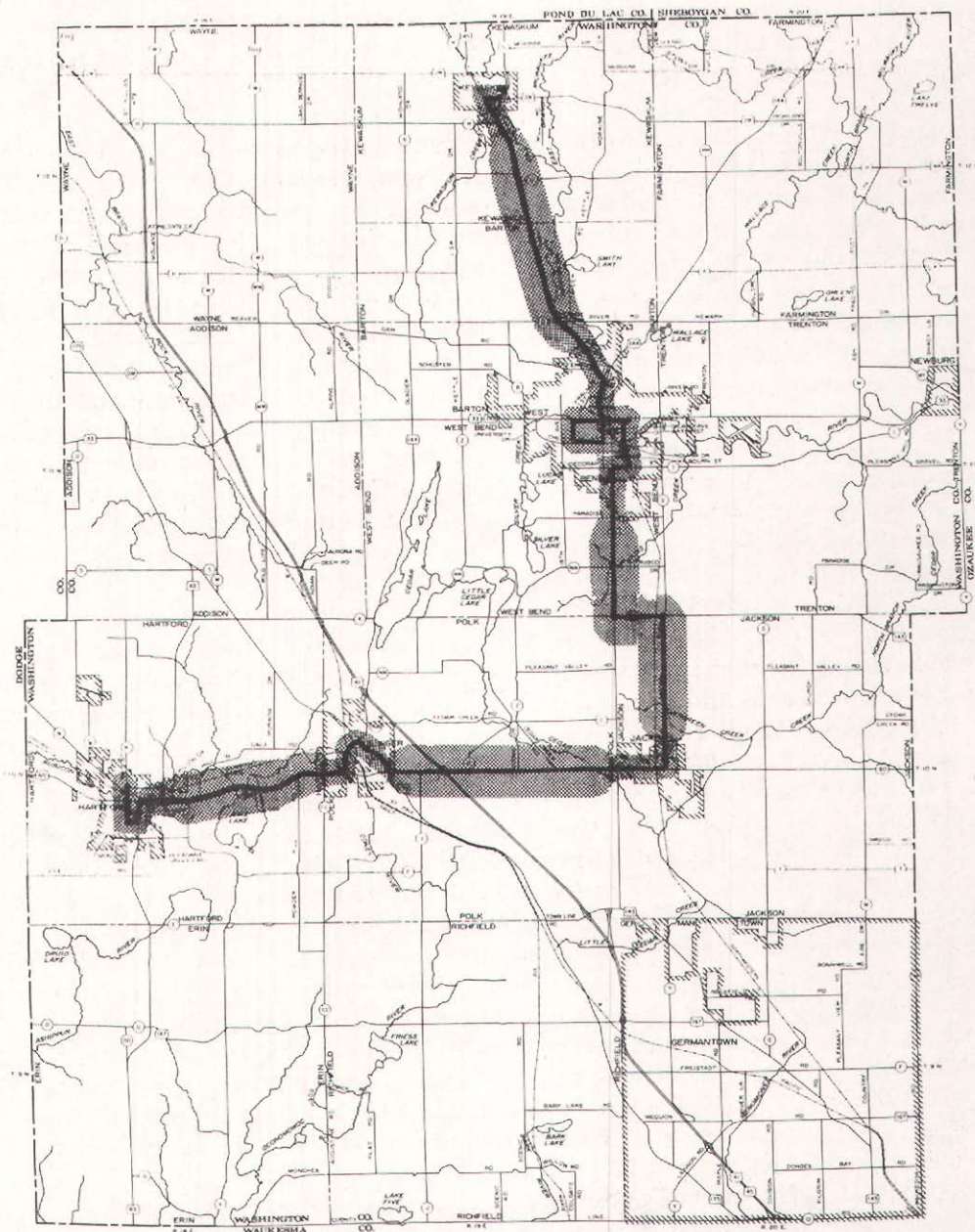
Operating Characteristics: The single bus route proposed under this alternative would have one terminus within the Village of Kewaskum and the other terminus in the City of Hartford, and would provide a connection by public transportation between communities served by the route, which, in addition to the above two communities, would include the City of West Bend, the Village of Jackson, and the Village of Slinger. One-way travel time between the termini of the proposed route would range from 75 to 80 minutes. Transit service on the single fixed route would be available between the hours of 8:00 a.m. and 5:30 p.m. Mondays through Fridays, excluding holidays, with three round trips per day provided between the communities served by the route. A total of two buses would be required under this subalternative: one bus to provide transit service on the fixed route and one bus for use as a spare. As under Subalternative 4A, fares on the proposed service would vary with the length of the trip, with elderly and handicapped patrons and the general public charged \$0.50 and \$1.00, respectively, per one-way trip for short-distance trips and \$0.75 and \$1.50, respectively, for long-distance trips.

As under Subalternative 4A, the transit service provided under this subalternative would not provide the geographic coverage of the demand-responsive transit services proposed under Alternative 3 and, in addition, would provide less geographic coverage of the County than the fixed route bus system proposed under Subalternative 4A. As proposed under Subalternative 4A, the bus route would be located within the community centers so as to maximize the service provided to the major residential locations of both the general population and the special transit-dependant population subgroups. The single bus route would serve about 30,000 persons, or about 35 percent of the 1980 county population. The route would provide transit service to all community centers in which concentrations of transit-dependant population groups--the elderly and zero- and one-automobile households--have been identified. Facilities for the elderly and handicapped population groups left unserved by this subalternative would include The Threshold, Inc., Cedar Lake Home for the Aged, and those senior citizen centers located outside the five community centers within the County served by this system. Almost all major shopping, medical, and public institutional centers identified within Chapter III of this report and located within the five community centers served by the proposed bus route would be directly provided with transit service or lie within the service area of the proposed route. Major traffic generators not located within the community centers served by the proposed route would not be served by the proposed transit service. No attempt would be made by the transit service proposed under this subalternative to serve the employees of the major employment centers within the County.

Ridership Projections: Based upon the level of service offered under this subalternative, transit ridership on the proposed service is forecast to range from 240 to 360 one-way trips per month in 1982, or about 3,000 to 4,300 one-way trips annually. By 1986, ridership on the proposed transit service is expected to range from 480 to 720 one-way trips per month, or about 5,800 to 8,600 one-way trips annually. Both vehicle hours of service and vehicle miles of service are forecast to remain constant

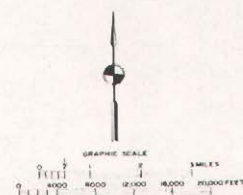
Map 21

LOCATION OF FIXED ROUTE TRANSIT SERVICE IN WASHINGTON COUNTY AS PROPOSED UNDER SUBALTERNATIVE 4B



LEGEND

-  Bus Route
-  Service Area



Source: SEWRPC.

over the planning period at about 2,400 hours and 49,000 miles per year. Based upon forecast ridership increases and constant service levels, vehicle productivity for the proposed transit service should increase slightly over the five-year planning period--from about 1.3 to 1.8 passengers per hour in 1982 to about 2.4 to 3.6 passengers per hour in 1986.

Capital Project and Operating Costs: The transit service proposed under this subalternative would require the acquisition of two 14-passenger minibuses: one bus for operation on the bus route and one bus to be used as a spare. All buses would be equipped with fareboxes and with two-way mobile radios. In addition, bus stop signs would be required to mark major bus stops within the community centers and to prohibit parking in these areas. The capital investment required for this subalternative would total about \$49,900, of which \$39,920, or 80 percent, would represent the federal share under the Section 18 transit assistance program and \$9,980, or 20 percent, would represent the county share of the total project cost. The estimated costs of the capital equipment necessary to implement this alternative are presented in Table 29.

As under Subalternative 4A, operating deficits for the proposed transit service should decrease over the planning period with the growth of transit ridership. Operating deficits per ride would be expected to be high in 1982, ranging from \$10.86 to \$16.00. However, the operating deficit per ride would be expected to decrease with increased ridership on the proposed service, and to range from \$4.93 to \$7.79 by

Table 29

**CAPITAL PROJECTS AND EXPENDITURES REQUIRED UNDER
SUBALTERNATIVE 4B: CONNECT MAJOR COMMUNITY
CENTERS WITH FIXED ROUTE PUBLIC TRANSIT SERVICE**

| Quantity | Capital Equipment | Unit Cost ^a | Total Cost ^a |
|---|----------------------------------|------------------------|-------------------------|
| 2 | 14-Passenger Minibuses | \$18,000 | \$35,000 |
| 2 | Nonregistering Lock | | |
| | Vault Fareboxes | 2,000 | 4,000 |
| 2 | Mobile Radio Units | 1,000 | 2,000 |
| 75 | Bus Stop Signs (installed) | 45 | 3,400 |
| Total Capital Investment | | -- | \$45,400 |
| Contingency Fund | | -- | 4,500 |
| Total | | -- | \$49,900 |
| Federal Share (80 percent) ^b | | -- | 39,920 |
| Local Share (20 percent) | | -- | 9,980 |

^aConstant 1981 dollars.

^bFederal funds available under UMTA Section 18 transit assistance program.

Source: SEWRPC.

1986. Assuming the use of Section 18 transit operating assistance funds, the County's share of the public funding requirement in 1982 is expected to range from \$23,350 to \$24,000, or from \$5.43 to \$8.00 per ride. Because of the loss of federal transit operating assistance funds anticipated after 1982, the County's share of the public funding requirement for the proposed service would increase over 1982 levels to 100 percent of the total operating deficit for the proposed transit service, and would range from \$45,200 to \$47,200, or about \$7.79 to \$12.42 per ride, in 1983, declining slightly to from \$42,400 to \$45,200, or about \$4.93 to \$7.79 per ride, by 1986. Information on forecast ridership, operating costs, system deficits, and public funding requirements for this subalternative can be found in Table 30.

ALTERNATIVE 5--PROVIDE COMBINATION OF FIXED ROUTE AND DEMAND-RESPONSIVE PUBLIC TRANSIT SERVICE

Alternative 3 and Alternative 4 examined methods of utilizing demand-responsive and fixed route public transit services, respectively, to alleviate deficiencies in the existing level of public transit service within the County. These alternatives gave indications of the substantial cost that would be entailed in providing a countywide, demand-responsive transit service capable of serving routine daily trips, and of the difficulty that would be encountered in providing fixed route transit service that offers complete geographic-service-area coverage of the County. Alternative 5 considers a combination of elements of the more cost-effective and productive subalternatives considered under Alternatives 3 and 4 in an effort to eliminate the deficiencies associated with the transit services proposed under each subalternative, and still provide a cost-efficient countywide transit service.

Under this alternative, the eligibility requirements for use of the existing specialized transportation service provided by the county-sponsored OAT program would be expanded to include the general public, as proposed under Subalternative 3A. Demand-responsive transportation service would, thus, be made available to the general public for travel within the three service areas established for the OAT program. In addition, a single fixed bus route, similar but more extensive than the route proposed under Subalternative 4B, would be operated between the City of Hartford and the City of West Bend to provide for travel between the two major OAT service areas. The demand-responsive transit service areas and the single fixed bus route proposed under this subalternative are shown on Map 22. The following sections describe the relevant operating characteristics, ridership projections, and operating and capital costs of this alternative.

Operating Characteristics

The operating characteristics, schedule of service availability, and fare structure for the demand-responsive element of this alternative are the same as those noted under Subalternative 3A. The single fixed bus route proposed under this alternative would have one terminus in the City of Hartford and the other terminus in the City of West Bend, and would provide a connection by public transportation between these communities and between the other communities served by the route, including the Village of Jackson and the Village of Slinger. One-way travel time between the termini of the proposed route would range from 65 to 70 minutes. Transit service on the single fixed route would be available Mondays through Fridays, excluding holidays, between the hours of 9:00 a.m. and 5:00 p.m., with three round trips per day provided between communities served by the route. Fares for the proposed service would be similar to those proposed under Alternative 4, with elderly and handicapped patrons and the general public charged \$0.50 and \$1.00, respectively, per one-way trip for shorter trips, and \$0.75 and \$1.50, respectively, per one-way trip for longer trips.

Table 30

**OPERATING CHARACTERISTICS OF SUBALTERNATIVE 4B:
CONNECT MAJOR COMMUNITY CENTERS WITH
FIXED ROUTE PUBLIC TRANSIT SERVICE**

| Characteristic ^a | Year | | | | |
|------------------------------|-----------------|-----------------|-----------------|-----------------|-----------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Ridership Forecast | | | | | |
| Monthly..... | 240-360 | 320-400 | 400-600 | 440-660 | 480-720 |
| Annual..... | 3,000-4,300 | 3,800-5,800 | 4,800-7,200 | 5,300-7,920 | 5,800-8,600 |
| Annual Vehicle Miles..... | 49,000 | 49,000 | 49,000 | 49,000 | 49,000 |
| Annual Vehicle Hours..... | 2,400 | 2,400 | 2,400 | 2,400 | 2,400 |
| Operating Cost | | | | | |
| Per Year..... | \$51,000 | \$51,000 | \$51,000 | \$51,000 | \$51,000 |
| Per Ride..... | \$11.86-17.00 | \$8.79-13.42 | \$7.08-10.62 | \$6.45-9.62 | \$5.93-8.79 |
| Revenue | | | | | |
| Per Year..... | \$3,000-4,300 | \$3,800-5,800 | \$4,800-7,200 | \$5,300-7,900 | \$5,800-8,600 |
| Percent of Operating Cost... | 5.9-8.4 | 7.4-11.4 | 9.4-14.1 | 10.4-15.5 | 11.4-16.9 |
| Operating Deficit | | | | | |
| Per Year..... | \$46,700-48,000 | \$45,200-47,200 | \$43,800-46,200 | \$43,100-45,700 | \$42,400-45,200 |
| Per Ride..... | \$10.86-16.00 | \$7.79-12.42 | \$6.08-9.62 | \$5.45-8.62 | \$4.93-7.79 |
| Public Funding Requirement | | | | | |
| Federal..... | \$23,350-24,000 | \$ -- | \$ -- | \$ -- | \$ -- |
| Local..... | \$23,350-24,000 | \$45,200-47,200 | \$43,800-46,200 | \$43,100-45,700 | \$42,400-45,200 |
| Total | \$46,700-48,000 | \$45,200-47,200 | \$43,800-46,200 | \$43,100-45,700 | \$42,400-45,200 |
| Local Cost per Ride..... | \$5.43-8.00 | \$7.79-12.42 | \$6.08-9.62 | \$5.45-8.62 | \$4.93-7.79 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)
 - Elderly, handicapped..... 50
 - Nonelderly, nonhandicapped..... 50
2. Fare
 - Elderly, handicapped..... \$0.50-0.75
 - Nonelderly, nonhandicapped..... \$1.00-1.50
 - Average fare..... \$1.00
3. Operating Characteristics
 - Monday-Friday (excluding holidays)
 - 8:00 a.m. - 5:30 p.m.
 - 255 days per year

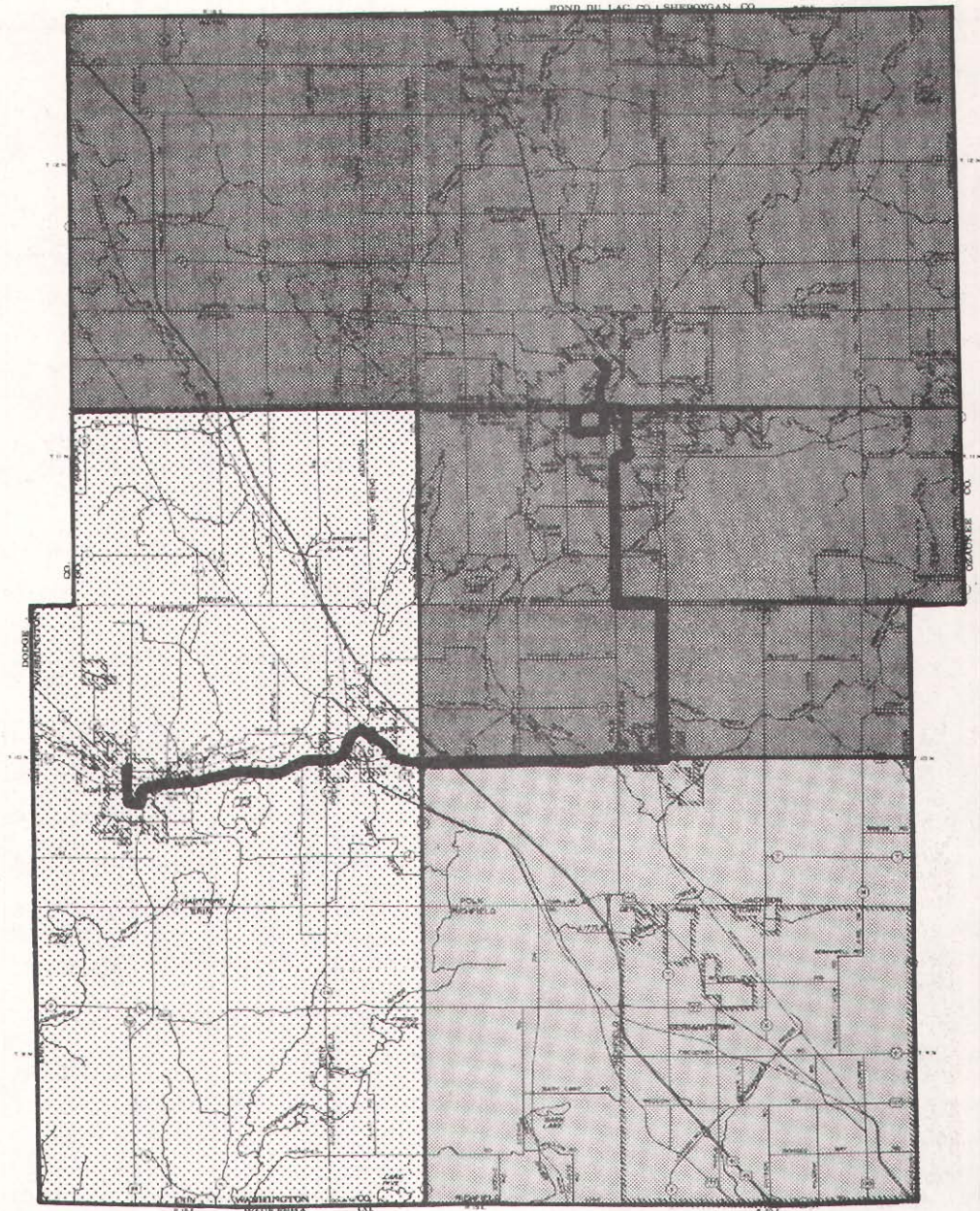
4. All costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes federal funding under the UMTA Section 18 program to defray 50 percent of the total operating deficit.





Source: SEWRPC.

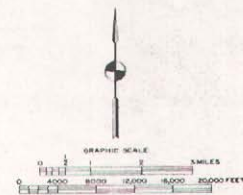
Map 22

LOCATION OF OLDER ADULT TRANSPORTATION PROGRAM SERVICE
AREAS AND FIXED ROUTE TRANSIT SERVICE IN WASHINGTON
COUNTY AS PROPOSED UNDER ALTERNATIVE 5



LEGEND

-  West Bend Service Area
-  Germantown Service Area
-  Hartford Service Area
-  Bus Route



Source: SEWRPC.

A total of four vehicles would be required to provide the demand-responsive and fixed route transit services proposed under this alternative. As noted under Subalternative 3A, two vehicles would be required to operate the advance-reservation transit service provided by the OAT program. The vehicles used to provide this service are currently owned and supplied by the contract service provider, the Hartford Municipal Recreation Department. Because of the age of the two vehicles currently utilized to provide the service and the service levels proposed for the OAT program over the five-year planning period, both existing vehicles will need to be replaced by the end of the planning period. In addition, a total of two vehicles would be required to operate the single fixed bus route proposed under this subalternative, with one vehicle being required to provide transit service on the fixed route and one vehicle being required for use as a spare.

Implementation of the combined demand-responsive and fixed route public transit services proposed under this alternative would provide residents of the County with a slightly higher level of public transit service than the basic level of service proposed under Subalternative 3A. As noted under Subalternative 3A, the demand-responsive transit service would provide complete service area coverage of all residential areas within the County, with 100 percent of the county population being provided with public transportation of a limited nature. In addition, the proposed fixed route transit service would allow for travel between the two major service areas by providing public transit service between the Cities of Hartford and West Bend. The combined transit services proposed under this alternative would provide transit service to the major concentrations of transit-dependant population groups identified within the County, and would serve all special facilities for the elderly and handicapped population and all major trip generators within the County. However, the limited days and hours of the transit service proposed under this alternative would, as noted for Subalternative 3A, probably limit consideration of use of the service to essential, nonwork purpose travel.

Ridership Projections

Ridership on the demand-responsive transit service proposed under this alternative would be the same as that forecast for Subalternative 3A, ranging from 680 to 720 one-way trips per month in 1982, or 8,200 to 8,600 one-way trips annually, and from 840 to 960 one-way trips per month in 1986, or about 10,100 to 11,500 one-way trips annually. Ridership on the fixed route transit service proposed under this alternative is forecast to range from 160 to 240 one-way trips per month in 1982, or from 1,900 to 2,900 one-way trips annually. By 1986, ridership on the fixed route transit service is forecast to range from 400 to 600 one-way trips per month, or from 4,800 to 7,200 one-way trips annually. Based upon these figures, total transit ridership on the combined transit services is forecast to range from 840 to 960 one-way trips per month in 1982, or from 10,100 to 11,500 one-way trips annually, and from 1,240 to 1,560 one-way trips per month in 1986, or from 14,900 to 18,700 one-way trips annually. Vehicle hours of service under this alternative would remain constant over the planning period at about 2,700 hours per year for the demand-responsive transit service and at about 2,100 hours per year for the fixed route transit service. Vehicle miles of service for the demand-responsive transit service would be expected to increase slightly each year in the planning period in response to forecast ridership demand--from about 25,200 miles in 1982 to about 32,400 miles in 1986. Vehicle miles of service for the fixed route transit service would remain constant over the five-year period at about 39,800 miles per year. Based upon forecast ridership increases, vehicle productivity for the proposed transit services should increase slightly over the five-year period--from about 2.1 to 2.4 passengers per hour in 1982 to about 3.1 to 3.9 passengers per hour in 1986.

Capital Project and Operating Costs

Implementation of the demand-responsive transit service proposed under this subalternative would require the acquisition of one 16-passenger minibus and one 8-passenger

minibus to replace the vehicles currently owned and operated by the Hartford Municipal Recreation Department in providing the OAT service. Both vehicles would be equipped with mobile radios and wheelchair lifts to accommodate the handicapped. The fixed route bus service proposed under this alternative would require the acquisition of two 14-passenger minibuses: one bus to provide transportation on the proposed route and one bus to be used as a spare. Both buses used to provide the fixed route service would be equipped with fareboxes and with two-way mobile radios. In addition, bus stop signs would be required to mark major bus stops within the community centers and prohibit parking in these areas. The capital investment required for this alternative would total about \$101,400, of which \$81,120, or 80 percent, would represent the federal share under the Section 18 transit assistance program, and \$20,280, or 20 percent, would represent the county share of the total project cost. The estimated costs of the capital equipment necessary to implement this alternative are presented in Table 31.

Total operating deficits for the transit service proposed under this subalternative would be expected to remain at about the same level over the planning period. The total operating deficit per ride for the proposed transit services would be expected to decline over the planning period because of forecast ridership increases, and

Table 31

**CAPITAL PROJECTS AND EXPENDITURES REQUIRED UNDER ALTERNATIVE 5:
PROVIDE COMBINATION OF DEMAND-RESPONSIVE AND
FIXED ROUTE PUBLIC TRANSIT SERVICE**

| Quantity | Capital Equipment | Unit Cost ^a | Total Cost ^a |
|---|--|------------------------|-------------------------|
| 1 | 16-Passenger Minibus Equipped with Wheelchair Lift | \$24,000 | \$24,000 |
| 1 | 8-Passenger Minibus Equipped with Wheelchair Lift | 21,000 | 21,000 |
| 2 | 14-Passenger Minibuses | 18,000 | 36,000 |
| 2 | Nonregistering Lock Vault Fareboxes | 2,000 | 4,000 |
| 4 | Mobile Radio Units | 1,000 | 4,000 |
| 70 | Bus Stop Signs (installed) | 45 | 3,200 |
| Total Capital Investment | | -- | \$ 92,200 |
| Contingency Fund | | -- | 9,200 |
| Total | | -- | \$101,400 |
| Federal Share (80 percent) ^b | | -- | 81,120 |
| Local Share (20 percent) | | -- | 20,280 |

^a Constant 1981 dollars.

^b Federal funds available under UMTA Section 18 transit assistance program.

Source: SEWRPC.

would range from about \$7.21 to \$8.33 in 1982 and from about \$4.28 to \$5.58 in 1986. Assuming the use of federal Section 18 transit operating funds and state funds available under the State's financial aid program to counties for elderly and handicapped transportation, the County's share of the total public funding requirement in 1982 is anticipated to range from \$9,410 to \$9,870, or from about \$0.82 to \$0.98 per ride. Because of the loss of federal transit operating assistance funds anticipated after 1982, the County's share of the public funding requirement for the proposed services would increase significantly over 1982 levels, ranging from \$45,100 to \$47,700, or about \$3.29 to \$4.15 per ride, in 1983, and declining to from \$43,200 to \$46,400, or about \$2.31 to \$3.11 per ride, by 1986. Information on forecast ridership, operating costs, system deficits, and public funding requirements for this alternative can be found in Table 32.

EVALUATION OF ALTERNATIVES

The preceding sections of this chapter have presented seven transit service alternatives, representing five basic alternative actions, which could be implemented within Washington County in response to the current need for public transportation. Before any decision can be made concerning implementation of any one alternative, the alternatives must be evaluated in terms of both service characteristics and implementation cost. Using information obtained from this evaluation, a recommendation can be made regarding the best plan for implementation.

Service Characteristics

Previous sections of this chapter have presented transit service alternatives proposing different levels of transit service for Washington County. The base or minimum level of transit service proposed under any of the alternatives considered was that proposed by the status quo alternative. As previously noted, the transit service proposed under this alternative would be limited to the present transit services within the County, which include local taxicab service in the City of Hartford and the City of West Bend; intercity bus service; and specialized transportation services for certain subgroups of the general population. While these transit services often represent the only means of satisfying the personal need for travel, and, therefore, supply important services to a portion of the county population--including approximately 28,500 persons in the two communities served by local taxicab services and approximately 10,600 elderly persons throughout the County--a substantial portion of the county population is left unserved by the current transit services. In addition, the status quo alternative does not attempt to alleviate problems and deficiencies associated with the current public transit services. To address the problems and deficiencies associated with the continuation of the present level of public transit service, as proposed under the status quo alternative, several transit service alternatives were developed which would offer various levels of improved public transit service to the general population of the County. The major service characteristics of the transit service alternatives proposing improved transit service are set forth in Table 33.

A review of the information contained within this table and within previous sections of the chapter indicates that the alternatives proposing demand-responsive transit service would provide the highest level of regular public transit service of the alternatives considered. The demand-responsive transit services proposed under Alternatives 3 and 5 would make door-to-door transportation service available to those persons presently unserved by local taxicab service, or to about 56,300 persons representing 66 percent of the total county population. Of the demand-responsive transit services considered, the transit service proposed under Subalternative 3B, expand countywide advance-reservation transit service, would provide the highest level of transit service, with the availability and extent of transit service offered

Table 32

**OPERATING CHARACTERISTICS OF ALTERNATIVE 5:
PROVIDE COMBINATION OF DEMAND-RESPONSIVE
AND FIXED ROUTE PUBLIC TRANSIT SERVICE**

| Characteristic ^a | Year | | | | |
|------------------------------|-----------------|-----------------|-----------------|-----------------|-----------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Ridership Forecast | | | | | |
| Monthly | | | | | |
| Fixed Route..... | 160-240 | 240-360 | 320-480 | 360-540 | 400-600 |
| Advance Reservation..... | 680-720 | 720-780 | 760-840 | 800-900 | 840-960 |
| Annual..... | 10,100-11,500 | 11,500-13,700 | 13,000-15,800 | 13,900-17,300 | 14,900-18,700 |
| Annual Vehicle Miles | | | | | |
| Fixed Route..... | 39,800 | 39,800 | 39,800 | 39,800 | 39,800 |
| Advance Reservation..... | 25,200 | 27,000 | 28,800 | 30,600 | 32,400 |
| Total | 65,000 | 66,800 | 68,600 | 70,400 | 72,200 |
| Annual Vehicle Hours | | | | | |
| Fixed Route..... | 2,100 | 2,100 | 2,100 | 2,100 | 2,100 |
| Advance Reservation..... | 2,700 | 2,700 | 2,700 | 2,700 | 2,700 |
| Total | 4,800 | 4,800 | 4,800 | 4,800 | 4,800 |
| Operating Cost per Year | | | | | |
| Fixed Route..... | \$45,000 | \$45,000 | \$45,000 | \$45,000 | \$45,000 |
| Advance Reservation..... | 45,900 | 46,700 | 47,400 | 48,200 | 49,900 |
| Total | \$90,900 | \$91,700 | \$92,400 | \$93,200 | \$93,900 |
| Total per Ride | \$7.90-9.00 | \$6.70-7.97 | \$5.85-7.11 | \$5.39-6.70 | \$5.02-6.30 |
| Revenue per Year | | | | | |
| Fixed Route..... | \$2,000-2,900 | \$2,900-4,300 | \$3,800-5,800 | \$4,300-6,500 | \$4,800-7,200 |
| Advance Reservation..... | \$4,800-5,000 | \$5,000-5,500 | \$5,300-5,900 | \$5,600-6,300 | \$5,900-6,700 |
| Total | \$6,800-7,900 | \$7,900-9,800 | \$9,100-11,700 | \$9,900-12,800 | \$10,700-13,900 |
| Percent of Operating Cost... | 7.5-8.7 | 8.7-10.8 | 10.0-12.9 | 10.9-14.1 | 11.8-15.3 |
| Operating Deficit | | | | | |
| Per Year..... | \$83,000-84,100 | \$81,900-83,800 | \$80,700-83,300 | \$80,400-83,300 | \$80,400-83,200 |
| Per Ride..... | \$7.21-8.33 | \$5.98-7.29 | \$5.11-6.41 | \$4.65-5.99 | \$4.28-5.58 |
| Public Funding Requirement | | | | | |
| Federal | \$41,500-42,050 | \$ -- | \$ -- | \$ -- | \$ -- |
| State | \$18,590-18,680 | \$36,800 | \$36,800 | \$36,800 | \$36,800 |
| Local | \$9,410-9,870 | \$45,100-47,700 | \$44,900-46,500 | \$43,600-45,700 | \$43,200-46,400 |
| Total | \$83,000-84,100 | \$81,900-83,800 | \$80,700-83,300 | \$80,400-83,300 | \$80,000-83,200 |
| Local Cost per Ride..... | \$0.82-0.98 | \$3.29-4.15 | \$2.84-3.57 | \$2.52-3.29 | \$2.31-3.11 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)

| | |
|-------------------------------|----|
| Advance Reservation | |
| Elderly, handicapped..... | 85 |
| Nonelderly, nonhandicapped... | 15 |
| Fixed Route | |
| Elderly, handicapped..... | 50 |
| Nonelderly, nonhandicapped... | 50 |

2. Fare

| | |
|-------------------------------|-------------|
| Advance Reservation | |
| Elderly, handicapped..... | \$0.50 |
| Nonelderly, nonhandicapped... | \$1.00 |
| Average fare..... | \$0.58 |
| Fixed Route | |
| Elderly, handicapped..... | \$0.50-0.75 |
| Nonelderly, nonhandicapped... | \$1.00-1.50 |
| Average Fare..... | \$1.00 |

3. Operating Characteristics

| | |
|--|--|
| Advance Reservation: | |
| Same as for existing Older Adult Transportation program. | |
| Fixed Route: | |
| Monday-Friday (excluding holidays) | |
| 9:00 a.m. - 5:00 p.m. | |
| 255 days per year | |

4. All costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes federal funding under the UMTA Section 18 program to defray 50 percent of the total operating deficit.

^cAssumes state funding under the elderly and handicapped transportation assistance program for counties up to the expected 1982 level.

Source: SBMRPC.

Table 33

**SERVICE CHARACTERISTICS OF GENERAL PUBLIC TRANSIT
SERVICES PROPOSED UNDER TRANSIT SERVICE ALTERNATIVES**

| Characteristic | Transit Service Alternative | | | | | |
|--|---|---|--|---|--|--|
| | Promote Countywide Ride-sharing | Demand Responsive | | Fixed Route | | Provide Combined Fixed Route and Demand-Responsive Service |
| | | Expand Existing OAT Program | Expand Countywide Advance- Reservation Service | Connect All Community Centers | Connect Major Community Centers | |
| Service Coverage Service Area..... | Countywide | Countywide within OAT service areas | Countywide | All community centers, and along routes | Five community centers, and along routes | Countywide within three OAT service areas, and along fixed routes |
| General Population Served..... | 84,800 | 84,800 | 84,800 | 35,000 | 30,000 | 84,800 |
| Percent of Total County Population..... | 100 | 100 | 100 | 41 | 35 | 100 |
| Service Availability..... | Individual or pro- gram arrangement | Varied schedule for OAT service areas | Monday-Friday 6:00 a.m.-6:00 p.m. | Monday-Friday 8:00 a.m.-5:30 p.m. | Monday-Friday 8:00 a.m.-5:30 p.m. | Varied schedule for OAT service areas and Mon- day-Friday 9:00 a.m.- 5:00 p.m. for fixed route service |
| Fare General Public..... | Individual arrangement | \$1.00 | \$1.50 | \$1.00-1.50 | \$1.00-1.50 | \$1.00-1.50 |
| Elderly and Handicapped... | Individual or pro- gram arrangement | \$0.50 | \$0.50 | \$0.50-0.75 | \$0.50-0.75 | \$0.50-0.75 |
| Coordination with Specialized Trans- portation Services..... | Provided as an adjunct to existing services | Provided in conjunction with OAT service | Replaces OAT service | None | None | Provided in conjunction with OAT service |

Source: SBMRPC.

under this subalternative allowing the opportunity for travel by public transportation for most trips made on a routine basis by residents of the County. Although the expansion of eligibility requirements for use of the existing Older Adult Transportation service, as proposed under both Subalternative 3A and Alternative 5, would not provide the availability or extent of service of Subalternative 3B, it would, nevertheless, provide a transit service capable of serving the basic, essential nonwork travel needs of the county population presently unserved by local public transportation.

The promotion of countywide ride-sharing activities, as proposed under Alternative 2, could also provide a high level of personalized transportation service to the residents of Washington County. While incapable of guaranteeing transportation service to all persons who may request it, ride-sharing services would offer a more personalized form of transportation service than any form of regularly available public transit service considered. The ride-sharing program proposed under Alternative 2 would offer the potential for ride-sharing activities to the entire county population.

The lowest level of public transportation service considered in this study would be provided by the fixed route transit services proposed under Alternatives 4 and 5. While providing a regularly scheduled transit service within the County capable of serving the concentrations of transit-dependent population groups identified within the County, these fixed route transit services could not provide the service-area coverage of the total county population or the opportunity for the personalized transportation service that would be provided by the demand-responsive transit services considered, or the transportation service potentially available through ride-sharing.

Cost

A major consideration in determining the desirability of implementing a given transit service alternative is the cost incurred by, and the attendant local funding required for implementation of, the proposed transit service. A basic assumption of the status quo alternative is that no public subsidy would be provided for public transit services. Consequently, no public monies would be expended under this alternative. The local share of the annual public funding requirements and capital project costs for the transit service alternatives proposing improved transit services is shown in Table 34. Of the six alternatives which propose an expansion of public transit service within the County, the maximum level of local funding commitment would be required to implement Subalternative 3B, expand countywide advance-reservation public transit service. Subalternative 3A, expand eligibility requirements for the Older Adult Transportation program, would require the lowest total expenditure of local funds over the five-year planning period. It should be noted that a substantial portion of the costs required to implement Subalternative 3A would be utilized to maintain an existing county program over the five-year planning period and, therefore, would not represent a significant additional commitment of county funds for the provision of public transit service. From the information contained in Table 34, it is apparent that substantial costs to the County would be incurred should the County significantly expand its present level of commitment to the provision of public transit service.

Committee Review of Alternatives

The seven transit service alternatives were presented to the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County for its review and recommendation. While recognizing the high level of service provided by the demand-responsive transit service proposed under Subalternative 3A, Committee enthusiasm for the subalternative was tempered by the attendant high costs required for its implementation. Similarly, transit service alternatives proposing fixed route

Table 34

**LOCAL SHARE OF ANNUAL PUBLIC FUNDING REQUIREMENT AND CAPITAL
PROJECT COSTS FOR TRANSIT SERVICE ALTERNATIVES: 1981-1986**

| Characteristic | Transit Service Alternative | | | | | |
|--|---------------------------------------|--------------------------------|---|----------------------------------|------------------------------------|---|
| | Promote Countywide Ride-sharing | Demand Responsive | | Fixed Route | | Provide Combined Fixed Route and Demand-Responsive Services |
| | | Expand Existing OAT Program | Expand Countywide Advance Reservation Service | Connect All Community Centers | Connect Major Community Centers | |
| Forecast Annual Ridership | | | | | | |
| 1981..... | -- | 8,200- 8,600 | 10,800-15,600 | 3,600- 6,000 | 3,000-4,300 | 10,100-11,500 |
| 1986..... | -- | 10,100-11,500 | 19,200-28,800 | 7,800-11,400 | 5,800-8,600 | 14,900-18,700 |
| Average Annual..... | -- | 9,100-10,100 | 15,600-23,500 | 6,100- 9,200 | 4,500-6,800 | 12,700-15,400 |
| Annual Public Funding Requirement ^a | | | | | | |
| Total Expenditures | | | | | | |
| 1981..... | \$ 20,000 | \$ 40,900- 41,100 | \$193,400-197,700 | \$ 89,000- 91,400 | \$ 46,700- 48,000 | \$ 83,000- 84,100 |
| 1986..... | \$ 20,000 | \$ 42,200- 43,000 | \$191,900-200,500 | \$ 83,600- 87,200 | \$ 42,400- 45,200 | \$ 80,400- 83,200 |
| Five-Year Total..... | \$100,000 | \$207,700-210,500 | \$957,200-992,800 | \$428,800-444,400 | \$221,200-232,300 | \$406,400-417,700 |
| Average Annual..... | \$ 20,000 | \$ 41,500- 42,100 | \$191,400-198,600 | \$ 85,800- 88,900 | \$ 44,200- 46,500 | \$ 81,300- 83,500 |
| Average Annual per Ride..... | -- | \$4.11-4.63 | \$8.15-12.73 | \$9.33-14.57 | \$6.50-10.33 | \$5.28-6.57 |
| Local Share ^a | | | | | | |
| 1981..... | \$ 20,000 | \$ 4,100- 4,300 | \$ 96,700- 98,900 | \$ 44,500- 45,700 | \$ 23,400- 24,000 | \$ 9,400- 9,900 |
| 1986..... | \$ 20,000 | \$ 5,400- 6,200 | \$191,900-200,500 | \$ 83,600- 87,200 | \$ 42,400- 45,200 | \$ 43,200- 46,400 |
| Five-Year Total..... | \$100,000 | \$ 23,700-26,500 | \$860,500-893,900 | \$384,300-398,700 | \$197,800-208,300 | \$186,200-196,200 |
| Average Annual..... | \$ 20,000 | \$ 4,700- 5,300 | \$172,100-178,800 | \$ 76,900- 79,700 | \$ 39,600- 41,700 | \$ 37,200- 39,200 |
| Average Annual per Ride..... | -- | \$0.47-0.58 | \$7.32-11.46 | \$8.36-13.07 | \$5.82-9.27 | \$2.42-3.09 |
| Capital Project Costs ^a | | | | | | |
| Total Expenditures | | | | | | |
| Five-Year Total..... | -- | \$51,700 | \$146,000 | \$75,500 | \$49,900 | \$101,400 |
| Average Annual..... | -- | \$10,300 | \$ 29,200 | \$15,100 | \$10,000 | \$ 20,300 |
| Local Expenditures | | | | | | |
| Five-Year Total..... | -- | \$10,300 | \$ 29,200 | \$15,100 | \$10,000 | \$ 20,300 |
| Average Annual..... | -- | \$ 2,100 | \$ 5,800 | \$ 3,000 | \$ 2,000 | \$ 4,100 |
| Total Local Expenditures ^a | | | | | | |
| Five-Year Total..... | \$100,000 | \$ 34,000-36,800 | \$889,700-923,100 | \$399,400-413,800 | \$207,800-218,300 | \$206,500-216,500 |
| Average Annual..... | \$ 20,000 | \$ 6,800- 7,400 | \$177,900-184,600 | \$ 79,900- 82,700 | \$ 41,600- 43,700 | \$ 41,300- 43,300 |

^aAll costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

Source: SEMRPC.

bus service were considered to be ineffective in meeting the transportation needs of the county population and too costly for implementation. Committee interest instead focused on the effects of Subalternative 3A--expand eligibility requirements for the OAT program--on the existing OAT service, and on the countywide ride-sharing program proposed under Alternative 2. With regard to Subalternative 3A, it was noted that expansion of the user eligibility requirements for the existing OAT service would provide the general public of the County with a basic level of public transit service and should also improve both the productivity and cost-efficiency of the existing OAT service without significant increase in the current budget for the program. It was also noted that through the promotion of ride-sharing activities within the County, it might be possible to overcome deficiencies associated with the limited service provided by the OAT program through the provision of more personalized transportation services offered by carpooling and vanpooling.

RECOMMENDATION

Based upon the consideration and evaluation of the seven proposed transit service alternatives, the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County recommended that Washington County expand its current role in providing public transportation service to include the provision of a basic level of public transit service to the general public of the County. The Committee recommended that the provision of general public transit service be accomplished through the expansion of the eligibility requirements for use of the existing specialized transportation service provided by the county-sponsored Older Adult Transportation program. Furthermore, the Committee recommended that the County establish a countywide ride-sharing program to promote ride-sharing activities within the County and provide the potential for personalized transportation service to those persons unable to make use of the recommended public transit service because of service limitations attendant to the OAT program. A more detailed description of the recommended transit services and the steps required for implementation is set forth in Chapter VII.

SUMMARY

This chapter has presented alternative courses of action for meeting the current need for public transportation within Washington County. This need results from deficiencies in the current level of public transportation within the County, including the lack of an effective, cost-competitive alternative to the private automobile for travel throughout the County. There are two major reasons for examining the feasibility of correcting existing transit service deficiencies through the provision of improved public transit service. The first acknowledges a public responsibility to the captive users of public transportation who should be provided with some form of transportation capable of satisfying their basic travel needs. The second major reason recognizes the need of the general population for a viable alternative to the private automobile in light of the uncertain future regarding the cost and availability of motor fuel. Any consideration given to improving the level of transit service within the County should recognize the inability of fares to totally cover the costs of such services and the need for public financial assistance.

In order to fully evaluate the feasibility of providing improved public transit service in Washington County, a number of alternative management structures and operational techniques for transit service were examined and evaluated. The management structures examined included: 1) county contract for transit services with an existing transit operator; 2) county ownership of equipment and operation by service contract; and 3) county ownership of equipment and operation with public employees.

Of the three alternative management structures considered, the second alternative was deemed the best for institution of transit service within the five-year time horizon of the study. This management structure would allow the County to take advantage of federal funding programs providing financial assistance for capital projects, thereby reducing costs indirectly passed on by contract service providers for capital equipment purchases and depreciation of equipment. This management structure would also minimize county personnel problems which would result from the provision of transit service with public employees.

Seven transit service alternatives representing five basic courses of action were developed and evaluated during the course of the study:

1. Do nothing to encourage or support improved countywide public transit service.
2. Promote countywide ride-sharing activities.
3. Provide demand-responsive public transit service by:
 - a. expanding the eligibility requirements for use of the county-sponsored Older Adult Transportation program to include the general public.
 - b. replacing the existing Older Adult Transportation program with an expanded countywide, advance-reservation public transit service.
4. Provide fixed route public transit service by:
 - a. connecting all urban and rural community centers within the County with fixed route bus service.
 - b. connecting the major urban and rural community centers within the County with fixed route bus service.
5. Provide a combination of demand-responsive and fixed route public transit services.

The status quo alternative represents a continuation of the existing level and utilization of transit service within the County and does not attempt to address the problems and deficiencies of the existing services. The consequences of implementing the status quo alternative would include continued restriction of the mobility of transit-dependent population groups and continued reliance on the automobile as the primary mode of travel within the County.

Under Alternative 2, a countywide ride-sharing program would be established to promote ride-sharing activities within the County. The primary tasks of the proposed ride-sharing program would be the dissemination of information on available carpooling and vanpooling programs, and the provision of carpool-matching services within the County. The program would also include media promotion of ride-sharing activities, and contact with major employers to encourage carpooling and vanpooling. Assuming establishment as a separate county program, the costs entailed in establishing the proposed ride-sharing program would be approximately \$20,000 per year. However, the costs entailed in operating the program could be reduced if the program were established with existing staff or as part of a broader transportation program.

Under Alternative 3, a publicly subsidized, demand-responsive public transit service would be established within the County to serve the general population. Two levels

of demand-responsive transit service were considered under this alternative, with both levels providing service on a 24-hour, advance-reservation basis throughout the County.

The transit service proposed under Subalternative 3A was designed to provide a basic level of transit service to the general population of the County. Under this subalternative, the eligibility requirements for use of the existing Older Adult Transportation (OAT) program would be expanded to include the general public. It was assumed that the OAT transit service would continue to be provided on a contract basis by the Hartford Municipal Recreation Department to serve travel demands entirely within any of the three service areas of the program on different scheduled days and scheduled times for each service area. Complete transit service area coverage would be provided to all major generators and to 100 percent of the county population. Annual ridership would be expected to range from 8,200 to 8,600 one-way trips in 1982, and would be expected to increase by 1986, when it would range from 10,100 to 11,500 one-way trips. The local share of the annual public funding requirement would be expected to range from \$4,100 to \$4,300, or about \$0.48 to \$0.52 per ride, in 1982, assuming the use of state specialized transit assistance funds. By 1986, the local share of the public funding requirement would increase slightly, ranging from \$5,400 to \$6,200, or \$0.47 to \$0.61 per ride. This system would require the purchase of one 16-passenger minibus and one 8-passenger minibus, plus other operating equipment. The local share of the total capital project costs for this subalternative would be about \$10,300.

The transit service proposed under Subalternative 3B was designed on the principle of providing the urban and rural areas of the County presently unserved by local public transportation with a general public transit service which could be utilized to satisfy the majority of the travel demands and trip purposes experienced on a daily basis by the general population. The proposed transit service would replace the existing OAT service. The transit service would be provided using the existing OAT service areas, but would also allow travel between individual service areas and would be available in all areas Mondays through Fridays between the hours of 6:00 a.m. and 6:00 p.m. Transit service-area coverage would be identical to that proposed under Subalternative 3A. Annual ridership on the service would range from 10,800 to 15,600 one-way trips in 1982, and would be expected to increase by 1986, when it would range from 19,200 to 28,800 one-way trips. The local share of the annual public funding requirement under this subalternative would be high, ranging from \$96,700 to \$98,850, or about \$6.19 to \$9.15 per ride, in 1982, and increasing after 1982 because of the loss of federal operating assistance funds to 100 percent of the operating deficit for the proposed transit service, which by 1986 would range from \$191,900 to \$200,500, or about \$6.66 to \$10.44 per ride. The proposed transit service would require the purchase of one 16-passenger minibus and four 8-passenger minibuses--a total of five vehicles--plus other operating equipment. The local share of the total capital project costs for this subalternative would be about \$29,200.

Under Alternative 4, publicly subsidized transit service would be provided using fixed bus routes designed to connect the urban and rural community centers within the County. The transit service proposed under this alternative would primarily serve nonlocal intercommunity travel demands, although local travel on the fixed routes would not be restricted. It is also assumed that the existing OAT program, as well as other current specialized transportation programs, taxicab services, and intercity bus services within the County, would continue to be provided in addition to the proposed fixed route bus service. Two subalternatives were developed for providing this type of public transit service within the County.

Subalternative 4A was developed on the principle of providing all urban and community centers identified within the County with fixed route bus service, thereby serving

the nonlocal intercommunity and, to some degree, the local community travel demands identified in Chapter III of this report. The fixed route transit service proposed under this subalternative would consist of two lineal fixed bus routes connecting all eight urban and community centers within the County. Transit service on the two routes would be available Mondays through Fridays between the hours of 8:00 a.m. and 5:30 p.m., with three round trips per day provided between the communities served by each route. Transit service would be available to almost all major generators within the eight community centers served by the proposed transit service, and to about 41 percent of the total county population. Annual ridership on the service would range from 3,600 to 6,000 one-way trips in 1982, and from 7,800 to 11,400 one-way trips in 1986. The local share of the annual public funding requirement under this subalternative would range from \$44,500 to \$45,700, or about \$7.41 to \$12.69 per ride, in 1982, and would increase after 1982 because of the loss of federal transit operating assistance funds to 100 percent of the operating deficit for the proposed transit service, which by 1986 would range from \$83,600 to \$87,200, or about \$7.33 to \$11.18 per ride. The proposed transit service would require the purchase of three 14-passenger minibuses plus other operating equipment. The local share of the total capital project costs for this subalternative would be about \$15,100.

Subalternative 4B was developed on the principle of providing public transit service within the major travel corridors identified within the County while primarily connecting the larger or more densely developed urban community centers of Hartford and West Bend. Under this subalternative, transit service would be provided over a single fixed bus route connecting five of the eight urban and rural community centers within the County. Transit service on the single fixed route would be available between the hours of 8:00 a.m. and 5:30 p.m. Mondays through Fridays, with three round trips per day provided between the communities served by the route. Transit service would be available to almost all major generators within the five community centers served by the route, and to about 35 percent of the total county population. Annual ridership on the proposed fixed route service would range from 3,000 to 4,300 one-way trips in 1982, and would be expected to increase by 1986, when it should range from 5,800 to 8,600 one-way trips. The local share of the annual public funding requirement under this subalternative would range from \$23,350 to \$24,000, or about \$5.43 to \$8.00 per ride, in 1982, and would increase after 1982 because of the loss of federal transit operating assistance funds to 100 percent of the operating deficit for the proposed transit service, which by 1986 would range from \$42,400 to \$45,200, or about \$4.93 to \$7.79 per ride. The proposed transit service would require the purchase of two 14-passenger minibuses, plus other operating equipment. The local share of the total capital project costs for this subalternative would be about \$9,980.

Alternative 5 considers a combination of elements of the more cost-effective and productive subalternatives considered under Alternatives 3 and 4. Under this alternative, the eligibility requirements for use of the existing OAT service would be expanded to include the general public, as proposed under Subalternative 3A. In addition, a single fixed bus route, similar but less extensive than the route proposed under Subalternative 4B, would be operated between the City of Hartford and the City of West Bend to provide for travel in this corridor between the two major OAT service areas. The operating characteristics of the demand-responsive element of this alternative would be the same as those proposed under Subalternative 3A. Transit service on the single fixed route would be available Mondays through Fridays between the hours of 9:00 a.m. and 5:00 p.m., with three round trips per day provided between communities served by the route. Combined, the two transit services proposed under this subalternative would serve all major trip generators and 100 percent of the total county population. Annual ridership on the combined services would range from 10,100 to 11,500 one-way trips in 1982, and would be expected to increase by 1986, when it would range from 14,900 to 18,700 one-way trips. The local share of the annual public funding requirement under this alternative would range from \$9,410 to

\$9,870, or about \$0.82 to \$0.98 per ride, in 1982, and would increase by 1986 because of the loss of federal transit operating assistance funds to from \$43,200 to \$46,400, or about \$2.31 to \$3.11 per ride. The transit services proposed under this alternative would require the purchase of one 16-passenger minibus and one 8-passenger minibus for the demand-responsive element, and two 14-passenger minibuses for the fixed route element of the alternative--a total of four vehicles--plus other operating equipment. The local share of the total capital project costs for this alternative would be about \$20,280.

Upon review of the seven transit service alternatives, the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County recognized the high level of public transit service provided under Subalternative 3B, expand countywide advance-reservation public transit service, but rejected this alternative as too costly for implementation. Similarly, the Advisory Committee considered the transit service alternatives proposing fixed route bus services to be both ineffective in meeting the transportation needs of the total county population and too costly for implementation. The Advisory Committee thus recommended that the provision of general public transit service on a countywide basis be accomplished through the expansion of the eligibility requirements for use of the existing specialized transportation service provided by the Older Adult Transportation program to include the general public. In addition, the Advisory Committee recommended the establishment of a countywide ride-sharing program to provide that population unable to use the recommended general public transportation service with the potential for personalized transportation service.

Chapter VII

RECOMMENDED COUNTYWIDE PUBLIC TRANSPORTATION SERVICES AND COORDINATION ACTIVITIES

INTRODUCTION

In the preceding chapter, seven alternatives representing five basic courses of action available to Washington County as a response to existing deficiencies in public transit service within the County were postulated and evaluated. Based upon a review and evaluation of these alternatives, the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County recommended the provision of general public transit service on a countywide basis through the expansion of the eligibility requirements for use of the existing specialized transportation service provided by the Older Adult Transportation program to include the general public. In addition, the Advisory Committee recommended the establishment of a countywide ride-sharing program to provide those members of the population unable to use the recommended general public transportation service with the potential for personalized transportation service. The recommended plan for the provision of countywide public transportation services in Washington County developed in accordance with the Committee recommendations consists of three elements: 1) a countywide general public transit service; 2) a countywide ride-sharing program; and 3) coordinated countywide specialized transportation services. The elements of the recommended plan, along with the steps required for implementation, are described in the following sections of this chapter.

COUNTYWIDE GENERAL PUBLIC TRANSIT SERVICE

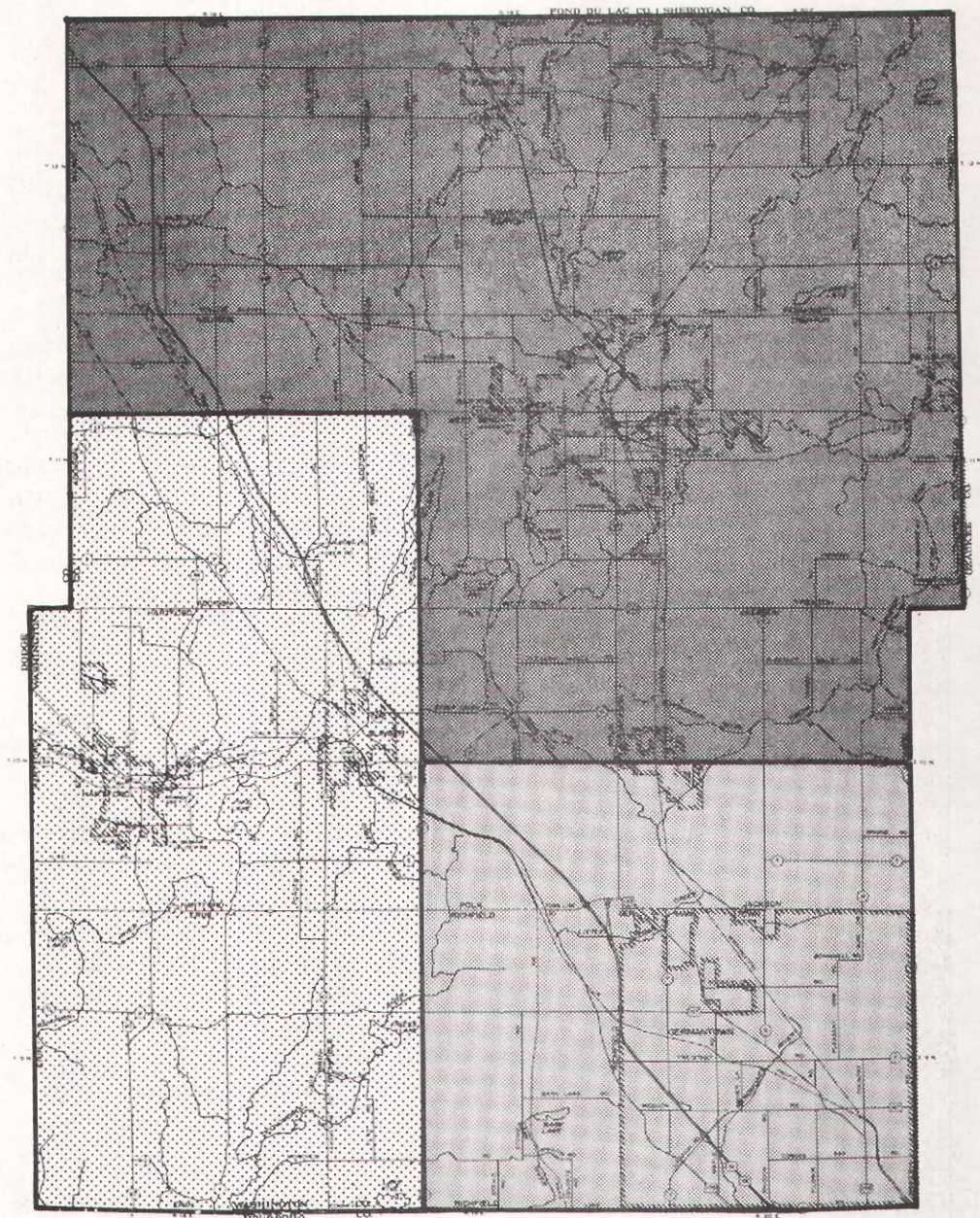
The first element of the recommended plan for the provision of public transportation services in Washington County calls for the provision of a publicly subsidized, demand-responsive transportation service to serve the general population of the County. It is recommended that, beginning in calendar year 1982, this general public transit service be provided by the Older Adult Transportation (OAT) program through the expansion of the eligibility requirements for use of its services to include the general public. As noted in Chapter VI of this report, the expansion of the eligibility for this service was made possible by statutory changes authorized by the 1981 State Budget Act. As a consequence of these changes, counties providing specialized elderly/handicapped transportation services supported by state funds are allowed to serve the general public on a space-available basis, provided that priority is still given to elderly and handicapped patrons. The recommended countywide public transit service would remain, essentially, a specialized transportation service whose primary function would be to provide transportation for the County's elderly and transportation-handicapped population, with transportation service to the general public being provided to make use of unused space on the existing service.

Operating Characteristics




It is recommended that the transportation service provided under the OAT program continue to be operated as a 24-hour, advance-reservation transit service provided to different areas of the County on different days of the week. No changes are recommended in either the existing subcounty service areas, as shown on Map 23, or the scheduled hours of service availability, as indicated in Table 35. The recommended fares for the expanded transit service are \$0.50 per one-way trip for elderly and handicapped users and \$1.00 per one-way trip for the general public, expressed in

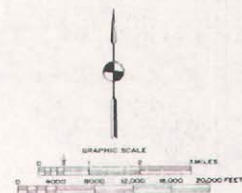
Map 23

LOCATION OF RECOMMENDED SERVICE AREAS FOR THE EXPANDED
OLDER ADULT TRANSPORTATION PROGRAM IN WASHINGTON COUNTY



LEGEND

-  West Bend Service Area
-  Germantown Service Area
-  Hartford Service Area



Source: SEWRPC.

Table 35

**SCHEDULE OF PUBLIC TRANSPORTATION SERVICE AVAILABILITY FOR
THE RECOMMENDED COUNTYWIDE PUBLIC TRANSIT SERVICE AS
PROVIDED BY THE OAT PROGRAM IN WASHINGTON COUNTY**

| Service Area | Days of Service ^a | Hours of Service |
|--------------|------------------------------|------------------------|
| West Bend | Monday..... | 8:00 a.m. - 5:00 p.m. |
| | Tuesday..... | 10:00 a.m. - 2:00 p.m. |
| | Friday | 8:00 a.m. - 5:00 p.m. |
| Hartford | Tuesday..... | 8:00 a.m. - 5:00 p.m. |
| | Thursday | 8:00 a.m. - 5:00 p.m. |
| Germantown | Monday..... | 10:00 a.m. - 2:00 p.m. |
| | Wednesday | 8:00 a.m. - 5:00 p.m. |

^aExcludes holidays.

Source: SEWRPC.

constant 1981 dollars. These fares would be the same as those presently charged to elderly and handicapped patrons and members of the general public acting as aides to elderly and handicapped users.

While accommodating the service requests of the general public, the OAT program will still be required to provide priority to the scheduling of service requests made by elderly and handicapped persons. In those instances when general public service requests cannot be scheduled because of the service requests of elderly and handicapped persons, it is recommended that the general public be notified of the rescheduling or cancellation of their service request. The recommended transit service would be made available to all potential users within each service area only for travel within individual service areas. Trips made between service areas would not be served by the transit service.

The recommended transit service provided through expansion of the existing OAT service would offer a basic level of public transportation service to the general population of the County. The transit service would provide complete service-area coverage of all residential areas within the County. Public transportation service of a limited nature would be offered to the entire resident county population, including all elderly and handicapped population concentrations and the major concentrations of zero- and one-automobile households within the County. All major trip generators would be served by the transit service. The availability of the proposed service would probably limit consideration of the service for all but essential nonwork purpose travel. However, the promotion of ride-sharing services for travel within the County should provide the general public with the potential for personalized transportation service for work purpose travel.

It is recommended that the expanded OAT service continue to be provided under the administration of the Washington County Office on Aging on a contract basis by a

public or private transportation service provider. Currently, Washington County contracts with the Hartford Municipal Recreation Department for the operation of the OAT service. As noted in Chapter IV of this report, the Hartford Municipal Recreation Department also schedules and dispatches the shared-ride taxicab service in the City of Hartford and the specialized transportation service provided by the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross. Through its involvement in all these programs, the Department is able to review requests for transportation service and schedule trip requests for the program best able to provide the needed transportation, thereby helping to coordinate the provision of both general public and specialized transportation services. In light of the coordination activities of the Hartford Municipal Recreation Department, it is recommended that the Department continue to be the contract service provider for the OAT program.

As at present, two vehicles will be required to provide the proposed transit service for the expanded OAT program, with one vehicle stationed in the City of Hartford and one vehicle stationed in the City of West Bend. It is recommended that, initially, the proposed transit service be provided utilizing vehicles supplied by the Hartford Municipal Recreation Department. The Department presently operates one 1975 16-passenger wheelchair lift-equipped minibus and one 1980 8-passenger wheelchair lift-equipped minibus, both owned by the Department, in providing the OAT service.

Ridership Projections

Because of the expanded eligibility requirements, ridership on the recommended transit service may be expected to be slightly higher than the ridership on the existing OAT service of about 600 one-way trips per month. During 1982, ridership on the expanded OAT service would be expected to range from 680 to 720 one-way trips per month, or from 8,200 to 8,600 one-way trips annually. By 1986, ridership on the proposed service would be expected to increase--ranging from 840 to 960 one-way trips per month, or from 10,100 to 11,500 one-way trips annually. This level of ridership would be slightly higher than the ridership of about 830 one-way trips per month budgeted for 1981. Vehicle hours of service would remain constant over the planning period at about 2,700 hours per year, while vehicle miles of service would be expected to increase slightly each year in response to projected ridership demand--from about 25,200 miles in 1982 to about 32,400 miles in 1986. Based on projected ridership increases, vehicle productivity should increase from about 3.0 to 3.2 passengers per hour in 1982 to about 3.7 to 4.3 passengers per hour by 1986.

Capital Projects

Implementation of the recommended transit service would require the acquisition of two vehicles to replace the vehicles currently operated by the Hartford Municipal Recreation Department in providing the OAT service. Based upon the operating problems experienced by the Department with the 8-passenger minibus in the areas of passenger comfort and convenience, it is recommended that two 16-passenger minibuses be acquired. Both vehicles should be equipped with mobile radios and wheelchair lifts to accommodate the handicapped. It is recommended that a replacement for the older vehicle currently used to provide the OAT service be acquired by 1983, and that the second vehicle be replaced at the end of the five-year planning period in 1986. It is further recommended that the County purchase the vehicles for lease back to the contract service provider. This purchase and lease arrangement would allow the County to take advantage of the federal Section 18 funding program which provides financial assistance for capital projects, and should reduce costs indirectly passed on by the contract service provider for costs it incurs for capital equipment.

purchase and depreciation.¹ In this respect, it will be important that the County take any necessary steps required to assure that the limits of primary and excess liability insurance coverage carried by the County, or by the transit operator leasing county-owned vehicles and including the County as an insured party, be established at amounts sufficient to reduce the possibility of the County incurring excessive losses through damage suits or court awards.

Capital Project and Operating Costs

The capital expenditures required for the above projects are presented in Table 36. The total capital investment required for the recommended transit service is estimated at \$55,000. Assuming public purchase of the operating equipment by the County using funds available under the federal Section 18 transit assistance program,² \$44,000, or 80 percent of the total project costs, would represent the federal share, and \$11,000, or 20 percent of the total project costs, would represent the county share. It should be noted that estimates of all capital costs are expressed in constant 1981 dollars, and represent current average industry costs. When actual design specifications for the equipment are determined, it is possible that costs will be somewhat higher or lower than estimated. It is recommended that a Section 18 capital grant application be prepared as soon as possible to expedite the purchase in 1982 of a vehicle to replace the older of the two vehicles currently used in providing the OAT service. Based upon the time required for completion of the grant process prescribed under the federal Section 18 program, and the time required for delivery of new vehicles, it is estimated that this replacement vehicle would not be available for operation until late 1982 or early 1983.

¹Because the OAT program is a county-sponsored program, Washington County has been viewed as the logical applicant for federal Section 18 funds to partially support the cost of replacement vehicles for the program. The current contract service provider for the program--the City of Hartford Municipal Recreation Department--would, as a public body, also be eligible to apply for and utilize federal Section 18 funds to purchase replacement vehicles for the program. However, should the City of Hartford utilize federal funds to purchase vehicles for use in providing the contract service for the OAT program, and then, at a later date, cease to be the contract service provider for the program, the City of Hartford could be financially responsible to the federal government for some dollar amount based upon the remaining "useful life" of the vehicles purchased.

²Currently, the 1980 8-passenger minibus is used to provide the OAT service within both the Hartford and Germantown service areas. Federal Section 18 funds are available to subsidize capital equipment purchases for projects providing transit service intended to transport passengers around rural areas, or to transport rural residents to small urban or urbanized areas. Projects providing transit service intended to transport passengers within an urbanized area or from an urbanized area to a rural area are not eligible for funding under the Section 18 program, but could be eligible under the UMTA Section 3 or Section 5 programs. Since the Village of Germantown and most of the Germantown service area for the OAT program is presently within the Milwaukee urbanized area, it is questionable whether Section 18 funds could be used to totally replace the vehicle providing service within this area. However, it may be possible to combine funds available under the above federal funding sources to provide the federal share of the costs of replacing this OAT service vehicle. As the 16-passenger minibus is used to provide transit service only within the West Bend area, and this area is not considered to be urbanized, the replacement of this vehicle should qualify as an eligible project for Section 18 funding.

Table 36

**CAPITAL PROJECTS AND EXPENDITURES REQUIRED FOR IMPLEMENTATION
OF THE RECOMMENDED COUNTYWIDE PUBLIC TRANSIT SERVICE**

| Year of Grant Application | Quantity | Capital Equipment | Unit Cost ^a | Total Cost ^a |
|---|----------|---|------------------------|-------------------------|
| 1982 | 1 | 16-Passenger Minibus Equipped with Wheelchair Lift and Mobile Radio Unit..... | \$25,000 | \$25,000 |
| 1985 | 1 | 16-Passenger Minibus Equipped with Wheelchair Lift and Mobile Radio Unit..... | 25,000 | 25,000 |
| Total Capital Investment..... | | | -- | \$50,000 |
| Contingency Fund..... | | | -- | 5,000 |
| Total | | | -- | \$55,000 |
| Federal Share (80 percent) ^b | | | -- | 44,000 |
| Local Share (20 percent) | | | -- | 11,000 |

^aConstant 1981 dollars.

^bFederal funds available under federal Section 18 transit assistance program.

Source: SEWRPC.

Total operating deficits for the recommended transit service, as expressed in constant 1981 dollars, may be expected to increase slightly over the planning period as a result of increases in vehicle miles traveled, and, consequently, in total operating costs. The operating deficit per ride would be expected to decline over the planning period, however--ranging between \$4.75 and \$5.01 per ride in 1982 and between \$3.76 and \$4.26 per ride in 1986. Assuming the use of state funds available under the state's financial aid program to counties for elderly and handicapped transportation, the county share of the public funding requirement in 1982 is anticipated range from \$4,100 to \$4,300, or about \$0.48 to \$0.52 per ride. By 1986, the county share of the public funding requirement is expected to increase slightly, ranging from \$5,400 to \$6,200, or about \$0.47 to \$0.61 per ride. In comparison, the county share of the 1981 budget for the current OAT program is \$10,000, or about \$1.00 per ride. Information on forecast ridership, operating costs, system deficits, and public subsidy requirements for the recommended transit service can be found in Table 37.

Financial Commitment

A commitment of funds to acquire the necessary operating equipment for the proposed countywide transit service and to subsidize a portion of the annual costs of its

Table 37

OPERATING CHARACTERISTICS OF THE RECOMMENDED COUNTYWIDE PUBLIC TRANSIT SERVICE

| Characteristic ^a | Year | | | | |
|---|--------------------------------|--------------------------------|--------------------------------|--------------------------------|--------------------------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Ridership Forecast Monthly..... Annual..... | 680-720 8,200-8,600 | 720-780 8,600-9,400 | 760-840 9,100-10,100 | 800-900 9,600-10,800 | 840-960 10,100-11,500 |
| Annual Vehicle Miles..... | 25,200 | 27,000 | 28,800 | 30,600 | 32,400 |
| Annual Vehicle Hours..... | 2,700 | 2,700 | 2,700 | 2,700 | 2,700 |
| Operating Cost Per Year..... Per Ride..... | \$45,900 \$5.33-5.60 | \$46,700 \$4.97-5.43 | \$47,400 \$4.69-5.21 | \$48,200 \$4.46-5.02 | \$48,900 \$4.25-4.84 |
| Revenue Per Year..... Percent of Operating Cost... | \$4,800-5,000 10.5-10.9 | \$5,000-5,500 10.7-11.8 | \$5,300-5,900 11.2-12.4 | \$5,600-6,300 11.6-13.1 | \$5,900-6,700 12.1-13.7 |
| Operating Deficit Per Year..... Per Ride..... | \$40,900-41,100 \$4.75-5.01 | \$41,200-41,700 \$4.38-4.84 | \$41,500-42,100 \$4.11-4.63 | \$41,900-42,600 \$3.88-4.44 | \$42,200-43,000 \$3.67-4.26 |
| Public Funding Requirement State..... Local..... | \$36,800 \$4,100-4,300 | \$36,800 \$4,400-4,900 | \$36,800 \$4,700-5,300 | \$36,800 \$5,100-5,800 | \$36,800 \$5,400-6,200 |
| Total | \$40,900-41,100 | \$41,200-41,700 | \$41,500-42,100 | \$41,900-42,600 | \$42,200-43,000 |
| Local Cost per Ride..... | \$0.48-0.52 | \$0.47-0.57 | \$0.47-0.58 | \$0.47-0.60 | \$0.47-0.61 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)

Elderly, handicapped..... 85
Nonelderly, nonhandicapped..... 15

2. Fare

Elderly, handicapped..... \$0.50
Nonelderly, nonhandicapped..... \$1.00
Average fare..... \$0.58

3. Service will be provided in the same areas, on the same days, and during the same hours as under the existing service provided by the Older Adult Transportation program, and will be provided on a space-available basis to the general public. Top priority for transit service will be given to serving elderly and handicapped trip requests.

4. All costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes state funding under the elderly and handicapped transportation assistance program for counties up to the expected 1982 level.

Source: SEWRPC.

operation will be required. There are two major sources of funds which could be drawn upon to reduce the local financial commitment required for the implementation and subsequent annual operation of the proposed transit system: the Wisconsin Department of Transportation and the U. S. Department of Transportation, Urban Mass Transportation Administration. It is recommended that transit assistance funds available under the various programs offered by these governmental agencies be sought to offset a portion of the capital project and annual public subsidy expenditures required for the operation of the recommended service. In particular, it is recommended that the County continue to utilize funds available under the State's financial aid program to counties for elderly and handicapped transportation to subsidize a portion of the annual operating costs of the OAT service. Continued eligibility of the expanded OAT service for these funds should be assured as long as the County utilizes the OAT service to provide public transportation to the general public on a space-available basis only, and gives priority to serving trip requests made by elderly and handicapped persons. It is also recommended that federal funds available for capital equipment purchases under the Section 18 funding program be utilized to purchase the necessary operating equipment. Equipment purchased with these funds can be used only in the operation of public transit services which are available to the general public. Consequently, the OAT service must be available for use by the general public and remain available for use by the general public as long as vehicles purchased with these funds are used to provide the service. The distribution of the estimated annual financial commitment among federal, state, and local funding sources is set forth in Table 38.

The costs shown in Table 38 are presented in constant 1981 dollars and, as such, do not account for any changes in expenditures which might occur as a result of the effects of general price inflation. While inflation may be expected to occur based upon recent trends in the economy, the unpredictable nature of this factor makes it difficult, if not impossible, to accurately predict its effects upon the costs of implementation of the recommended transit service. Inflation could be expected to most significantly affect the costs incurred in the annual operation of the transit service and, therefore, have the greatest effect on the operating deficit and subsequent local public funding requirements. Should the degree of inflation experienced in the past continue during the planning period, it is recommended that additional local funds be generated to reduce the effect of inflation on local funding requirements. One such action which could be considered would be modest increases in transit user fares over the five-year planning period. Such increases should not significantly affect the level of transit ridership.

In light of the above discussion and in recognition of the need of public officials to be kept informed for budgeting purposes of possible increases in the costs of publicly supported programs, estimates of annual operating costs, revenues, operating deficits, and public funding requirements were prepared for the recommended county-wide transit service based on the operating characteristics indicated in Table 37 but assuming an annual increase in operating costs of 10 percent due to the effects of inflation, and assuming a corresponding increase in user fares. These estimates are shown in Table 39. Based upon these assumptions and anticipated funding levels for Washington County under the State's financial aid program to counties for elderly and handicapped transportation, the level of local public funding commitment required for operation of the service during 1982 and 1983 would be expected to be significantly less than the current 1981 budget level of \$10,000, or about \$1.00 per ride. Significant increases in the local public funding requirement could be expected for the years 1984 through 1986. However, it should be noted that the increases indicated in the table are the result of the inability to predict the level of state funds available to Washington County beyond calendar year 1983. Should the State continue past trends and increase appropriations for the elderly and handicapped transportation funding program in the years succeeding 1983, the county share of the public funding requirement would be reduced accordingly.

Table 38

DISTRIBUTION OF EXPENDITURES FOR THE RECOMMENDED COUNTYWIDE
PUBLIC TRANSIT SERVICE BY FUNDING SOURCE: 1982 THROUGH 1985

| Time Element | Capital Expenditures ^a | | | Operating Expenditures ^a | | | Total Expenditures ^a | | | |
|----------------------|-----------------------------------|-------------|----------|-------------------------------------|-----------------|-------------------|---------------------------------|--------------------------|-----------------|-------------------|
| | Federal Share ^b | Local Share | Total | State Share ^c | Local Share | Total | Federal Share ^b | State Share ^c | Local Share | Total |
| Five-Year Total..... | \$44,000 | \$11,000 | \$55,000 | \$184,000 | \$23,700-26,500 | \$207,700-210,500 | \$44,000 | \$184,000 | \$34,700-37,500 | \$262,700-265,500 |
| Average Annual..... | \$ 8,800 | \$ 2,200 | \$11,000 | \$ 36,800 | \$4,700-5,300 | \$41,500-42,100 | \$ 8,800 | \$ 36,800 | \$6,900-7,500 | \$52,500-53,100 |

^aAll costs are presented in constant 1981 dollars and do not consider the possible effects of inflation.

^bAssumes 80 percent federal funding under the federal Section 18 funding program.

^cAssumes funding under the state program of financial assistance to counties for elderly and handicapped transportation.

Source: SEMRPC.

Table 39

**OPERATING COSTS, REVENUES, DEFICITS, AND PUBLIC FUNDING
REQUIREMENTS OF THE RECOMMENDED COUNTYWIDE TRANSIT SERVICE
WITH ASSUMED EFFECTS OF INFLATION**

| Characteristic ^a | Year | | | | |
|---------------------------------|-----------------|-----------------|-----------------|-----------------|-----------------|
| | 1982 | 1983 | 1984 | 1985 | 1986 |
| Operating Cost | | | | | |
| Per Year..... | \$45,900 | \$51,400 | \$57,400 | \$64,100 | \$71,600 |
| Per Ride..... | \$5.33-5.60 | \$5.46-5.98 | \$5.68-6.30 | \$5.98-6.68 | \$6.22-7.09 |
| Revenue | | | | | |
| Per Year..... | \$4,800-5,000 | \$5,000-5,500 | \$7,800-8,700 | \$8,300-9,300 | \$8,700-9,900 |
| Percent of Operating Cost... | 10.5-10.9 | 9.7-10.7 | 13.6-15.1 | 12.9-14.5 | 12.1-13.8 |
| Operating Deficit | | | | | |
| Per Year..... | \$40,900-41,100 | \$45,900-46,400 | \$48,700-49,600 | \$54,800-55,800 | \$61,700-62,900 |
| Per Ride..... | \$4.75-5.01 | \$4.88-5.40 | \$4.82-5.45 | \$5.07-5.81 | \$5.36-6.23 |
| Public Funding Requirement | | | | | |
| State..... | \$36,800 | \$42,300 | \$42,300 | \$42,300 | \$42,300 |
| Local..... | \$4,100-4,300 | \$3,600-4,100 | \$6,400-7,300 | \$12,500-13,500 | \$19,400-20,600 |
| Total | \$40,900-41,100 | \$45,900-46,400 | \$48,700-49,600 | \$54,800-55,800 | \$61,700-62,900 |
| Local Cost per Ride..... | \$0.48-0.52 | \$0.38-0.48 | \$0.63-0.80 | \$1.16-1.41 | \$1.70-2.03 |

^aThe information provided in this table is based on the following assumptions:

1. Anticipated Ridership Composition (percent)

| | |
|---------------------------------|----|
| Elderly, handicapped..... | 85 |
| Nonelderly, nonhandicapped..... | 15 |

2. Fare

| | 1982-1983 | 1984-1986 |
|---------------------------------|-----------|-----------|
| Elderly, handicapped..... | \$0.50 | \$0.75 |
| Nonelderly, nonhandicapped..... | \$1.00 | \$1.50 |
| Average fare..... | \$0.58 | \$0.86 |

3. All costs were developed based on current 1981 costs and assume an annual increase of 10 percent per year due to the effects of inflation.

^b Assumes state funding under the elderly and handicapped transportation assistance program for counties at funding levels anticipated for 1982 and 1983 based on total funds appropriated for the program in the 1981 State Budget Act, and assumes that appropriations for this program for the years 1984 through 1986 will be sufficient to fund, at a minimum, the anticipated 1983 funding level for the County.

Source: SBMRPC.

COUNTYWIDE RIDE-SHARING PROGRAM

The second element in the recommended plan for the provision of transportation services in Washington County is the promotion of countywide ride-sharing activities. One of the fundamental recommendations of the regional transportation plan is the continued promotion of ride-sharing activities. Ride-sharing in carpools or vanpools, along with improved public transit service, represents perhaps the best hedge against the rising costs of private transportation. Besides the obvious energy conservation and pollution benefits of carpooling and vanpooling, ride-sharing is important for its employment implications--that is, as a means of getting workers to and from their places of employment--and as a means for transporting social service clients as an adjunct to social service and public transportation programs. In light of the inability of the recommended countywide public transit service as provided by the OAT program to fully serve all travel in the County, including work purpose travel, the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County recommended supplementing this service through the promotion of ride-sharing activities within the County.

Recommended Ride-sharing Promotional Activities

It is recommended that the promotion of ride-sharing activities in Washington County focus on two specific areas: the dissemination of information on existing carpool and vanpool programs to county residents and employers; and the provision of carpool-matching services to potential carpoolers within the County. To perform these activities, it is recommended that Washington County cooperate with existing ride-sharing programs, wherever possible, to utilize existing resources and minimize duplication of services.

Both Milwaukee County and the Wisconsin Department of Transportation have established programs aimed at promoting ride-sharing activities. Milwaukee County presently promotes carpooling through the operation of a carpool promotion program aimed at increasing the extent of carpooling in the Milwaukee area. The program presently promotes carpooling activities through the media, contacts major employers to encourage carpooling on a firm-by-firm basis, and provides a computerized matching program for potential carpoolers. While the focus of this program has been on carpooling in Milwaukee County, the program encompasses the four-county Milwaukee area, including Washington County. The Wisconsin Department of Transportation administers a program aimed at promoting and supporting vanpool activities. A major provision of this program is the issuance of low-cost loans by the State for the acquisition of vans by employers or public agencies interested in establishing their own programs. The Milwaukee County carpool promotion program presently cooperates with the Wisconsin Department of Transportation in disseminating information on the State's vanpool program. Both programs are oriented to providing ride-sharing services for work purpose travel.

As the first step in the promotion of ride-sharing activities within the County, it is recommended that Washington County concentrate on promoting such activities for predominantly work purpose travel by contacting the Milwaukee County carpool promotion program to arrange for the dissemination of information on both carpooling and vanpooling to major employers within the County. To aid in this process, Washington County should supply the carpool promotion program with a list of the major industrial, commercial, governmental, and other employers within the County. Requests for further information on ride-sharing services would be handled directly by the appropriate program, with requests for carpooling information or matching services being handled by the Milwaukee County carpool promotion program and requests for vanpooling information by the Wisconsin Department of Transportation. This type of cooperation with existing ride-sharing programs should minimize costs and manpower

requirements on the part of the County, while still affording Washington County residents the opportunity for ride-sharing for work purpose trips made to destinations both within and outside the County.

While the above actions could be viewed as providing for a major portion of the potential ride-sharing needs of the county residents, a need for localized ride-sharing services for nonwork purpose travel would still exist within the County. To address this need it is recommended that, as a second step in the promotion of ride-sharing services within the County, Washington County establish a localized carpooling program to concentrate on the more infrequent or irregular ride-sharing needs of the county population which would not be suited to the formalized ride-sharing programs previously mentioned. This localized program would focus on weekly shopping trips, or trips for personal business or social-recreational purposes. It is recommended that the program be operated in a manner similar to the Milwaukee County carpool promotion program but on a smaller scale. In this respect, the program would be responsible for soliciting carpool-matching-service requests within the County, for matching individual carpool service requests with similar requests by geographic area, and for supplying individuals participating in the program with the names of individuals representing potential carpool matches. It would then be the responsibility of the program participant to contact the individuals supplied to him by the program to make carpooling arrangements. It would also be the responsibility of each program participant to check the limits of his personal insurance as it pertains to participation in carpooling activities. It is envisioned that the success of such a ride-sharing program will rely heavily on the ability to recruit and maintain a pool of volunteers able to provide ride-sharing services. To promote this program and aid in the recruitment of volunteers, it is recommended that the County undertake a promotional campaign which would include media advertising and announcements, bulletins and posters, and contact with various volunteer groups. Since persons most in need of the proposed ride-sharing services would probably be clients or potential clients of social service agencies, and since several social service agencies within the County currently maintain volunteer driver transportation programs, it is recommended that this ride-sharing program be coordinated with existing specialized transportation programs utilizing volunteer drivers and implemented in conjunction with the recommendations for coordination of volunteer drivers as described in a later section of this chapter.

Manpower Requirements and Administration

The initiation of the recommended ride-sharing program would require a modest work effort centered primarily upon the gathering of employer data from existing sources, and the establishment of the organization of and promotional activities for the second step of the program. Following these activities, work efforts would be centered upon the second step of the program, and would consist of the dissemination of information, continuing volunteer recruitment, and the provision of matching services for ride-sharing requests. It is envisioned that these work efforts would not be sufficient to justify the full-time attention of a county employee. Thus, rather than expanding the current county staff, it is recommended that the County review the duties of existing county personnel to determine where the duties attendant to the program can be assigned. Since a major portion of the work effort would lie in the second step of the program, and since it is recommended that this second step be coordinated with existing specialized transportation services, it is recommended that the County assign the duties associated with the operation and administration of the ride-sharing program to a county department currently providing specialized transportation services.

SPECIALIZED TRANSPORTATION COORDINATION

The third element in the recommended plan for providing transportation services in Washington County is coordinated countywide specialized transportation services. In Chapter IV of this report, five public and private social service agencies were identified as providers of specialized transportation services in Washington County with service coordination potential: The American Red Cross; the American Cancer Society; The Threshold, Inc.; the Washington County Office on Aging; and the Washington County Department of Social Services. Through these social service agencies, specialized transportation services are made available to several segments of the general population, including the elderly, the handicapped, low-income families, and those in need of medical attention. Over the past few years, both the demand for and the costs of providing specialized transportation services have increased, prompting service providers to become concerned with ways to make existing services more effective and efficient. Over the same period of time, the concept of coordination of specialized transportation services has gained wide acceptance as a means to accomplish the above goals and to improve and expand existing services.

Existing Coordination Efforts

Existing efforts toward agency coordination of the provision of specialized transportation services were identified in Chapter IV of this report. The limited coordination efforts identified were the vehicle scheduling and dispatching performed commonly for the OAT program and the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross by the Hartford Municipal Recreation Department; and the ride-sharing arrangement through which the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross shares its transportation service when possible with the American Cancer Society, the West Bend Chapter of the American Red Cross, and the Washington County Department of Social Services. In addition to these efforts, two committees have been established to investigate the potential for agency transportation coordination activities within the County.

The Washington County Interagency Transportation Coordination Council was organized in October 1977 as an informal effort by social service agencies to promote greater utilization of existing vehicles, to share information relative to funding sources and transportation coordination efforts, and to create a transportation network among private nonprofit, proprietary and public agencies. Appendix B provides a listing of the membership of this committee. Meeting monthly on an informal basis, the Council worked toward bringing about a greater awareness among member agencies of transportation issues, needs, planning, and coordination efforts. While being able to mitigate to a considerable degree the duplication of effort among member agencies, the Council determined that it did not have the time and resources necessary to thoroughly research coordination options, nor the corporate authority to implement coordination concepts. Based on these concerns, the Council made several recommendations to the Washington County Board of Supervisors, including: the creation of a county standing committee on transportation coordination to develop policy, identify needs, and oversee the coordination of specialized transportation programs in the County; the creation of a committee of providers and consumers to promote ongoing coordination and provide information and ideas to the standing committee on transportation coordination for its use in policy formation; and the hiring of a transportation coordinator to plan, develop, and monitor transportation services.

On April 13, 1980, the Washington County Board of Supervisors authorized the Washington County Committee on Aging to serve as a county standing committee on transportation coordination with the authority to appoint an advisory committee of providers and consumers. Based upon the interest expressed within the County among

agency transportation providers, the Committee on Aging requested that the transit service plan include an analysis of the potential for coordination of specialized transportation services in Washington County. The results and recommendations of this analysis are described below.

Analysis and Recommendations

An integral concept of this transit service plan was the coordination of transportation services, and thus the applicability of this concept has been examined in two areas. With regard to public transportation services, the plan examined the extent to which existing specialized transportation services could be either curtailed or eliminated through the provision of a countywide general public transit service. As previously described in this chapter, it was found that the most efficient way to provide general public transit service within the County would be to coordinate such service with specialized transportation programs, with an existing specialized transportation program recommended to actually provide general public transportation service. With regard to specialized transportation service, coordination was considered to be a potential means of improving the utilization of available resources which, in turn, could allow for an expansion of service to fill critical gaps in service.

An analysis of the existing specialized transportation services provided within the County indicates that the current services should be continued, since no significant duplication or overlap in services is evident. The analysis of the need for coordination of services in the County indicates that improvements to current services are needed more in terms of effectiveness (unmet needs) than efficiencies. In other words, the special transportation services being offered in the County make good use of available resources, but they are not able to fully meet the demand for service. Consequently, it does not appear that the coordination of existing services will increase the efficiency of those services to the extent that significant resources in the form of dollars can be saved and used to provide more service. However, the analysis does indicate that existing services might be coordinated in a limited way to improve their effectiveness and their ability to meet the current demand within the County, and to reduce costs associated with vehicle supplies. In this respect, areas of coordination which appear to have some potential for agency providers in the County include information and outreach coordination, volunteer driver coordination, and purchasing coordination. It is recommended that implementation of these coordination activities, as described below, be pursued in Washington County.

Coordinated Information and Referral Program: It is recommended that the five agency transportation providers work toward the establishment of a coordinated information and referral program. In this respect, it is recommended that the information and referral functions of the five agency providers be combined and be provided from one centralized location or office. Coordination of these functions in this manner should provide a client or prospective client who is having trouble getting transportation with a single telephone information service to call to find out which agency or agencies could provide suitable transportation. The referral given to the client would depend upon his eligibility, group residence, income, need for travel, and other factors established by the agencies themselves but communicated by the coordinated outreach office to the client. The potential client would be responsible for contacting the appropriate agency after having been referred.

As the first step in the implementation of this coordination program, it is recommended that a clearinghouse for information on transportation services be established. The clearinghouse would be responsible for maintaining an inventory of current transportation services and providing information on these services to agencies and individuals on request, as well as to the policy-making body responsible for overseeing county coordination activities. To promote coordination of both

general public and specialized transportation services, it is recommended that information on all public transit services within the County be maintained and provided on request by the clearinghouse. An inventory of transportation services has been compiled as part of this transit service plan and could be used as a starting point for implementation of this step. It is recommended that a procedure be developed for updating the inventory of services to reflect changes in the nature or extent of, or eligibility requirements for, county transportation services.

As the second step in the implementation of this coordination program, it is recommended that a marketing program be established so as to reach potential clients of all types. Without adequate public knowledge of the coordinated information effort, little use would be made of it and no benefits would be gained. It is recommended that, at a minimum, the marketing outreach program include the establishment of a centralized telephone information service which can be called to obtain information and/or referral services, and the use of a passenger information brochure on the various agency transportation services participating in the coordination effort.

As the final step in the implementation of this coordination program, it is recommended that the effects of the information and referral program be monitored to determine the success of those prospective clients receiving referrals in obtaining transportation service from the appropriate agency provider. Information so obtained should be used by the county transportation coordinating committee to gauge the success of the program and identify areas where improvement is needed.

Volunteer Driver Coordination: As noted in Chapter IV of this report, three of the five agency transportation providers within the County currently utilize volunteer drivers to provide transportation services: The American Red Cross, the American Cancer Society, and the Washington County Department of Social Services. An analysis of the services currently supplied by these agencies indicates that all providers sometimes have problems in serving client trip requests because of the lack of available volunteers to provide the service. While each agency provider attempts to recruit and maintain a supply of volunteer drivers to provide transportation services, agency transportation programs are sometimes hampered by insufficient volunteer recruitment and conflicts in the times that volunteers are available and that services are needed. In particular, the lack of adequate volunteer help has had a significant impact on the transportation services provided by the American Cancer Society, the West Bend Chapter of the American Red Cross, and the Washington County Department of Social Services. When these agencies have not been able to provide the requested transportation, they have at times relied on the transportation service provided by the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross. However, this agency has not been able to satisfy all referred service requests because of eligibility or service jurisdiction problems.

In light of this discussion, it is recommended that the above-mentioned agency transportation providers work together to coordinate available volunteer driver resources. In this respect, it is recommended that a pool of volunteer drivers be created which can be drawn upon by agency transportation providers at times when volunteer drivers recruited for their own programs are not available. Such coordination should have the net effect of providing a larger pool of volunteers for each agency, thus reducing the possibility that a particular client cannot be served because of a lack of volunteer resources.

As the first step in the implementation of this activity, it is recommended that an inventory of all volunteer drivers be conducted to create a volunteer driver pool. Whereas some agencies may feel protective of their individual lists of volunteers, it is important that any such agencies be persuaded of the value of this concept in improving the effectiveness of transportation services for their clients. Once the

volunteers from the agencies have been pooled, they can be contacted individually to determine their willingness to participate in serving more than one agency. As many volunteers are often tied to their agency by interest or other reasons, it is quite possible that these volunteers may be interested in serving only one type of client, and thus would be adverse to receiving referrals from different agencies. In such a case, it is recommended that the volunteers be restricted to serving the agency to which they are assigned.

As the second step in the implementation of this activity, it is recommended that cross-lists of volunteers willing to serve more than one agency be tabulated by client types, times available, and areas or destinations to be served. It is recommended that these cross-lists then be transmitted to the participating agencies, which will be responsible for taking the steps necessary to ensure that volunteer drivers willing to participate in the agency's program are properly trained and/or authorized for reimbursement or insurance coverage. While the requesting agency would contact the volunteer for a service request, the agency which originally placed the volunteer's name in the pool would have priority in using that volunteer to fill service requests.

As the third step in the implementation of this activity, it is recommended that a coordinated effort be made to recruit volunteers to serve these agency providers. It is recommended that this recruitment be undertaken in conjunction with the program to recruit volunteers to provide ride-sharing services to the general public, as previously discussed within the chapter.

Purchasing Coordination: Purchasing coordination is based upon the bulk purchase of parts and supplies which allows discounts and, therefore, cost savings to agencies. This concept would not be applicable to those two agency providers in the County that utilize personal vehicles with volunteer drivers--the American Cancer Society and the Washington County Department of Social Services. It is recommended that the potential to coordinate the purchase of vehicle parts and bulk supplies for the remaining three agencies be examined. It should be noted that since some of these agencies are presently purchasing supplies through local municipalities or discount parts stores, the potential cost savings for agency transportation programs may be negligible.

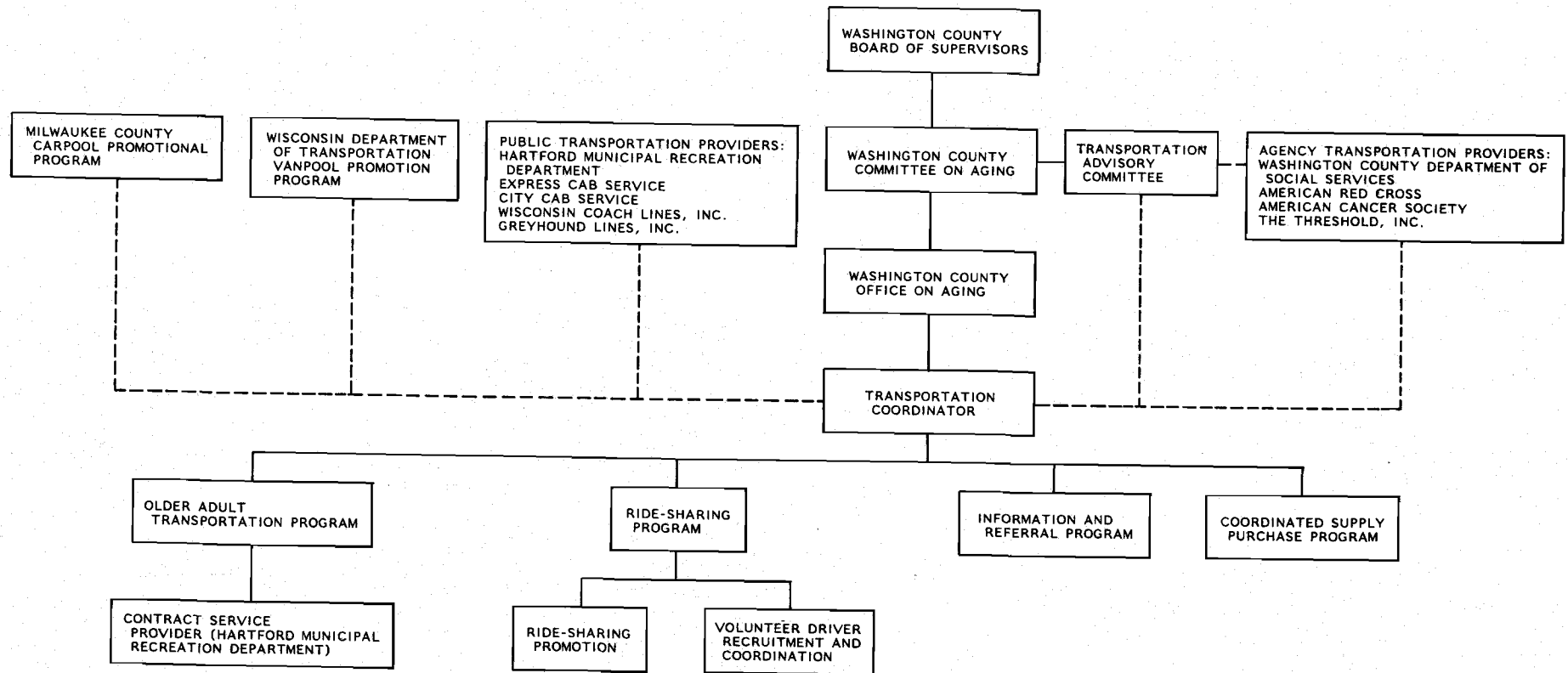
Administration of Coordination Activities

A proposed organizational structure for the administration of the recommended coordination activities is shown in Figure 2. It is recommended that the coordination activities be undertaken under the supervision and direction of a county coordinating committee. The primary purposes and functions of this committee would be to supervise and assist in the implementation of the recommended coordination activities; to help monitor the results of the implementation of the recommended coordination activities; and to recommend changes to the coordination activities as experience may dictate. Inasmuch as the Washington County Committee on Aging has been designated by the Washington County Board of Supervisors to serve as the county standing committee on transportation coordination, and in light of the committee's participation in the current study, it is recommended that the Washington County Committee on Aging continue to act as the county coordinating committee in Washington County. Inasmuch as the Washington County Office on Aging serves as staff to the Committee on Aging, it is recommended that the Office on Aging assume direct responsibility for the administration of the recommended coordination activities.

At present, membership on the Committee on Aging is limited to County Board members. In order to obtain the widest possible comment and to ensure that the recommended coordination activities can actually be implemented, additional representation should be considered for the committee, including representation from agency transportation providers, public and private transportation providers, agencies and organizations

Figure 2

ORGANIZATIONAL CHART FOR ADMINISTRATION OF RECOMMENDED COORDINATION ACTIVITIES



Source: SEWRPC.

providing financial support, and consumers of specialized transportation services. It is therefore recommended that a transportation advisory committee of providers, financial backers, and consumers be established to promote ongoing coordination as well as provide information and ideas to the Committee on Aging acting as the county coordinating committee.

The work effort to implement the recommended coordination activities should not require the full-time attention of a county employee. Rather than expanding county staff, it is recommended that the County review the duties of existing personnel to determine to whom the duties attendant to the programs can be assigned. In this respect, it will be important to identify one person to act as a part-time transportation coordinator to oversee all coordination activities and be responsible directly to the county coordinating committee.

PLAN IMPLEMENTATION

Recommendations for the provision of a countywide general public transit service, the promotion of ride-sharing activities, and the coordination of agency specialized transportation services have been described in the previous sections of this chapter. Together, these recommendations constitute a plan for the provision of countywide public transportation services in Washington County. In a practical sense, however, the plan is not complete until all steps required for implementation have been specified. Full implementation of the recommended plan will be dependent upon the coordinated action of four agencies of government: the Washington County Board of Supervisors; the Southeastern Wisconsin Regional Planning Commission; the Wisconsin Department of Transportation; and the U. S. Department of Transportation, Federal Highway Administration. These four public bodies have vital roles in providing the necessary endorsement, operations, and financial support required to achieve plan implementation. In addition to these four agencies, the cooperation of the five agency transportation providers is essential to implementation of the recommended specialized transportation coordination activities.

In addition to the steps outlined in previous sections of this chapter, implementation of the recommendations of the transit service plan will require the successful completion of following activities:

1. The submission of the recommendations of the transit service plan to the residents of Washington County for informational and public review purposes.
2. The adoption or endorsement of the recommendations of the transit service plan by the four agencies of government identified above and by the agency transportation providers that have been addressed in the recommended coordination activities.
3. The preparation of applications for state and federal funds.

Community Review and Comment

Before the recommendations of the transit service plan are implemented, it is recommended that they be presented to the general population of the County in order to obtain public reaction and comment on the proposed services. To successfully complete this step, it is recommended that a public hearing on the study recommendations be held by the County at a centralized location such as at the Washington County Courthouse. In lieu of a single public hearing, a series of public informational meetings could be held at locations in the County within the three service areas of the OAT program. Significant comments received at the public hearing or at the public

informational meetings should be reviewed for their impact upon the plan recommendations. Where justified, modifications to the plan recommendations should be made prior to their implementation.

Plan Adoption and Endorsement

The second step in the plan implementation process is the adoption or endorsement of the recommendations of the transit service plan by those public bodies or agencies that will have a role in the operation or financial support of the proposed public transportation services or coordination efforts. Adoption or endorsement of the plan recommendations by the appropriate governmental bodies helps to ensure a common understanding among governmental agencies and to enable the staffs of these agencies to program the projects and funding necessary for service implementation. Endorsement of the study recommendations by the agency transportation providers is also recommended to ensure cooperation in the coordination of agency transportation services.

The following plan adoption or endorsement actions are accordingly recommended:

1. That the Washington County Board of Supervisors formally adopt the recommendations of the transit service plan as a guide to the provision of countywide public transportation services and to the coordination of specialized transportation services within Washington County. A model resolution for adoption of the study recommendations is contained in Appendix C.
2. That the Wisconsin Department of Transportation endorse the recommendations of the transit service plan and utilize them as a guide for the programming, administration, and granting of state specialized transit assistance funds and federal Section 18 transit assistance funds for Washington County.
3. That the U. S. Department of Transportation, Federal Highway Administration, endorse the recommendations of the transit service plan as a guide for the programming, administration, and granting of federal Section 18 funds for Washington County.
4. That the Southeastern Wisconsin Regional Planning Commission endorse the recommendations of the transit service plan through the inclusion, at the request of Washington County, of recommended projects in the annual program of projects included in the transportation improvement program for the Southeastern Wisconsin Region.
5. That the five agency transportation providers identified as potential participants in the recommended coordination activities formally endorse the recommendations of the transit service plan as a guide to the coordination of agency transportation services in Washington County.

Preparation of Applications for Transit Assistance Funds

The third step in the implementation of the study recommendations is the preparation of applications for state and federal transit assistance funds for the recommended countywide public transportation service as provided by the OAT program. Specifically, applications must be prepared for state transit assistance funds available under the State's elderly and handicapped transit assistance program to support the operation of the OAT service, and for federal transit assistance funds available under the Section 18 funding program to support the purchase of replacement vehicles for the OAT program.

Before an application for state transit assistance funds can be prepared, a 1982 operating budget must be prepared for the OAT program. As no changes in the level of transit services have been recommended for the OAT service, significant changes in

current costs due to operational changes in the service should not be expected. As previously noted within this report, the state transit assistance funds available under the State's elderly and handicapped transportation assistance program are currently being utilized to support a significant portion of the operating costs of the OAT program. Consequently, applications for state funds available under this program have been prepared in the past for the OAT program. The County should, therefore, be familiar with the procedure required to complete the application. Applications for state funds available under this program for calendar year 1982 must be completed and submitted by December 1, 1981, to the Wisconsin Department of Transportation.

The Wisconsin Department of Transportation administers the federal Section 18 transit assistance program in Wisconsin for the U. S. Department of Transportation, Federal Highway Administration. Applications for Section 18 capital assistance funds must be completed and submitted to the Wisconsin Department of Transportation by December 1 of the year immediately preceding the year for which federal funds are requested. It is recommended that application for federal Section 18 funds in partial support of the costs to be incurred in replacing the older vehicle currently used in providing the OAT service be made in 1982, and that application for Section 18 funds in partial support of the costs to be incurred in replacing the second vehicle currently used in providing the OAT service be made in 1985.

SUMMARY

This chapter has set forth recommendations for the provision of countywide public transportation services in Washington County. The recommended plan for the provision of countywide public transportation services was developed in accordance with the recommendations of the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County, and consists of three elements: 1) a countywide public transportation service; 2) a countywide ride-sharing program; and 3) coordinated countywide specialized transportation services.

The first element of the recommended plan calls for the provision of a publicly subsidized, demand-responsive transportation service to serve the general population of the County. This service is recommended to be provided by the existing specialized transportation service of the Older Adult Transportation (OAT) program through the expansion of the eligibility requirements for use of this service to include the general public. Aside from expanded user eligibility, no changes in the transit service provided by the OAT program are recommended. The recommended transit service would continue to be operated as a 24-hour, advance-reservation transit service provided to three different areas of the County on different days of the week. Fares for the recommended service would be established at \$0.50 per one-way trip for elderly and handicapped users, and \$1.00 per one-way trip for the general public. While accommodating the service requests of the general public, the OAT program will still be required to provide priority to the scheduling of service requests made by elderly and handicapped persons.

It is recommended that the expanded OAT service continue to be provided under the administration of the Washington County Office on Aging on a contract basis by a public or private transportation service provider. Currently, Washington County contracts with the Hartford Municipal Recreation Department for the operation of the OAT service. In light of the current public transportation coordination activities of the Hartford Municipal Recreation Department, it is recommended that the Department

continue to be the contract service provider for the OAT program. As for the current OAT program, two vehicles will be required to provide the proposed transit service for the expanded OAT program, with one vehicle being stationed in the City of Hartford and the other vehicle being stationed in the City of West Bend. It is recommended that the proposed transit service initially be provided utilizing vehicles supplied by the Hartford Municipal Recreation Department.

The recommended transit service would provide a basic level of public transportation service to the general population of the County. Public transit service of a limited nature would be provided to the entire resident county population, serving all major trip generators and transit-dependent population concentrations identified within the County. Annual ridership on the service would be expected to range from 8,200 to 8,600 one-way trips in 1982, and would increase by 1986 to from 10,100 to 11,500 one-way trips. Total operating deficits for the transit service, as expressed in constant 1981 dollars, would be expected to increase slightly over the five-year planning period because of slight increases in the service provided, and would range from \$40,900 to \$41,100, or from about \$4.75 to \$5.01 per ride, in 1982, and from \$42,200 to \$43,000, or from about \$3.67 to \$4.26 per ride, in 1986. Accordingly, the local public funding requirement would increase slightly over the planning period, ranging from \$4,100 to \$4,300, or about \$0.48 to \$0.52 per ride, in 1982, and from \$5,400 to \$6,200, or about \$0.47 to \$0.61 per ride, in 1986. The average annual financial commitment required for operation of the proposed transit service over the five-year period would range from \$41,500 to \$42,100, of which from \$4,700 to \$5,300 would represent the average annual county cost.

Capital projects required for full implementation of the proposed transit service would include the purchase of two 16-passenger minibuses, both equipped with wheelchair lifts and mobile radio units, to replace the vehicles currently owned and operated by the Hartford Municipal Recreation Department in providing the OAT service. It is recommended that the County utilize federal Section 18 funds to purchase the replacement vehicles for lease back to the contract service provider. The total capital project costs, as expressed in constant 1981 dollars, are estimated at \$55,000, of which \$44,000, or 80 percent, would represent the federal share, and \$11,000, or 20 percent, would represent the county share. The average annual financial commitment required for capital projects over the five-year planning period would be about \$11,000, of which about \$2,200 would represent the average annual county cost.

In light of the inability of the recommended countywide public transportation service as provided by the OAT program to fully serve all travel in the County, including work purpose travel, the second element of the recommended plan calls for the promotion of countywide ride-sharing activities. The promotion of ride-sharing activities in Washington County would focus on two specific areas: the dissemination of information on existing carpool and vanpool programs to county residents and employers; and the provision of carpool-matching services to potential carpools within the County. As the first step in the promotion of ride-sharing activities within the County, Washington County would concentrate on promoting such activities for predominantly work purpose travel by contacting the Milwaukee County carpool promotion program to arrange for the dissemination of information on both carpooling and vanpooling to major employers within the County. As a second step in the promotion of ride-sharing, Washington County would establish a localized carpooling program to concentrate on the more infrequent or irregular ride-sharing needs of the county population which would not be suited to the formalized ride-sharing programs previously mentioned. This localized program would focus on weekly shopping trips and trips made for personal business or social-recreational purposes. Rather than expanding the current county staff, it is recommended that the County review the duties of existing county personnel to determine where the duties attendant to the program could be assigned.

The third element in the recommended plan is coordinated specialized transportation services. An analysis of the existing specialized transportation services provided within the County indicates that the current services should be continued, since no significant duplication or overlap in services is evident. The analysis of the need for coordination of services in the County indicates that improvements to current services are needed more in terms of effectiveness (unmet needs) than efficiencies. The analysis accordingly indicates that existing services might be coordinated in a limited way to improve their effectiveness and their ability to meet the current demand within the County, and, in turn, to reduce costs associated with vehicle supplies. In this respect, areas of coordination which appear to have some potential for agency providers in the County include information and outreach coordination, volunteer driver coordination, and purchasing coordination.

It is recommended that the above coordination activities be undertaken under the supervision and direction of a county coordinating committee. Inasmuch as the Washington County Committee on Aging has been designated by the Washington County Board of Supervisors to serve as the county standing committee on transportation coordination, and in light of the Committee's participation in the current study, it is recommended that the Washington County Committee on Aging continue to act as the county coordinating committee in Washington County. It is recommended that the Washington County Office on Aging, serving as staff to the Committee on Aging, directly assume responsibility for the administration of the recommended coordination activities. In addition, since the current committee membership is limited to County Board members, it is recommended that a transportation advisory committee of providers, financial backers, and consumers be established to promote ongoing coordination as well as provide information and ideas to the Committee on Aging acting as the county coordinating committee. Finally, it is recommended that the County review the duties of existing personnel and identify one person to act as a part-time transportation coordinator to oversee all recommended coordination activities and be responsible directly to the county coordinating committee.

There are three basic steps involved in the implementation of the recommendations of the transit service plan. The first step requires Washington County to seek community comment on the study recommendations. It is recommended that the County schedule a public hearing or a series of public informational meetings to fulfill this step. Significant comments received by the public should be reviewed for their impact upon study recommendations.

The second step required for implementation of the recommended system is the adoption or endorsement of the transit development program by the public bodies and agencies providing operational or financial support. It is recommended that the Washington County Board of Supervisors adopt the recommendations of the transit service plan as a guide to the provision of countywide general public transportation service, and to the coordination of specialized transportation services in the County. It is recommended that the Wisconsin Department of Transportation endorse the recommendations of the transit service plan as a guide for the programming, administration, and granting of state specialized transit assistance funds and federal Section 18 transit assistance funds for Washington County. It is recommended that the U. S. Department of Transportation, Federal Highway Administration, endorse the recommendations of the transit service plan as a guide for the programming, administration, and granting of Section 18 transit assistance funds for Washington County. It is recommended that the Southeastern Wisconsin Regional Planning Commission endorse the recommendations of the transit service plan through the inclusion, at the request of Washington County, of recommended projects in the annual program of projects contained within the transportation improvement program for the Southeastern Wisconsin Region. Finally, it is recommended that the five agency transportation providers identified as potential

participants in the recommended coordination activities endorse the recommendations of the transit service plan as a guide to the coordination of agency transportation services in Washington County.

The third step required for implementation of the recommendations of the transit service plan is the preparation of applications for transit financial assistance for the recommended countywide general public transportation service as provided by the OAT program. Washington County must prepare an operating budget for calendar year 1982 and, based upon this budget, prepare and submit an application for state elderly and handicapped transit assistance funds to the Wisconsin Department of Transportation by December 1, 1981. It is recommended that federal Section 18 funds be applied for in support of the costs that will be incurred in replacing vehicles currently operated by the Hartford Municipal Recreation Department in providing the OAT service. Federal Section 18 funds to replace the older vehicle currently used in providing the OAT service should be applied for by 1982, and Section 18 funds to replace the second vehicle currently used in providing the OAT service should be applied for by 1985. Applications for federal Section 18 transit assistance funds in support of these projects must be submitted to the Wisconsin Department of Transportation by December 1 of the year immediately preceding the year for which funds are requested, or by December 1, 1981, and December 1, 1984 for the above two projects, respectively.

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Chapter VIII

SUMMARY

INTRODUCTION

In response to the passage of the Surface Transportation Act of 1978, which provides federal aid for operating and capital assistance projects for public transportation in rural and small urban areas, and the publication of a memorandum by the Wisconsin Department of Transportation and the Wisconsin Department of Health and Social Services which recommended that specialized transportation services being provided to subgroups of the population be coordinated, the Washington County Committee on Aging formally requested the Regional Planning Commission to undertake a study to determine the feasibility of providing general public transit service in Washington County. Of interest to the Committee was the possibility of reducing the need for specialized transportation services by providing a general public transportation service not aimed at any specific subgroup of the general population. The Commission, working closely with the Advisory Committee, developed the recommendations for providing public transportation service in Washington County presented in this report.

This public transit service plan was intended to provide a sound basis for addressing three significant transit-related public policy questions. The first question is: Is improved public transit service warranted in Washington County? If the answer is yes, then 1) should the County provide it?; and 2) in what form should it be provided? Thus, the transit service plan was also intended to provide guidance for addressing such issues as the ownership, management, service level, fares, and operating policies of public transit service in Washington County and to support applications for available transit capital and operating assistance funds from state and federal sources. Finally, the study examined the extent to which existing specialized transportation services could be incorporated into or supplanted with a general public transportation service in the County.

The recommendations of the transit service plan are based upon a careful analysis of the need for public transit service within Washington County, of the existing level of public transit service within the County, and of the existing and probable future demand for travel in the County, and upon the identification and evaluation of alternative courses of action which could be taken in order to meet the identified need. The recommendations for public transit service resulting from this analysis were directed toward the provision of a basic level of public transportation service to the general county population in the most cost-efficient manner. This chapter briefly summarizes the salient findings and recommendations of the plan and of the planning process used in its preparation.

The recommendations of the transit service plan for Washington County presented in this report are consistent with the adopted year 2000 transportation plan which recommends that some form of tertiary public transit service be provided to the low-density urban residential areas of southern Washington County. In addition, the Washington County transit service plan is consistent with the recommendations of the regional transportation plan for the transportation handicapped, which recommends the provision of demand-responsive specialized transportation services for the transportation handicapped in the nonurbanized areas of the Region and the coordination of such specialized transportation services. Finally, the Washington County transit service plan has been developed in conformance with transit development objectives and standards originally prepared and adopted by the Regional Planning Commission for

use in regional public transit planning efforts as adopted and modified by the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County.

CHARACTERISTICS OF THE SERVICE AREA

The study area considered in this report is Washington County. Located in the northwest portion of the Southeastern Wisconsin Planning Region, Washington County has a total land area of 436 square miles. Twenty-two general-purpose units of government exist within the County. In 1980, the total resident population of the County, as determined by the U. S. Bureau of the Census, was about 84,800 persons. Of this total, nearly 45,800, or about 54 percent, resided within the eight incorporated cities and villages located within the County.

Historically, major centers of urban development within the County, such as the City of West Bend, were located along major transportation routes and along rivers where power for early industrial and commercial activities could be supplied, with urban growth occurring in a concentric pattern outward from the historic focus of urban activity. With the increased use of the private automobile for transportation after World War II, particularly between 1950 and 1970, much new residential development occurred that was not related to the economic base of Washington County itself but instead to that of the Milwaukee urbanized area. More recent urban growth within the County, such as that experienced by the Towns of Richfield and Erin, has occurred in a more diffused pattern of development referred to as "urban sprawl," emanating outward from the more densely developed areas of Milwaukee and Waukesha Counties. However, despite recent rapid urbanization, over 90 percent of the total land area of Washington County is still in agricultural or other open, rural land uses.

Six segments of the resident population were identified as requiring special attention in any transit planning effort because, historically, members of these groups have had less accessibility to the automobile and, consequently, have had to rely more heavily on public transportation for mobility. These groups include the elderly, the handicapped, low-income families, racial and ethnic minorities, students, and households with lower than average automobile availability. Since detailed data on these groups from the 1980 U. S. Census will not be available until late 1981 at the earliest, and since the cost of conducting special surveys on these groups would have been prohibitive to the study, the 1970 U. S. Census was the primary data source used for the study. Whenever possible, the 1970 census information was supplemented with more current information. In 1970, low-income families comprised about 4 percent of the total resident county population; low-income families, about 1 percent; minorities, less than 1 percent; and students, about 11 percent. Based upon data gathered as part of the Commission's 1972 inventory of travel, about 7 percent of the households in Washington County did not have an automobile available for use, with an additional 36 percent of the households within the County having only one automobile available for use. Concentrations of these zero- and one-automobile households were located in the Cities of Hartford and West Bend and the Villages of Jackson, Kewaskum, and Slinger. Based on 1975 estimates of the total resident population and using secondary source materials, about 4 percent of the population of Washington County is transportation handicapped. Countywide estimates of the 1980 elderly population prepared by the Wisconsin Department of Administration indicate that about 10,600 individuals, or about 12 percent of the total 1980 resident county population, are 60 years of age or older. In addition to the transit-dependant subgroups of the population, the major trip generators in the study area--including employment centers, shopping centers, educational institutions, public institutions, medical facilities, and certain recreational areas--were identified for consideration in the development of public transit service because they have the potential to attract a

relatively large number of transit trips. Concentrations of special population groups and a majority of the major traffic generators identified within the County were found to be located within or contiguous to the major community centers of Hartford and West Bend.

The total person travel characteristics compiled by the Regional Planning Commission for 1980 indicated that approximately 213,600 person trips originated within Washington County on an average weekday, and that about 180,700, or 85 percent, were made within the County. The City of West Bend attracted the highest proportion of trips made internal to Washington County, while external to the County the greatest attractors of trips were the Menomonee Falls area of Waukesha County and the entirety of Milwaukee County. Home-based work trips to destinations inside Washington County accounted for approximately 77 percent of the total work trips that originated within the County. Significant portions of these home-based work trips were made to the Cities of West Bend and Hartford. The greatest attractor of home-based shopping trips within the County was the City of West Bend, with 13,200 trips. Trip destinations for home-based other trips within the County were concentrated in zones containing medical facilities, business offices, and social-recreational sites. Approximately 92 percent of the total school-based trips originating within Washington County were made within the County. Most of these trips were destined for the middle and senior high school located within the County.

TRANSIT SERVICE

Although it currently lacks a public transit system which can serve the entire county population, Washington County is not without some transit service. Existing transit services provided within Washington County consist of specialized transportation services to certain population groups, local taxicab services, and intercity bus service. Specialized transportation is provided as both fixed and nonfixed route, special carrier service to students, the elderly, handicapped individuals, and low-income persons residing within the County. Local taxicab services and intercity bus service are the only public transportation services available to the general public.

Specifically, fixed route, special carrier bus service is provided to more than 18,000 students per day by the 10 school districts having jurisdiction within Washington County, and to about 180 individuals per day by The Threshold, Inc. Nonfixed route, special carrier transportation services are provided by several public and private social service agencies, including the Washington County Office on Aging, which administers the Older Adult Transportation (OAT) program through which demand-responsive transportation service is provided to about 130 elderly and handicapped persons per month throughout the County; the American Red Cross, which provides transportation service through two local chapters to about 20 persons per month for medical and other essential purpose trips; the American Cancer Society, which provides transportation service to cancer patients for trips to and from area hospitals for radiation and chemotherapy treatments; and the Washington County Department of Social Services, which provides transportation services to about 10 persons per month who are members of low-income households and in need of transportation for medical and other essential purpose trips.

Local taxicab service is provided in two Washington County communities: the City of Hartford and the City of West Bend. In the City of Hartford, publicly subsidized shared-ride taxi service is provided by the Hartford Municipal Recreation Department and is used by the city residents to make about 1,200 one-way trips per month. In the City of West Bend, exclusive-ride taxicab service is provided without public subsidy by two private companies, which together are used by residents of the City to make more than 1,400 one-way trips per month. Interregional bus service is provided by two

private intercity bus companies having stops within the County--Greyhound Lines, Inc., and Wisconsin Coach Lines, Inc.--which provide limited daily bus service to communities both within and outside the County. A special survey conducted by the Commission on these bus routes indicated that no trips were made entirely within the County using the intercity bus service.

Several deficiencies were noted in the current level of public transit service provided within the County. Specialized transportation services to priority population groups provide some degree of mobility to these groups, but often restrict the level and extent of usage through advance-reservation requirements or service-area limitations. While taxicab and intercity bus services do provide a significant portion of the general public in the County with local and long-distance transportation services, not all communities within the County are served by these services. Local taxicab services, while providing local transportation to residents of the City of Hartford and the City of West Bend, charge additional fares for long-distance service to other areas of the County, which can result in high travel costs and discourage consideration of the taxi mode as a public transportation alternative for this type of travel within the County. Intercity bus service, while serving longer trips at a reasonable cost to the user, can be inconvenient and time-consuming to use because of the lack of a common stop or transfer point for the two routes within the County, and the limited amount of service offered in the County and long intervals between scheduled trips.

Existing efforts toward agency coordination of specialized transportation services include the vehicle scheduling and dispatching performed commonly for the OAT program and the Kettle Moraine Region of the Greater Milwaukee Chapter of the American Red Cross by the City of Hartford Municipal Recreation Department; and the ride-sharing efforts involving the American Red Cross, the American Cancer Society, and the Washington County Department of Social Services. At the present time, the maintenance of the vehicles utilized by the agency transportation providers is not coordinated, and such coordination would not appear to be applicable.

LEGISLATIVE REVIEW

Pertinent legislation and regulations existing at the federal, state, and local levels were identified as they apply to the provision of financial assistance for general and specialized transportation service, and as they apply to transit organization and operation. The federal government is a major source of financial assistance for general and specialized public transit services through the four major programs relevant to Washington County. The Urban Mass Transportation Administration administers several programs made available under the Urban Mass Transportation Act of 1964, as amended. Financial assistance for urban transit systems is available under Section 3 primarily for capital purchase projects and rapid transit system construction costs, and under Section 5 on a formula grant basis to urbanized areas for use toward operating assistance or capital equipment purchases. Assistance under these two programs is available on an 80 percent federal-20 percent local matching basis for capital projects, and on a 50 percent federal-50 percent local basis for operating assistance projects. Financial assistance under Section 8 is available to cover up to 80 percent of the costs of technical studies. Section 16 provides financial assistance for the purchase of vehicles and equipment to private nonprofit agencies or corporations that provide specialized transportation to elderly and handicapped individuals on the same local matching basis as Section 3 and 5 capital grants. The Federal Highway Administration administers the Section 18 program, which represents the primary source of federal funds available to Washington County for rural transportation. The Section 18 program provides operating and capital assistance for rural public transit projects on the same local matching basis as the

Section 3 and 5 grant programs. Section 18 funds have also been made available by the Federal Highway Administration through the Wisconsin Department of Transportation for technical planning studies, including this transit service plan.

Federal financial assistance is also available for specialized transportation under three programs which provide human services. Title XX of the Social Security Act of 1935, as amended, provides financial assistance for services designed to aid low-income individuals. Title I of the Federal Rehabilitation Act of 1973 authorizes federal assistance for programs designed to restore and develop skills and work habits needed by handicapped persons to obtain jobs in the competitive market. Title III of the Older Americans Act of 1965, as amended, authorizes federal assistance for programs designed to foster the development of services for older persons to enable them to live with maximum independence in the home of their choice. All three programs allow the use of financial assistance to support specialized transportation services which aid in attaining other program goals. Numerous regulations must be met before an application for funds under these federal programs can be approved.

The Wisconsin Statutes provide several programs for financing transportation services. The Wisconsin Department of Transportation administers programs providing financial assistance for both general and specialized transportation, including: an urban transit operating assistance program authorized under Section 85.20 of the Wisconsin Statutes; a specialized transportation assistance program authorized under Section 85.21 of the Wisconsin Statutes which provides financial assistance to counties for elderly and handicapped transportation projects; a specialized transportation assistance program authorized under Section 85.22 of the Wisconsin Statutes to administer the UMTA 16(b)(2) program within the State and provide supplemental state funds for the program; and a program for distributing UMTA Section 18 funds to applicants within the State authorized under Section 85.23 of the Wisconsin Statutes. The Wisconsin Department of Health and Social Services administers a program under the state Grants-In-Aid Program which provides for financial assistance for human service projects which can include transportation.

The Wisconsin Statutes also provide several organizational alternatives to municipalities and counties for the operation of public transit services. For municipalities, these alternatives include: contract for services with a private operator; public ownership and operation as a municipal utility; and public ownership and operation by a single municipal or joint municipal transit commission. For counties, these alternatives include: county contract for services with a private operator; county ownership and operation of an existing or new county department; and county ownership and operation through a single county or joint county transit commission.

The Wisconsin Statutes provide for the regulation of common motor carriers by the Wisconsin Transportation Commission except those operators receiving state urban transit operating assistance funds. The Wisconsin Department of Transportation regulates those operators exempted from regulation by the Wisconsin Transportation Commission.

Local legislation in Washington County pertaining to transit service is limited to similar municipal ordinances in the City of Hartford and the City of West Bend. While the taxicab ordinance for the City of Hartford is relatively unrestrictive regarding the method of taxicab operation, the taxicab ordinance for the City of West Bend restricts taxicab operators to providing exclusive-ride service to patrons unless permission is given by the first patron served to share the vehicle with other patrons having noncommon destinations.

ALTERNATIVE PUBLIC TRANSIT SERVICES

Based upon the inventory of the study area, two major reasons were found for examining the feasibility of improving transit service within the County. The first acknowledges a public responsibility to the captive users of public transportation who should be provided with some form of transportation capable of satisfying their basic travel needs. The second major reason recognizes the need of the general population for a viable alternative to the private automobile in light of the uncertain future regarding the cost and availability of motor fuel. Any consideration given to improving the level of transit service within the County should in addition recognize the inability of fares to totally cover the costs of such services and, therefore, the need for financial assistance from the public sector.

In order to fully evaluate the feasibility of providing improved public transit service in Washington County, a number of alternative management structures and operational techniques for transit service were examined and evaluated. The management structures examined included: 1) county contract for transit services with an existing transit operator; 2) county ownership of equipment and operation by service contract; and 3) county ownership of equipment and operation with public employees. Of the three alternative management structures considered, the second alternative was deemed the best for the institution of transit service within the five-year time horizon of the study.

Seven transit service alternatives representing five basic courses of action were developed and evaluated during the course of the study:

1. Do nothing to encourage or support improved countywide public transit service.
2. Promote countywide ride-sharing activities.
3. Provide demand-responsive public transit service by:
 - a. expanding the eligibility requirements for use of the county-sponsored Older Adult Transportation program to include the general public.
 - b. replacing the existing Older Adult Transportation program with an expanded countywide, advance-reservation public transit service.
4. Provide fixed route public transit service by:
 - a. connecting all urban and rural community centers within the County with fixed route bus service.
 - b. connecting the major urban and rural community centers within the County with fixed route bus service.
5. Provide a combination of demand-responsive and fixed route public transit services.

Alternative 1--Status Quo

The status quo alternative represents a continuation of the present level and utilization of transit service within the County, and does not attempt to address the problems and deficiencies of the existing services. The consequences of implementing the status quo alternative would include continued restriction of the mobility of transit-dependent population groups and continued reliance on the automobile as the primary mode of travel within the County.

Alternative 2 -- Ride-Sharing

Under Alternative 2, a countywide ride-sharing program would be established to promote ride-sharing activities within the County. The primary tasks of the proposed ride-sharing program would be the dissemination of information on available carpooling and vanpooling programs, and the provision of carpool-matching services within the County. The program would also include media promotion of ride-sharing activities, and contact with major employers to encourage carpooling and vanpooling. Assuming establishment as a separate county program, the costs entailed in establishing the proposed ride-sharing program would be approximately \$20,000 per year. However, the costs entailed in operating the program could be reduced if the program were established with existing staff or as part of a broader transportation program.

Alternative 3--Demand-Responsive Public Transit Service

Under Alternative 3, a publicly subsidized, demand-responsive public transit service would be established within the County to serve the general population. Two subalternatives representing different levels of demand-responsive transit service were considered under this alternative, with both levels providing service on a 24-hour, advance-reservation basis throughout the County.

The transit service proposed under Subalternative 3A was designed to provide a basic level of transit service to the general population of the County. Under this subalternative, the eligibility requirements for use of the existing Older Adult Transportation program would be expanded to include the general public. It was assumed that the OAT transit service would continue to be provided on a contract basis by the Hartford Municipal Recreation Department to serve travel demands entirely within any of the three service areas of the program on different scheduled days and scheduled times for each service area. Fares for the proposed transit service would be established at \$0.50 per one-way trip for elderly or handicapped persons and \$1.00 per one-way trip for the general public. Transit service coverage would be provided by this service to all major generators and to 100 percent of the county population. Annual ridership would be expected to range from 8,200 to 8,600 one-way trips in 1982, and would be expected to increase by 1986, when it would range from 10,100 to 11,500 one-way trips.

The total operating deficits for this service would be expected to increase slightly over the planning period, ranging from \$40,900 to \$41,100, or about \$4.75 to \$5.01 per ride, in 1982, and from \$42,200 to \$43,000, or about \$3.67 to \$4.26 per ride, in 1986. The local share of the annual public funding requirement would be expected to range from \$4,100 to \$4,300, or about \$0.48 to \$0.52 per ride, in 1982, assuming the use of state specialized transit assistance funds. By 1986, the local share of the public funding requirement would increase slightly, ranging from \$5,400 to \$6,200, or \$0.47 to \$0.61 per ride. The total average annual financial commitment required for operation of the service over the five-year planning period would range from about \$41,500 to \$42,100. The average annual county share of this amount would range from about \$4,700 to \$5,300.

This service would require the purchase of one 16-passenger minibus and one 8-passenger minibus, plus additional operating equipment. The total capital project cost for this service would be about \$51,700, of which \$41,400, or 80 percent, would represent the federal share, and \$10,300, or 20 percent, would represent the local share. The average annual financial commitment required for capital projects would be about \$10,300, of which about \$2,100 would represent the average annual county share.

The transit service proposed under Subalternative 3B was designed on the principle of providing the urban and rural areas of the County presently unserved by local public transportation with a general public transit service which could be utilized to

satisfy the majority of the travel demands and trip purposes experienced on a daily basis by the general population. The proposed transit service would replace the existing OAT service. The transit service would be provided using the existing OAT service areas, but would also allow travel between individual service areas and would be available in all areas Mondays through Fridays between the hours of 6:00 a.m. and 6:00 p.m. Fares for the proposed transit service would be established at \$0.50 per one-way trip for elderly or handicapped persons and \$1.50 per one-way trip for the general public. Transit service-area coverage would be identical to that proposed under Subalternative 3A. Annual ridership on the service would range from 10,800 to 15,600 one-way trips in 1982, and would be expected to increase by 1986, when it should range from 19,200 to 28,000 one-way trips.

Total operating deficits for the proposed transit service would be high, and would be expected to remain at about the same level over the planning period--ranging from \$193,400 to \$197,700, or about \$12.39 to \$18.30 per ride, in 1982, and from \$191,900 to \$200,500, or about \$6.66 to \$10.44 per ride, in 1986. Assuming the use of Section 18 transit operating assistance funds in 1982--the only year in which Section 18 transit operating assistance funds will be available during the planning period--the County's share of the public funding requirement is expected to range from \$96,700 to \$98,850, or about \$6.19 to \$9.15 per ride. Because of the loss of federal transit operating assistance funds anticipated after 1982, the County would assume financial responsibility for the total operating deficit for the proposed service after that year. The total average annual financial commitment required for operation of this service over the five-year planning period would range from \$191,400 to \$198,600. The average annual county share of this amount would range from \$172,100 to \$178,800.

This system would require the purchase of one 16-passenger minibus and four 8-passenger minibuses, plus additional operating equipment. The total capital project cost for this system would be about \$146,000, of which about \$116,800, or 80 percent, would represent the federal share, and about \$29,200, or 20 percent, would represent the local share. The average annual financial commitment required for capital projects would be about \$29,200, of which about \$5,800 would represent the average annual county share.

Alternative 4--Fixed Route Public Transit Service

Under Alternative 4, publicly subsidized transit service would be provided using fixed bus routes designed to connect the urban and rural community centers within the County. The transit service proposed under this alternative would primarily serve nonlocal intercommunity travel demands, although local travel on the fixed routes would not be restricted. It is also assumed that the existing OAT program, as well as other current specialized transportation programs, taxicab services, and intercity bus services within the County, would continue to be provided in addition to the proposed fixed route bus service. Two subalternatives were developed for providing this type of public transit service within the County.

Subalternative 4A was developed on the principle of providing all urban and rural community centers identified within the County with fixed route bus service, thereby serving the nonlocal intercommunity and, to some degree, the local community travel demands identified in Chapter III of this report. The fixed route transit service proposed under this subalternative would consist of two lineal fixed bus routes connecting all eight urban and rural community centers within the County. Transit service on the two routes would be available Mondays through Fridays between the hours of 8:00 a.m. and 5:30 p.m., with three round trips per day provided between the communities served by each route. Fares for the proposed transit service would vary with the length of the trip, with elderly or handicapped patrons and the general public charged \$0.50 and \$1.00, respectively, per one-way trip for short-distance trips, and \$0.75 and \$1.50, respectively, per one-way trip for long-distance trips.

Transit service would be available to almost all major generators within the eight community centers served by the proposed transit service, and to about 41 percent of the total county population. Annual ridership on the proposed fixed route service would range from 3,600 to 6,000 one-way trips in 1982, and would be expected to increase by 1986, when it should range from 7,800 to 11,400 one-way trips.

Total operating deficits under the proposed system would decrease over the planning period with the growth of transit ridership, ranging from \$89,000 to \$91,400, or about \$14.13 to \$25.38 per ride, in 1982, and from \$83,600 to \$87,200, or about \$7.33 to \$11.18 per ride, in 1986. Assuming the use of federal Section 18 transit operating assistance funds, the local share of the annual public funding requirement under this subalternative would range from \$44,500 to \$45,700, or about \$7.41 to \$12.69 per ride, in 1982. Because of the loss of federal transit operating assistance funds anticipated after 1982, the County would assume financial responsibility for the total operating deficit for the proposed service after that year. The total average annual financial commitment required for operation of the proposed transit service over the five-year planning period would range from \$85,800 to \$88,900. The average annual county share of this amount would range from \$76,900 to \$79,700.

The proposed transit service would require the purchase of three 14-passenger minibuses, plus additional operating equipment. The total capital project costs for this subalternative would be about \$75,500, of which about \$60,400, or 80 percent, would represent the federal share, and about \$15,100, or 20 percent, would represent the local share. The average annual financial commitment required for capital projects would be about \$15,100, of which about \$3,000 would represent the average annual county share.

Subalternative 4B was developed on the principle of providing public transit service within the major travel corridors identified within the County while primarily connecting the larger or more densely developed urban community centers of Hartford and West Bend. Under this subalternative, transit service would be provided over a single fixed bus route connecting five of the eight urban and rural community centers within the County. Transit service on the single fixed route would be available between the hours of 8:00 a.m. and 5:30 p.m. Mondays through Fridays, with three round trips per day provided between the communities served by the route. As noted for Subalternative 4A, fares for the proposed transit service would vary with the distance traveled, with elderly or handicapped persons and the general public charged \$0.50 and \$1.00, respectively, per one-way trip for short-distance trips, and \$0.75 and \$1.50, respectively, per one-way trip for long-distance trips. Transit service would be available to almost all major generators within the five community centers served by the route and to about 35 percent of the total county population. Annual ridership on the proposed fixed route service would range from 3,000 to 4,300 one-way trips in 1982, and would be expected to increase by 1986, when it should range from 5,800 to 8,600 one-way trips.

As under Subalternative 4A, total operating deficits for the transit service proposed under Subalternative 4B would decrease with the growth of ridership over the planning period, ranging from \$46,700 to \$48,000, or about \$10.86 to \$16.00 per ride, in 1982, and from \$42,200 to \$45,200, or about \$4.93 to \$7.79 per ride, in 1986. Assuming the use of federal Section 18 transit operating assistance funds, the local share of the public funding requirement would range from \$23,350 to \$24,000, or about \$5.43 to \$8.00 per ride, in 1982. Because of the loss of federal transit operating assistance funds anticipated after 1982, the County would assume financial responsibility for the total operating deficit for the proposed service after that year. The total average annual financial commitment required for operation of the proposed transit service over the five-year planning period would range from \$44,200 to \$46,500. The average annual county share of this amount would range from \$39,600 to \$41,700.

The proposed transit service would require the purchase of two 14-passenger minibuses, plus additional operating equipment. The total capital project costs for this subalternative would be about \$49,900, of which about \$39,900, or 80 percent, would represent the federal share, and \$10,000, or 20 percent, would represent the local share. The average annual financial commitment required for capital projects would be about \$10,000, of which about \$2,000 would represent the county share.

Alternative 5 --Provide Combination of Fixed Route and Demand-Responsive Public Transit Service

Alternative 5 considers a combination of elements of the more cost-effective and productive subalternatives considered under Alternatives 3 and 4. Under this alternative, the eligibility requirements for use of the existing OAT service would be expanded to include the general public, as proposed under Subalternative 3A. In addition, a single fixed bus route, similar but less extensive than the route proposed under Subalternative 4B, would be operated between the City of Hartford and the City of West Bend to provide for travel in this corridor between the two major OAT service areas. The operating characteristics of the demand-responsive element of this alternative would be the same as those proposed under Subalternative 3A. Transit service on the single fixed route would be available Mondays through Fridays between the hours of 9:00 a.m. to 5:00 p.m., with three round trips per day provided between communities served by the route. Combined, the two transit services proposed under this subalternative would serve all major trip generators and 100 percent of the county population. Annual ridership on the combined services would range from 10,100 to 11,500 one-way trips in 1982, and would be expected to increase by 1986, when it would range from 14,900 to 18,700 one-way trips.

Total operating deficits for the transit service proposed under this alternative would be expected to remain at about the same level over the planning period, ranging from \$83,000 to \$84,100, or about \$7.21 to \$8.33 per ride, in 1982, and decreasing to from \$80,400 to \$83,200, or about \$4.28 to \$5.58 per ride, by 1986. Assuming the use of federal Section 18 transit operating assistance funds the local share of the public funding requirement would range from \$9,410 to \$9,870, or about \$0.82 to \$0.98 per ride, in 1982. As a result of the anticipated loss of federal transit operating assistance funds after 1982, the local share of the public funding requirement would increase substantially by 1986, ranging from \$43,200 to \$46,400, or about \$2.31 to \$3.11 per ride. The total average annual financial commitment required for operation of the proposed transit service would range from \$81,300 to \$83,500. The average annual county share of this amount would range from \$37,200 to \$39,200.

The transit service proposed under this alternative would require the purchase of one 16-passenger minibus and one 8-passenger minibus for the demand-responsive element, and two 14-passenger minibuses for the fixed route element--a total of four vehicles--plus other operating equipment. The total capital project costs for this alternative would be about \$101,400, of which about \$81,100, or 80 percent, would represent the federal share, and about \$20,300, or 20 percent, would represent the local share. The average annual financial commitment required for capital projects would be about \$20,300, of which about \$4,100 would represent the average annual county share.

Evaluation of Alternatives

Upon review of the five transit service alternatives, the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County recognized the high level of public transit service provided under Subalternative 3B, expand countywide advance-reservation public transit service, but rejected this alternative as too costly for implementation. Similarly, the Advisory Committee considered the transit service alternatives proposing fixed route bus services to be both ineffective in meeting the transportation needs of the total county population

and too costly for implementation. The Advisory Committee thus recommended that the provision of general public transit service on a countywide basis be accomplished through the expansion of the eligibility requirements for use of the existing specialized transportation service provided by the Older Adult Transportation program to include the general public. In addition, the Advisory Committee recommended the establishment of a countywide ride-sharing program to provide those members of the population unable to use the recommended general public transportation service with the potential for personalized transportation service. Below is a more detailed description of the recommended plan for providing countywide public transportation service in Washington County, and the steps required for implementation.

THE RECOMMENDED PLAN

The recommended plan for the provision of countywide public transportation services was developed in accordance with the recommendations of the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County, and consists of three elements: 1) a countywide public transportation service; 2) a countywide ride-sharing program; and 3) coordinated countywide specialized transportation services.

Countywide General Public Transportation Service

The first element of the recommended plan calls for the provision of a publicly subsidized, demand-responsive transportation service to serve the general population of the County. This service is recommended to be provided by the existing specialized transportation service of the Older Adult Transportation program through the expansion of the eligibility requirements for use of this service to include the general public. Aside from expanded user eligibility, no changes in the transit service currently provided by the OAT program are recommended. The recommended transit service would continue to be operated as a 24-hour, advance-reservation transit service provided to three different areas of the County on different days of the week. Fares for the recommended transit service would be established at \$0.50 per one-way trip for elderly and handicapped users, and \$1.00 per one-way trip for the general public. While accommodating the service requests of the general public, the OAT program would still be required to give priority to elderly and handicapped trip requests.

The proposed countywide public transportation service as provided by the expanded OAT service would continue to be provided under the administration of the Washington County Office on Aging on a contract basis by a public or private transportation service provider. Currently, Washington County contracts with the Hartford Municipal Recreation Department for the operation of the OAT service. In light of the current public transportation coordination activities of the Hartford Municipal Recreation Department, it is recommended that the Department continue to be the contract service provider for the OAT program. As under the current OAT program, two vehicles will be required to provide the proposed transit service under the expanded OAT program, with one vehicle being stationed in the City of Hartford and one vehicle being stationed in the City of West Bend. It is recommended that the proposed transit service initially be provided utilizing vehicles supplied by the Hartford Municipal Recreation Department.

The recommended transit service would provide a basic level of public transportation service to the general population of the County. Public transit service of a limited nature would be provided to the entire resident county population, serving all major trip generators and transit-dependent population concentrations identified within the County. Annual ridership on the service would be expected to range from 8,200 to 8,600 one-way trips in 1982, and would increase by 1986 to from 10,100 to 11,500

one-way trips. Total operating deficits for the transit service, as expressed in constant 1981 dollars, would be expected to increase slightly over the five-year planning period because of slight increases in the service provided, and would range from \$40,900 to \$41,100, or from about \$4.75 to \$5.01 per ride, in 1982, and from \$42,200 to \$43,000, or from about \$3.67 to \$4.26 per ride, in 1986. Accordingly, the local public funding requirement would increase slightly over the planning period, ranging from \$4,100 to \$4,300, or about \$0.48 to \$0.52 per ride, in 1982, and from \$5,400 to \$6,200, or about \$0.47 to \$0.61 per ride, in 1986. The average annual financial commitment required for operation of the proposed transit service over the five-year period would range from \$41,500 to \$42,100, of which from \$4,700 to \$5,300 would represent the average annual county cost.

Capital projects required for full implementation of the proposed transit service would include the purchase of two 16-passenger minibuses, both equipped with wheelchair lifts and mobile radio units, to replace the vehicles currently owned by the Hartford Municipal Recreation Department and used to provide the OAT service. It is recommended that the County utilize federal Section 18 funds to purchase the replacement vehicles for lease back to the contract service provider. The total capital project costs, as expressed in constant 1981 dollars, are estimated at \$55,000, of which \$44,000, or 80 percent, would represent the federal share, and \$11,000, or 20 percent, would represent the county share. The average annual financial commitment required for capital projects over the five-year planning period would be about \$11,000, of which about \$2,200 would represent the average annual county cost.

It should be noted that the above costs are presented in terms of constant 1981 dollars, and, as such, do not account for any changes in expenditures which might occur as a result of general price inflation. Inflation could be expected to most significantly affect the costs incurred in the annual operation of the transit service and, therefore, have the greatest effect on the operating deficit and subsequent local public funding requirements. Should the degree of inflation experienced in the past continue during the planning period, it is recommended that additional local funds be generated to reduce the effect of inflation on local funding requirements. One such action which could be considered would be modest increases in transit user fares over the five-year planning period.

A commitment of funds to acquire the necessary operating equipment for the proposed countywide transit service and to subsidize a portion of the annual costs of its operation will be required. It is recommended that transit assistance funds available under the various programs offered by governmental agencies be sought to offset a portion of the capital project and annual public subsidy expenditures required for the operation of the recommended countywide public transit service. In particular, it is recommended that the County continue to utilize funds available under the State's financial aid program to counties for elderly and handicapped transportation to subsidize a portion of the annual operating costs of the OAT service. It is also recommended that federal funds available for capital equipment purchases under the Section 18 funding program be utilized to purchase the operating equipment necessary to implement the recommended countywide public transit service.

Countywide Ride-Sharing Activities

In light of the inability of the recommended countywide public transportation service as provided by the OAT program to fully serve all travel in the County, including work purpose travel, the second element of the recommended plan calls for the promotion of countywide ride-sharing activities. Ride-sharing activities in Washington County would be promoted through the dissemination of information on existing carpool and vanpool programs to county residents and employers; and the provision of carpool-matching services to potential carpoolers within the County.

To perform these activities, Washington County would cooperate with existing ride-sharing programs, wherever possible, to utilize resources available through existing programs and minimize the duplication of services. As the first step in the promotion of ride-sharing activities within the County, Washington County would concentrate on promoting ride-sharing activities for predominantly work purpose travel by contacting the Milwaukee County carpool promotion program to arrange for the dissemination of information on both carpooling and vanpooling to major employers within the County. Requests for further information on ride-sharing services would then be handled directly by the appropriate program, with requests for carpooling information or matching services being handled by the Milwaukee County carpool promotion program and requests for vanpooling information being handled by the Wisconsin Department of Transportation. As a second step in the promotion of ride-sharing services, Washington County would establish a localized carpooling program to concentrate on the more infrequent or irregular ride-sharing needs of the county population which would not be suited to the formalized ride-sharing programs previously mentioned. This localized program would focus on weekly shopping trips or trips made for personal business and social-recreational purposes. This carpooling program should be coordinated with existing specialized transportation programs utilizing volunteer drivers and implemented in conjunction with the recommendations for coordination of volunteer drivers. Rather than expanding the current county staff, it is recommended that the County review the duties of existing county personnel to determine where the duties attendant to the program could be assigned.

Specialized Transportation Coordination

The third element in the recommended plan is coordinated specialized transportation services. An analysis of the existing specialized transportation services provided within the County indicates that the current services should be continued, since no significant duplication or overlap in services is evident. The analysis of the need for coordination of services in the County indicates that improvements to current services are needed more in terms of effectiveness (unmet needs) than efficiencies. The analysis accordingly indicates that existing services might be coordinated in a limited way to improve their effectiveness and their ability to meet the current demand within the County, and, in turn, to reduce costs associated with vehicle supplies. In this respect, areas of coordination which appear to have some potential for agency providers in the County include information and outreach coordination, volunteer driver coordination, and purchasing coordination.

It is recommended that the above coordination activities be undertaken under the supervision and direction of a county coordinating committee. Inasmuch as the Washington County Committee on Aging has been designated by the Washington County Board of Supervisors to serve as the county standing committee on transportation coordination, and in light of the Committee's participation in the current study, it is recommended that the Washington County Committee on Aging continue to act as the county coordinating committee in Washington County. It is recommended that the Washington County Office on Aging, serving as staff to the Committee on Aging, directly assume responsibility for the administration of the recommended coordination activities. In addition, since the current committee membership is limited to County Board members, it is recommended that a transportation advisory committee of providers, financial backers, and consumers be established to promote ongoing coordination as well as provide information and ideas to the Committee on Aging acting as the county coordinating committee. Finally, it is recommended that the County review the duties of existing personnel and identify one person to act as a part-time transportation coordinator to oversee all recommended coordination activities and be responsible directly to the county coordinating committee.

Implementation

There are three basic steps involved in the implementation of the recommendations of the transit service plan. The first step requires Washington County to seek community comment on the study recommendations. It is recommended that the County schedule a public hearing or a series of public informational meetings to fulfill this step. Significant comments received by the public should be reviewed for their impact upon study recommendations.

The second step required for implementation of the recommended system is the adoption or endorsement of the transit development program by the public bodies and agencies providing operational or financial support. It is recommended that the Washington County Board of Supervisors adopt the recommendations of the transit service plan as a guide to the provision of countywide general public transportation service, and to the coordination of specialized transportation services in the County. It is recommended that the Wisconsin Department of Transportation endorse the recommendations of the transit service plan as a guide for the programming, administration, and granting of state specialized transit assistance funds and federal Section 18 transit assistance funds for Washington County. It is recommended that the U. S. Department of Transportation, Federal Highway Administration, endorse the recommendations of the transit service plan as a guide for the programming, administration, and granting of Section 18 transit assistance funds for Washington County. It is recommended that the Southeastern Wisconsin Regional Planning Commission endorse the recommendations of the transit service plan through the inclusion, at the request of Washington County, of recommended projects in the annual program of projects contained within the transportation improvement program for the Southeastern Wisconsin Region. Finally, it is recommended that the agency transportation providers identified as potential participants in the recommended coordination activities endorse the recommendations of the transit service plan as a guide to the coordination of agency transportation services in Washington County.

The third step required for implementation of the recommendations of the transit service plan is the preparation of applications for transit financial assistance for the recommended countywide general public transportation service as provided by the OAT program. Washington County must prepare an operating budget for calendar year 1982 and, based upon this budget, prepare and submit an application for state elderly and handicapped transit assistance funds to the Wisconsin Department of Transportation by December 1, 1981. It is recommended that federal Section 18 funds be applied for in support of the costs that will be incurred in replacing vehicles currently owned by the Hartford Municipal Recreation Department and used to provide the OAT service. Federal Section 18 funds to replace the older vehicle currently used in providing the OAT service should be applied for by 1982, and Section 18 funds to replace the second vehicle currently used in providing the OAT service should be applied for by 1985. Applications for federal Section 18 transit assistance funds in support of these projects must be submitted to the Wisconsin Department of Transportation by December 1 of the year immediately preceding the year for which funds are requested, or by December 1, 1981, and December 1, 1984, for the above two projects, respectively.

CONCLUSION

This transit service plan has been conducted to address questions concerning the feasibility of providing countywide public transit services in predominately rural Washington County. The analysis of public transit options for Washington County has indicated that to fully serve the travel demands of the total resident population of the County, a substantial commitment of county financial resources for the provision

of new and expansive public transit services would be required. Rather than initiate new services, the County has chosen to concentrate the appropriate resources and capabilities on current areas of need--namely, the improvement and coordination of existing county public transportation service. Implementation of the recommendations of the transit service plan would provide county residents with a basic level of public transit service while assuring a more effective use of public resources in providing public transportation in the County.

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APPENDICES

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Appendix A

INTERGOVERNMENTAL COORDINATING AND ADVISORY COMMITTEE ON PUBLIC TRANSPORTATION IN WASHINGTON COUNTY

| | |
|-----------------------------|-------------------------------------|
| George H. Frank..... | Supervisor, Washington County |
| Chairman | |
| Reuben J. Schmahl..... | Chairman, Washington County Board |
| Vice-Chairman | of Supervisors |
| Ronald R. Bast..... | Manager, Riteway Bus Service |
| Helen B. Bunke..... | Supervisor, Washington County |
| John German..... | Supervisor, Washington County |
| William A. Heimlich..... | Planning Supervisor, Wisconsin |
| | Department of Transportation |
| Fern L. Hembel..... | Supervisor, Washington County |
| Dr. Russell L. Moberly..... | Member, Washington County Advisory |
| | Council on Aging |
| Linda M. Olson..... | Director, Washington County Office |
| | on Aging |
| Carolyn A. Pipke..... | Director, Hartford Municipal |
| | Recreation Department |
| Helen A. Ramon..... | Planner/ Program Developer, |
| | Southeastern Wisconsin Area Agency |
| | on Aging |
| Clarence M. Roskopf..... | Supervisor, Washington County |
| Frank B. Sharrer..... | Highway Commissioner, Washington |
| | County Highway Department |
| Carolyn J. Speirs..... | Coordinator, Kettle Moraine Region, |
| | Greater Milwaukee Chapter of the |
| | American Red Cross |
| Joseph B. Stafford..... | Chief, Region Support, Wisconsin |
| | Department of Health and Social |
| | Services |
| Stephen Walla..... | Owner, West Bend Taxi Service |

Mr. Albert A. Beck, Senior Planner, SEWRPC, although not a member of the Committee, served as its secretary.

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Appendix B

WASHINGTON COUNTY INTERAGENCY TRANSPORTATION COORDINATION COUNCIL

| | |
|------------------------------------|---|
| Carolyn J. Speirs..... Chairman | Coordinator, Kettle Moraine Region, Greater Milwaukee Chapter of the American Red Cross |
| Dolores S. Hippe..... Secretary | Volunteer Coordinator, Washington County Department of Social Services |
| Karen Bougniet..... | Supervisor, Washington County Department of Social Services |
| Lillian Fischer, R. N..... | Service Chairperson, American Cancer Society, Washington County Unit |
| William A. Heimlich..... | Planning Supervisor, Wisconsin Department of Transportation |
| Judith C. Hoag..... | Transportation Programmer, Hartford Municipal Recreation Department |
| Mary Lehn..... | Elderly Benefit Specialist, Washington County Office on Aging |
| Linda M. Olson..... | Director, Washington County Office on Aging |
| Helen A. Ramon..... | Planner/Program Developer, South- eastern Wisconsin Area Agency on Aging |
| Jackelyn Wicklund..... | Executive Director, West Bend Chapter of the American Red Cross |
| Marvin J. Wolf..... | Maintenance and Transportation Supervisor, The Threshold, Inc. |

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Appendix C

A SUGGESTED MODEL RESOLUTION FOR ADOPTION OF THE PUBLIC TRANSPORTATION SERVICE PLAN FOR WASHINGTON COUNTY

WHEREAS, the Washington County Board of Supervisors on May 13, 1980, did authorize the Washington County Committee on Aging to serve as a county standing committee on transportation coordination to provide leadership among public and private agency transportation providers concerning coordination of specialized transportation programs; and

WHEREAS, the Washington County Committee on Aging did determine it would be beneficial to Washington County to conduct a study which would examine the extent to which the institution of a countywide general public transit service could reduce the need for specialized transportation services, and also explore means to better coordinate existing specialized transportation services being provided within the County; and

WHEREAS, the Washington County Committee on Aging, as authorized by the Washington County Board of Supervisors, did formally request the Southeastern Wisconsin Regional Planning Commission on December 16, 1980, to aid and assist in said study; and

WHEREAS, an Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County was established in June 1981, including representatives of the Washington County Committee on Aging and social service agencies and state and local units of government providing public transportation services or financial support for such services in Washington County, to advise and assist in the conduct of the desired transit feasibility and specialized transportation coordination study; and

WHEREAS, under the guidance of the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County, all planning work required to accomplish the study has been completed, resulting in the publication of SEWRPC Community Assistance Planning Report No. 61, A Public Transportation Service Plan for Washington County, dated October 1981; and

WHEREAS, the recommendations contained in said report concerning countywide public transportation service, countywide ride-sharing promotion actions, and agency specialized transportation coordination activities have been unanimously endorsed by the Intergovernmental Coordinating and Advisory Committee on Public Transportation in Washington County on October 12, 1981.

NOW, THEREFORE, BE IT RESOLVED that the Washington County Board of Supervisors, on the ____ day of ____, 1981, hereby adopts the recommendations of the transit feasibility study for Washington County, as set forth in SEWRPC Community Assistance Planning Report No. 61, as a guide to the provision and coordination of public transportation services in Washington County.

BE IT FURTHER RESOLVED, that the County Clerk transmit a certified copy of this resolution to the Southeastern Wisconsin Regional Planning Commission and the Secretary of the Wisconsin Department of Transportation.

Chairman, Washington County
Board of Supervisors

ATTESTATION:

Washington County Clerk