

# Strategic Issue: Transportation



## Trends Impacting Transportation

There are 761,954 passenger cars registered in St. Louis County - more than one car for every

adult County resident.

Over 84% of County commuters drive alone to work. This does not account for the many residents of other counties who work in St. Louis County. Nationwide, 73% of workers drive to work alone.

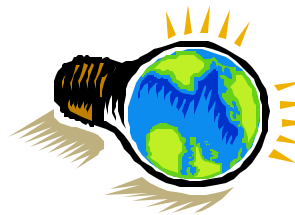
Congestion on interstate highways is increasing. For example, daily traffic on Interstate 64 at Mason Road has grown from 92,520 in 1991 to 134,584 in 1997, an increase of 50%.

St. Louis County is served by sixty-two Bi-State Development Agency bus routes. MetroLink, the St. Louis metropolitan area's light rail system, presently carries over 40,000 riders each weekday. Design work is in progress to extend MetroLink to Clayton and

Shrewsbury, which will increase ridership by an estimated 23,000 boardings per day.

Lambert-St. Louis Airport is the eighth busiest airport in North America, with over 1,400 arrivals and departures each day. The FAA has approved a major expansion of Lambert, including an additional runway and new terminal. Spirit of St. Louis Airport is home to over 500 aircrafts, including 100 corporate jets.

The greater St. Louis vicinity has been defined as a "non-attainment area" for ozone.

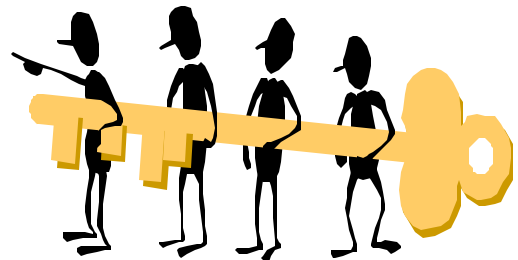


## Perspectives on Transportation

Traffic congestion was one of the top ten concerns identified by County officials. Nearly 60% of the residents surveyed in the telephone opinion poll cited "inadequate highway system for morning and evening commutes" as a serious problem.

## Key Themes from Transportation

- ' Growing traffic congestion and the increasing complexity of travel patterns in St. Louis County suggest that there should be more transportation alternatives to automobile travel, such as additional bus and light rail routes, bicycle paths and sidewalks.
- ' The capacity of the roadway infrastructure may be insufficient to accommodate the ever changing demands of a highly mobile population.
- ' As more employment centers have arisen in St. Louis County, there is a growing need for creative solutions to the problems of cross-county commuting during peak hours of travel. Air quality is negatively affected by slow moving vehicles on congested roadways.
- ' Funding and maintaining the large, aging, and complex system of roads and other transportation



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# Introduction

The St. Louis County Strategic Plan 2000-2004 will serve as the County's strategic road map for the next five years. This planning process will update the past strategic plan, as well as function as a framework for decision-making and specific action steps well past the next five years.

This background paper is meant to help facilitate a discussion about the topic of transportation. Transportation is one of four critical issues that were identified through the strategic planning process as the top issues on which the County will concentrate during the next several years. The other critical issues, each of which have their own task force, include: Reinvesting in Older Areas, the County's Role in the St. Louis Region, and Services to Unincorporated County.

## Key Transportation Themes

- ' Mobility--the ease with which individuals move about
- ' Accessibility and land use
- ' Mass transit
- ' Multi-modal facilities (bicycle facilities, sidewalks, bus and light rail)
- ' Safety and Congestion
- ' Infrastructure Capacity and maintenance

The list is not meant to be exhaustive. Rather, the six key themes were established through the strategic planning process. From these themes and this report will come specific goals and objectives for the County's strategic plan. Each goal and objective will be tied to the appropriate County department,

departmental budgets, work time and staff.

The background paper is divided into five sections.  
**! Section 1: Background Data and Trends** provides a background data and a summary of the trends in transportation.

**! Section 2: Indicators of the Need For Transportation** is a summary of the feedback received from St. Louis County residents, County government employees, elected officials and department directors, businesses, and other key stakeholders.

**! Section 3: The County's Involvement in Transportation** provides an overview of St. Louis County's role and other organizations that deal with transportation issues within St. Louis County and the St. Louis region.

**! Section 4: Best Practices From Around The Country** provides examples of best practices around the country.

**! Section 5: Defining St. Louis County's Role in Transportation** outlines possible ways in which St. Louis County could be strategic in addressing transportation issues.

# Background Data and Trends

The issue of transportation is truly a regional issue as roadways and transportation infrastructure cross all boundaries. The St. Louis County Department of Highways and Traffic is just one of the many entities that deal with transportation related issues on a day to day basis. St. Louis County's transportation network is served by a multitude of local governments and agencies. Its more than 4,800 miles of roads include interstate and state highways, county arterial roads, and local roads.

As the largest county in the region in terms of population, jobs, and travel demand, St. Louis County has an important role in making sure that residents of St. Louis County and the region can move about freely, whether it be on a County arterial road, a state highway or a local road. Citizens of St. Louis County cannot always distinguish if they are on a County arterial road or a state road, or if a park-and-ride lot is under the County's jurisdiction or another. What residents are aware of are the frequent delays caused by traffic congestion and the limited availability of mass transit.

Through the strategic planning process, the different input sources identified six major themes within transportation. For the purpose of the strategic plan, the plan will focus on the following key themes:

- ! **Mobility**
- ! **Accessibility**
- ! **Mass transit**
- ! **Multi-modal facilities**
- ! **Safety and congestion**
- ! **Infrastructure capacity and maintenance**

## Mobility

Mobility refers to the ease with which individuals move about. When people complain about traffic congestion or that they do not have access to mass transit, they are really unhappy with their lack of mobility. Various data sources, such as the

availability of transportation services, automobile ownership rates, accident reports, and the ratio of traffic volume to capacity on streets, allow us to evaluate the quality of mobility within St. Louis County.

A 1997 Mobility Plan for St. Louis County assessed existing and future mobility conditions. The report identified ten residential areas and thirteen business activity centers representing a variety of demographic groups and locations. All ten residential areas were in St. Louis County. Of the thirteen business activity centers, nine were in the County and the remaining four (Washington University Campus, Washington University Medical Center and Forest Park, Downtown St. Louis and St. Louis University) were in the City of St. Louis. These areas were used to calculate different mobility indicators. The following is a summary of the report's findings:

### ! Highway System

- , Topography has played a key role in shaping the major road system. In particular, this limits options for cross-county travel and places a substantial emphasis on the role of I-270 and, to some extent, I-170.
- , Over capacity conditions are widespread throughout the system. The poorest conditions occur in the freeway corridors, including the major arterial streets that access freeway interchanges and operate in parallel.
- , Peak-hour traffic conditions indicate the need for road widening in many areas west of I-170. There is an increasing number of segments with daily traffic volumes in excess of 40,000 vehicles (i.e., need six-lane roads).
- , The County highway system (arterial and county road elements) extends throughout St. Louis County. Because of topography and the multiplicity of jurisdictions, the configuration of the system is complicated. There are many discontinuities and gaps. In some areas, there appears to be duplication in the system.

- , By the year 2015, the share of work trips from other counties into St. Louis County will increase from the current share of 27% to 32%.
- , While St. Louis County will still be the biggest trip generator by a large margin, it is estimated that, in the future, the largest increase in intercounty commuting will come from St. Charles County. Linkages between St. Louis County and St. Louis City will stay about the same in volume.

- , Some thirty organizations and municipalities provide some type of paratransit service in the St. Louis County area. Among the larger providers of service are Care Cab Transportation Services and OATS, Inc. The characteristics of these service providers vary greatly. Based on national experience relative to trip demand based on population, there is evidence that St. Louis is underserved by paratransit services.

## ! Transit System

- , Transit plays a relatively small role in the number of daily trips in St. Louis County. Daily trip-making is over 3.6 million person trips, whereas the Bi-State Transit system is used for only 100,000 trips.
- , The St. Louis County fixed-route/fixed-schedule transit system still reflects the historical configuration in which the St. Louis central business district is the dominant destination. Travel demands have changed substantially to the point where this transit service configuration is not effective for many St. Louis County trips.
- , The Call-A-Ride system of Bi-State is currently over-capacity during some hours. The social service agencies appear to be under-serving regional demand by 10% or more.
- , Transit service is most accessible along the eastern edge of the County because of the proximity to the stronger network of routes in the City of St. Louis. However, areas to the west have significantly lower accessibility or coverage.
- , Many employees have spread-out work or personal trip schedules which do not coincide with fixed-route/fixed-scheduled transit schedules.
- , In the future, continued growth outside of St. Louis County will change the trip lengths and the directions of the trips.
- , Over the past few years, the needs of three new markets have grown. These include: 1) workers need for access to jobs in St. Louis County, 2) mobility-impaired individuals' need for specialized paratransit, and 3) the general public's need for flexible services in lower-density areas.

Traffic congestion and safety, the availability of mass transit, and the availability of transportation for elderly and the disabled are all issues related to mobility. Again, these issues cross municipal boundaries and, in cases relating to public transportation, fall under the responsibility of Bi-State. Many private and not-for-profit operators also provide transportation services to specific clients. Examples of programs designed to increase mobility are provided in the next section.

## Accessibility

Accessibility is directly related to land use. It is defined by transportation planners as "the connection by which certain locations can be reached from all other locations, as measured in time, distance, and market area." The issue of accessibility is an example of how land use policies are directly related to and affect transportation.

In St. Louis County, like many parts of the country, development patterns of the past few decades have created communities that are increasingly auto-dominated. Land uses are segregated, trip distances are greater; roadways are wider and faster. The direct result is less accessibility for non-motorized users. If an elderly resident is lucky enough to live near a grocery store, can she/he safely and comfortably walk across the street to get there? Can children ride their bikes to school? Can MetroLink riders walk on continuous sidewalk systems or ride on bicycle facilities that lead to each station? These and other non-motorized accessibility issues need to be addressed as an integral part of transportation design, for it is most often the decisions made to accommodate motorized traffic that limit

access for other modes of transportation.

MetroLink station westward to Clayton and south to Shrewsbury.

## Mass Transit

Bi-State Development Agency (Bi-State) operates the regional transit system (St. Louis City, St. Louis County, Madison County and St. Clair<sup>1</sup>) which consist of 595 buses, 31 light rail vehicles and 64 Call-A-Ride paratransit vans. The bus system is designed and operated by Bi-State, while the MetroLink System is planned by East-West Gateway Coordinating Council but constructed and operated by Bi-State.

### ! Bus System

St. Louis County is served by 39 local and 23 express bus routes. The overall regional system has a total average weekday ridership of 110,000 to 115,000 people over 77 local routes and 36 express routes.

### ! MetroLink

Of the 44,000 average weekday riders on MetroLink, 40% are St. Louis County residents. Because of the location of MetroLink, many County residents board at stations within St. Louis City. According to Bi-State ridership counts, the North Hanley Station, the most popular St. Louis County station, accounts for a total of 7% of all MetroLink boardings. The table to the right lists MetroLink boarding and ridership by station and combines the results to show the percentage of riders who board in Illinois, St. Louis City and St. Louis County.

The Cross-County Extension of MetroLink is still in the design stage. A decision by the East-West Gateway Board of Directors on the alignment of phase one was made on June 30, 1999. The new extension is expected to cost \$404 million; \$410 million can be paid with existing tax revenues. It is anticipated that this light rail expansion will be funded entirely with local funds generated by the one-quarter cent Proposition M sales tax which is levied in St. Louis City and County. An estimated 21,500 or more additional people per day will ride the new extension. The Cross-County route will extend from the existing Forest Park

## MetroLink Ridership By Sub-Areas

	Illinois	City of St. Louis	St. Louis County	Total
Westbound	6,4593 2%	12,323 60%	1,6628 38%	20,444 100%
Eastbound	780.42 9%	11,416 62%	7,0123 9%	28,506 100%
Total	6,5371 6%	23,739 58%	8,6742 1%	38,950 *100%

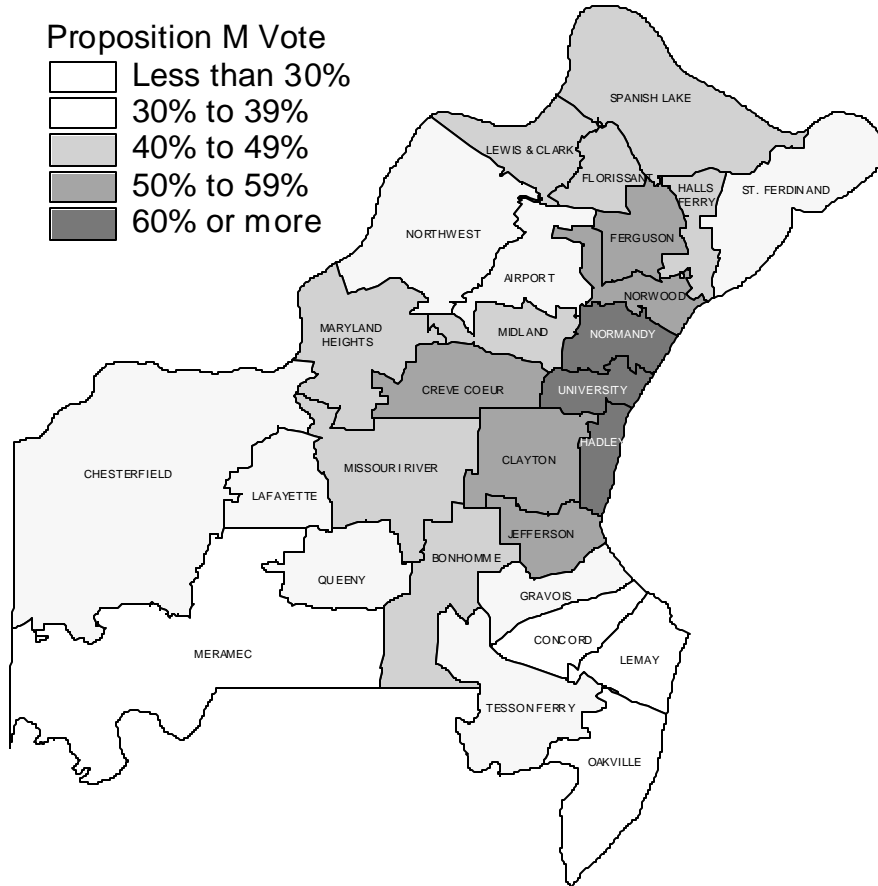
*Source: Bi-State Development Agency, weeks of February 8 through 21. Excludes Special Event Patronage and airport station boardings. Over a one year period, the average weekday ridership is 44,000.*

### ! Call-A-Ride Service

Call-a-Ride is a public demand-response system operated by Bi-State. The system offers customers door-to-door service on a reservation basis. Annual ridership is approximately 431,000 passengers, and 66% of pick-ups and drop-offs are made in St. Louis County. An even higher percentage of customers registered in the Call-A-Ride program (71%) are St. Louis County residents. The service is experiencing increased ridership, with use by persons with disabilities increasing at the fastest rate.

<sup>1</sup> St. Clair and Madison County have their own transit districts and contract services with Bi-State.

### Proposition M Results by Township November 4, 1997 Election



## Multi-Modal Facilities

Multi-modal refers to the integration of various modes of travel into a transportation system which offers a choice of travel options. Bike paths, sidewalks, and bus/rail transfer centers are Multi-modal facilities that can help increase the mobility of citizens as they provide alternative and additional means for people to travel. The term Multi-modal has taken on a new meaning since the adoption of the Intermodal Surface Transportation Efficiency Act of

1991 (ISTEA) and the Transportation Equity Act for the 21<sup>st</sup> Century (TEA-21), which have placed an emphasis on Multi-modal facilities. East-West Gateway's *Transportation Redefined II*, the comprehensive long-term transportation plan for the St. Louis region, and the *Transportation Improvement Program (TIP)* continue to encourage and fund Multi-modal facilities. In the latest Transportation Improvement Program, various agencies, from municipalities to the Missouri Department of Transportation and the Missouri Department of Natural Resources, have submitted funding requests for bike facilities and Bike paths.

## ! **Bicycling**

Currently, the St. Louis County Department of Parks and Recreation is developing a county-wide Bicycle Transportation Program. Part of this project involves examining the feasibility of implementing six bikeways identified in a 1994 regional study for East-West Gateway. These bicycling corridors, comprised of a variety of on-road design treatments and segments of off-road paths, will provide long-distance travel options for biking across sections of St. Louis County.

Implementation will be dependent on a variety of municipal, county and state agencies working together to develop a continuous system of on-street bicycle lanes, wide curb lanes and paved shoulders to facilitate safer bicycle travel on area roadways. Such improvements are likely to be most cost-effectively funded as incidental components of larger roadway improvement projects. They may also qualify for funding independently through grant programs in corridors where no other types of transportation improvements are planned.

Through this project's bicycle planning process, citizen involvement also identified a need for other cross-county bikeways. A connection between the Chain-of-Rocks bridge and the Katy Trail is desired, as well as several improved north/south countywide travel corridors.

However, most of the utilitarian bicycle travel within St. Louis County is likely to be comprised of short distance trips (national average is two miles) to close-to-home destinations. Ironically, it is often the stretches of roadway closest to such destinations that are the most difficult for bicycle travel. Thus, there is a need for additional attention to be paid to bicycle facilities during the planning and design stages of transportation projects located outside of the current six study corridors, especially in areas with more compact land use served by shorter trips.

As previously discussed under accessibility, creating "bikeways" isn't the only action needed. Bicyclists need to be able to safely cross busy roadways and complicated intersections. Hazards to bicycle travel, such as parallel bar drainage grates, need to be systematically removed throughout the County.

Bicycle routes should be developed to intersect with MetroLink stations to encourage multi-modal commuting. Bicycle parking should be routinely provided at all commercial and institutional destinations, and efforts should be undertaken to increase motorist awareness to "share the road" with cyclists.

## ! **Walking**

The other primary non-motorized user group to be served by the transportation system in St. Louis County is pedestrians, including those with mobility impairments. The Americans with Disabilities Act (ADA) requires special care and specific accommodations to serve the needs of less able individuals.

The sidewalk corridor, street corners and crosswalks are the three components of the transportation system most critical to safe and enjoyable pedestrian travel. As with bicycling, land use and the resulting trip distances contribute significantly to creating pedestrian-friendly areas.

## **Congestion**

According to the St. Louis County Mobility Study prepared by Barton-Aschman and Associates, traffic volumes on a number of major routes are at capacity or above. The key regional routes of I-170, I-270 and Lindbergh Boulevard connecting North, Central and South County suffer from considerable congestion. East-west arteries which experience similar levels of traffic overload include Manchester, Olive, Page and St. Charles Rock Roads. West County's limited number of major arterial roads and segregated land use patterns concentrate traffic on fewer routes, such as Big Bend, Clarkson, and Clayton Roads and Highways 109 and 141. Levels of service (LOS), used to describe the movement of traffic, reach LOS "D" and "F" on many of these roads during the morning and evening rush hours. Interstate 70 west of I-270 is the most heavily traveled highway, with an average daily traffic volume of over 187,000 vehicles per day.

# Indicators of the Need to Address Transportation

Four principal means of information gathering were utilized in determining critical issues which St. Louis County faces in the next several years:

- C Telephone and focus group surveys of St. Louis County residents,**
- C A day-long retreat of senior St. Louis County government officials, including both elected and appointed leaders,**
- C Nine community forums held throughout the County to solicit comment and perspectives from St. Louis County residents, and**
- C A trend analysis conducted by the St. Louis County Department of Planning (presented in next section).**

Together, these sources of input identified a number of important issues that face St. Louis County. The following discussion summarizes key points regarding the need for focused attention on transportation issues and County government's potential role in formulating a more comprehensive transportation strategy.

## Telephone Survey Results

In February 1999, 617 St. Louis County residents responded to a telephone survey regarding the direction of planning for the County. Residents of unincorporated areas numbered 303 respondents while there were 314 respondents randomly telephoned within municipalities. Respondents were asked a series of questions about the future direction of St. Louis County and the quality of life within St. Louis County. Respondents are generally satisfied with their communities and neighborhoods. Listed below are the results of the transportation related questions asked of respondents.

Expanding the MetroLink system was listed as the highest transportation priority for the St. Louis metropolitan region. Respondents were read a list of nine statements about public issues. Issues included

MetroLink expansion, Lambert Airport, and parks and recreation. Respondents were overwhelmingly supportive of MetroLink. In incorporated areas, 78% either strongly or mostly agreed that "expanding the MetroLink system should be a very high priority for the St. Louis metropolitan region."

While specifics such as funding and routes were not discussed, the survey did ask a follow up question that mentioned the current Cross-County Extension of MetroLink. When respondents were asked if they favored a proposal to "extend MetroLink from the area around Barnes-Jewish Hospital to Washington University, through Clayton, and then south to Shrewsbury", an overwhelming 83% either "strongly favored" or "favored" the proposal.

<b>Percentage of Respondents Who Think MetroLink Should Be a HIGH Priority</b>	
<b>Location</b>	<b>Strongly/Mostly Agree</b>
<b>Incorporated</b>	
North County	83%
NW County	79%
Airport	89%
Central West	90%
West County	83%
South County	89%
<b>Unincorporated</b>	
North County	80%
NW County	50%
Airport	67%
Central West	100%
West County	86%
South County	77%
<i>Source: Attitude Research Company, Survey for St. Louis County</i>	

Residents are generally satisfied with maintenance of St. Louis County roads and bridges. When asked to evaluate the different public services offered by St.

Louis County, road and bridge maintenance fell in the middle of all of the different public services. Police protection ranked the highest, with 93% rating police protection as either excellent or good. Repair and maintenance of county roads and bridges received a 64% satisfaction rating (excellent or good) while maintenance of subdivision roads was slightly lower for unincorporated residents, who gave it a 63% satisfaction rating. While the question specifically asked about County roads, it is not possible to distinguish if respondents can differentiate between roads that are maintained by the County, municipalities or the state.

## County Government Officials

Senior elected and appointed officials of St. Louis County government met for a day of discussion and brainstorming in February 1999 to identify key strategic planning issues from their perspectives. Officials performed a series of exercises in which group members listed strengths, weaknesses, opportunities and threats (SWOT) facing St. Louis County. After all of the issues were presented, group members voted on their top preferences. With regard to transportation, a number of themes emerged:

- ! Quality of life, expressed in a variety of ways, was very important. St. Louis County's location within the region and nation as well as the current MetroLink system and highway infrastructure were also cited as quality of life strengths of St. Louis County.
- ! Traffic congestion, aging infrastructure and the fact that MetroLink service is too limited were cited as weaknesses facing St. Louis County.
- ! Increasing mass transit was listed as the top opportunity that St. Louis County should use to turn weaknesses into strengths. General transportation infrastructure improvements, such as extending I-170 to South County, were also listed as opportunities that St. Louis County should capitalize on through the strategic planning process. Officials also were supportive of stronger regional planning initiatives which coincide with transportation planning.
- ! Economic downturns and aging infrastructure, both of which affect transportation, were cited as top threats facing St. Louis County. Lack of Bi-

State funding was also cited as a major threat.

## Community Forums

Nine community forums were held throughout St. Louis County in April 1999, to solicit discussion and ideas from County residents. Each forum included a brainstorming session on the strengths and weaknesses of St. Louis County and on the opportunities and threats facing the County. This led to an identification of "critical issues" on which each evening's participants voted. The process enabled the consultants to set apart priority issues from those that, while interesting, did not receive consensus acknowledgment.

The community forum results reinforced the telephone survey and the County government officials' SWOT analysis. Citizens defined the transportation issue very broadly to include traffic congestion, public transportation, and MetroLink expansion. It is important to note that MetroLink expansion was brought up as a critical issue in all of the nine forums throughout St. Louis County. More general transportation and traffic related issues were also cited

### Public Comments Regarding Transportation Issues in St. Louis County

- ' Over half of the respondents cited traffic congestion as a problem facing St. Louis County.
- ' When asked about problems facing the County, 57.1% cited an "inadequate highway system to accommodate morning and evening commutes" as a problem.
- ' Only 3 out of 10 people cited a poorly run public bus system as a common problem, however, this is probably because most County residents do not

as critical issues, but less frequently.

Transportation is a very broad term and one that means different things to different people. Some of the participants cited traffic congestion while others noted the need for better transportation infrastructure. Sidewalks and bike lanes were also described as important to citizens.

It is no surprise that people cited traffic as a critical issue. It is something that people face every day, and this concern will inevitably be brought up in community forums. Perhaps more important, however, were the strong feelings shared about expanding MetroLink. While MetroLink has been a front page topic, the discussions about MetroLink were not about the Cross-County expansion but about the general need for more MetroLink service throughout St. Louis County.

### **Critical Issues Leading to a Need For a Transportation Strategy**

- ' Need for "walkable" communities (sidewalks, bike lanes, improved roads/streets)
- ' Problems related to development driving planning, not planning driving development
- ' Environmental concerns: need to recognize real costs of improvements, prepare impact analyses, watershed management issues
- ' Desire to expand MetroLink and bus transit
- ' Lack of comprehensive transportation planning
- ' Transportation improvements impact on land use

# The Role of St. Louis County and Other Organizations

The issue of transportation is truly a regional issue, as roadways and transportation infrastructure cross all boundaries. The St. Louis County Department of Highways and Traffic is one of three entities within St. Louis County government involved with transportation-related issues. Other departments include the Department of Planning, through its site plan review process, and the Department of Parks and Recreation, which coordinates bicycle and pedestrian projects. The Missouri Department of Transportation (MODOT), East-West Gateway Coordinating Council (EWGCC), Bi-State Development Agency (Bi-State), and municipalities all share responsibility for portions of the St. Louis County transportation system. This section outlines the role that St. Louis County as well as local, state and regional organizations have in transportation.

## St. Louis County Department of Highways and Traffic

The St. Louis County Department of Highways and Traffic is responsible for design, construction, maintenance, repair, and traffic control for all roads, sidewalks and bridges that comprise the County Road System. As their department's name suggests, the Department of Highways and Traffic is not a comprehensive transportation department, but rather, focuses on auto facilities. This department oversees the public roads in the unincorporated areas and 414 miles of major roads (Arterial Road System) in both unincorporated and municipal areas. In total, the Department of Highways and Traffic is responsible for about 35% of the more than 4,800 miles of roads within St. Louis County. The County's responsibilities include:

- ! **Maintenance**
- ! **Pavement striping and signage**
- ! **Snow removal**
- ! **Infrastructure replacement**

### ! **Major capital improvements**

In recent years, the department has improved its communication with County residents by holding community meetings to gain feedback from residents about capital improvements. In 1997, the Department of Highways and Traffic initiated a county-wide public engagement process and held "Transportation Needs Forums" in all seven St. Louis County Council Districts to gain citizen feedback on road, bridge, street and transportation topics. These transportation forums will be held every three years.

The department does not have a long-range plan, nor is there a continuing funding mechanism for long-term road improvements. The department does however, compile a "needs list" of potential roadway capital improvement program (CIP) needs. This list however, does not provide any budget data, as many of the "needs" have not undergone a design process or a cost analysis to determine the cost of improvements.

The needs list is prioritized based on the CIP rating system described below. Lacking a long-range plan, the County has submitted the "needs list" in place of a long-range plan to incorporate into other plans, such as EWGCC's Transportation Redefined II long-range plan. Funding for the County road systems comes from the Transportation Trust Fund, federal and state funds, and property taxes. A detailed financial breakdown of funding sources is outlined in the chart below.

### ! **Financial Resources and Expenditures**

To carry out any type of strategy, it is crucial to have sufficient resources. This is especially important because of the shifts in federal and state funds, and the changing transportation needs within St. Louis County. Ultimately, through the Strategic Planning Process, the Task Force and department heads will need to assign budgets and costs for implementing the strategic plan.

The sources of funding for transportation projects

come from the following areas:

- ! Transportation trust fund (1/2-cent sales tax)
- ! Mass transit sales tax (1/4-cent dedicated to Bi-State)
- ! Federal reimbursements
- ! State County Aid Road Trust fund (CART)
- ! Property taxes
- ! Other county fees, surcharges, interest income

In 1998, the overall investment, defined as revenue or income, in transportation services being made in St. Louis County is summarized in the following table. Of these revenues, approximately \$74 million, or 51%, was invested in County roads and over \$70 million was invested in the transit system (via Bi-State).

<b>1998 Transportation Revenues</b>	
<b>Category</b>	<b>Funds (in millions)</b>
1/2-Cent Transportation Sales Tax*	\$74.9
1/4-Cent Transportation Sales Tax for Bi-State	34.5
Federal Reimbursements	3.2
State Aid (CART)	13.5
Property taxes	3.6
Other county fees, surcharges, interest	4.0
Carryover from 1997	6.2
Fleet management service fees	5.0
<b>TOTAL</b>	<b>\$144.9</b>

Source: St. Louis County Departments of Highways & Traffic and Administration  
 Note: \$36 million of the 1/2-cent sales taxes was dedicated to Bi-State.  
 \* 1/2-Cent Transportation Sales Tax figure includes \$69 million in tax revenue and \$5.9 million in interest.

The breakdown of funds for St. Louis County transportation purposes:

**! Transportation Trust Fund.** 1/2 Cent

Transportation Sales Tax. This tax generates approximately \$69 million. Approximately \$36 million goes directly to Bi-State and the remainder in this fund is allocated to the Arterial Road System (ARS) according to the County Executive and County Council.

**! MetroLink Sales Tax.** 1/4 Cent Transportation Sales Tax. This tax generates approximately \$34.5 million. Per state statute, all funds are dedicated to transit and allocated to Bi-State for transit.

**! Federal Reimbursements.** The use of federal aid is through a reimbursement relationship and funds a portion of the County's capital improvement projects. The County provides the cash up front for roadway improvement projects and then applies for reimbursement. Federal funds are allocated by the EWGCC through the Transportation Improvement Program (TIP). The TIP is a schedule of transportation improvement projects for a three-year time period for the entire St. Louis region. EWGCC employs a funding allocation/prioritization formula and St. Louis County competes for federal dollars among all of the eight counties that are under EWGCC. Federal funding through the TIP usually covers between 50 to 80% of the project cost.

**! State Aid (County Aid Road Trust Fund (CART)).** State aid comes from state imposed user fees such as the motor vehicle fuel tax, the motor vehicle sales tax and fee increases for licenses and titles. This money is distributed to municipalities, counties and MODOT based on a set formula. St. Louis County has received on average about \$11.5 million per year since 1993.

**! Property Taxes**

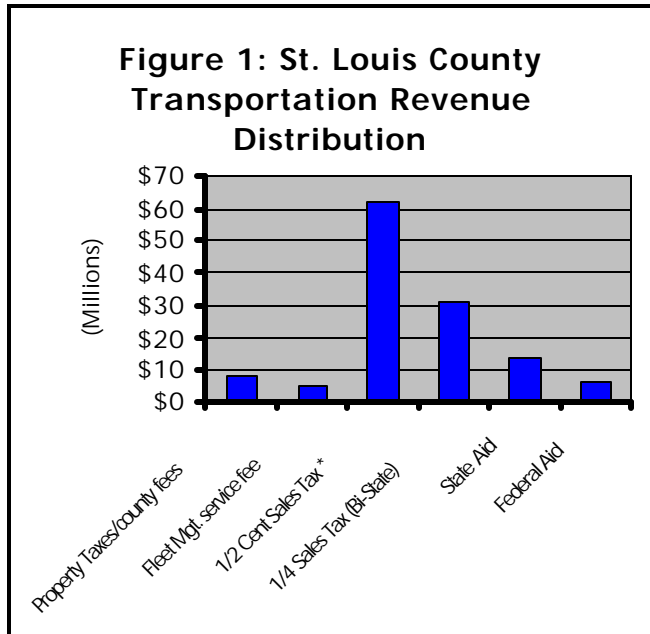
**, Road and Bridge Property Tax.** A county-wide 10.5 cent ad valorem tax. In municipal areas, 100% of the road and bridge property tax goes directly back to the municipality generating them, and in unincorporated areas, the County receives 100% of taxes generated.

**Other County Fees, surcharges, and Interest Income.** In total, these fees generate around \$5 million annually. This includes cable TV fees, which generate funds for stormwater projects in unincorporated St. Louis County, and the Merchants & Manufacturer's Surcharge which is used to fund the County Road System and the Special Road and Bridge fund.

The chart below shows that the principal source of funding comes from St. Louis County via the Transportation Trust Fund, which is protected by law for transportation use only. The County is only dependent on external resources in a limited way; thus, transportation services within the County are more or less self-reliant. Because state and federal funding could decrease in the future, this is a good position for St. Louis County. However, the potential income is a function of the economic vitality of the County. While sales tax revenues have grown much faster than property tax revenues, internet sales and overall growth trends in St. Louis County will effect the real growth potential in revenue.

the past twenty years.

History of Bond Issues				
Year	Description	Result	YES	NO
1981	Proposal for new County Jail	Failed	46%	54%
1986	Proposition A - Roads	Passed	76%	24%
1986	Proposition B - Parks & Recreation	Passed	70%	30%
1986	Proposition C - Police & Fire	Passed	77%	23%
1986	Proposition D - Stormwater Control	Passed	72%	28%
1986	Proposition E - Lakeside Center	Passed	71%	29%
1993	Proposition A - St. Louis County Justice Center	Passed	63%	37%



Source: St. Louis County, 1999

As St. Louis County ages, long-term funding mechanisms for long-term road and capital improvements may need to be established. The following table summarizes bond issue elections from

## EAST-WEST GATEWAY COORDINATING COUNCIL

East-West Gateway Coordinating Council affects St. Louis County both indirectly and directly. East-West Gateway affects the amount of federal transportation funds that St. Louis County receives, as all requests for federal funding are approved through East-West Gateway, the St. Louis area's metropolitan planning organization (MPO). As the MPO, EWGCC sets spending priorities for transportation and leads the way on planning for major transportation projects, such as bridges, freeways and transit systems. Through such programs as Bridges to Work, EWGCC has also taken an active role in initiating a mobility program designed to connect job-seekers in urban communities with growing employment opportunities in western St. Louis County.

## **BI-STATE DEVELOPMENT AGENCY**

As discussed earlier in this document, the Bi-State Development Agency provides bus and light rail service in the St. Louis region. Bi-State's operating budget for 1998 was \$119 million. St. Louis County supports Bi-State through a one-half cent transportation sales tax and a one-quarter cent MetroLink sales tax. St. Louis County's contributions made up 37% of Bi-State's 1998 operating budget. Annual appropriations are approved for Bi-State through the St. Louis County Council.

## **MISSOURI DEPARTMENT OF TRANSPORTATION**

The Missouri Department of Transportation (MODOT) is responsible for maintenance and construction of the interstate highway system in St. Louis County as well as a number of major arterial roads. The County contains 152 miles of interstate highways controlled by MODOT.

## **COUNTY DEPARTMENTS**

The Department of Planning is an important partner with the Department of Highways and Traffic because so many of the decisions made depend on and affect transportation. The Departments of Highways and Traffic, Planning and Public Works serve as a three-part team from County government in reviewing proposed developments. MSD also participates in site plan review.

The interaction between the Department of Highways and Traffic and the Department of Planning begins with the zoning review process. The Department of Highways and Traffic reviews site plans and comments on designs of rezoning proposals. If the Planning Commission chooses to approve a proposed rezoning, the Department of Highways and Traffic then recommends what is necessary in terms of roadway improvements. Until recently, Highways had a similar role with regard to stormwater control, but MSD now

controls design requirements for stormwater removal.

In addition to reviewing zoning proposals in conjunction with the Department of Planning, the Department of Highways and Traffic is responsible for review of engineering documents and improvement plans submitted for the approval of subdivision plats for commercial, residential and industrial developments.

The Department of Highways and Traffic can require certain improvements to occur prior to approval of a development. Developers are often required to make additional improvements, such as sidewalks, as part of a development plan.

In 1998, the position of Transportation and Redevelopment Policy Administrator was developed jointly by the Department of Planning and the County Executive's office. This new position serves as a liaison between the County Executive's office and transportation agencies such as the Bi-State Development Agency, East-West Gateway Coordinating Council, and the Missouri Department of Transportation.

# Best Practices From Around the Country: Transportation Initiatives

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Many local communities, metropolitan planning organizations, state and local governments are re-thinking their approach to transportation. As St. Louis County begins to look at ways to implement a strategic plan for transportation, there are a number of approaches, both locally and nationally that the County can look to for examples and innovative thinking. Studying other local governments provides concrete examples of possible funding initiatives and strategic partnerships. There are still many lessons to be learned as transportation planning is being redefined at all government levels--federal, state and local. In many ways, in fact, the St. Louis region, and St. Louis County are changing how government agencies approach transportation.

## Taking a Comprehensive and Coordinated Approach

### ! Montgomery County, Maryland Overview

The Montgomery County Department of Public Works and Transportation is organized to develop and implement a multi-modal transportation program. Much like the St. Louis County Department of Highways and Traffic, the Montgomery County Department of Public Works and Transportation is responsible for the design, construction, maintenance, repair, and traffic control of all of the county roads, sidewalks, and bridges that comprise the County Road System. In addition, the department also oversees its own bus system, Ride On, which is tightly integrated into the region's metrobus and metrorail system plus bikeways, parking and mass transit facilities. Each of the department's responsibilities (i.e. roads, mass transit, Bike paths) receives a separate line in the six-year capital improvement program.

General obligation bonds, general funds and impact taxes provide funds for infrastructure planning, construction and maintenance services. Projects are also supported by such dedicated funding sources as

the Mass Transit Fund and revenue from parking, in addition to state and federal aid.

Major projects are developed in accordance with the various area master plans within Montgomery County. In addition to the traditional transportation divisions (e.g., highway services, fleet management, engineering services), the Department of Public Works and Transportation also has an Office of Project Development that houses many of the coordinating functions.

Every transportation function that is operated by an outside organization, such as the Maryland State Highway Administration, has its own separate staff contact that coordinates projects to ensure that those projects are in accordance with the County's Master plan. In order to guarantee good communication with the public, the Department has a general information desk. Every day a staff member is designated as the "Planner of the Day" to answer general transportation questions from citizens. The department also has an extensive website that lists staff contacts for all of the divisions, as well as the six-year capital improvement program, and links to all of the web sites of its partnering agencies.

#### Contact:

Montgomery County Department of Public Works and Transportation  
Office of Project Development  
101 Monroe Street: 10<sup>th</sup> Floor  
Rockville, MD 20850  
(301) 217-2145  
[www.dpwt.com](http://www.dpwt.com)

## Increasing the Flexibility of Mass Transit

Traditional fixed route/fixed schedule transit services may not meet the needs of today's spread out work schedules. Most regional transit providers are finding

that they need to reconfigure their schedules as well as redesign their routes, now that the downtown central business district is not the dominant employment destination. Fulfilling the need for flexible services in lower-density areas requires innovative and flexible transportation options.

St. Louis County has traditionally played a passive role in transit planning as compared to road and highway planning. The County's involvement with transit has not been as a direct service provider but rather as a funding agent and planning participant. What should St. Louis County's role be? Listed below are examples of county departments and regional transit organizations that are looking at innovative and flexible transportation options.

**Montgomery County, Maryland**, like St. Louis County was once a small bedroom community. Beginning in the 1970's, population exploded and jobs followed people to the suburbs. The Washington Metropolitan Area Transit Authority's Metrobus and Metrorail and the Maryland Commuter Rail provided excellent access to the central business district but did not provide a means of intercounty commuting or reverse commutes. Montgomery County responded by establishing its own feeder system to move people around the county and increase accessibility to the services of the primary providers.

**HubLink in Western New York** is a proposed comprehensive and coordinated public transportation system designed to enhance mobility. The HubLink study, which was undertaken by the Niagara Frontier Transportation Authority (NFTA), included a comprehensive public participation program and a full analysis of public transportation needs and demand and examination of the deficiencies in the present system.

The HubLink service concept builds upon the existing public transportation resource, including the MetroRail, fixed-route bus services, paratransit service, transit centers and park-and-ride facilities. HubLink will introduce new services using smaller vehicles around the hubs to provide for local circulation and feeder trips. A key element of the HubLink plan is an increased reliance on hubs, where passengers can access and transfer conveniently between already

established transit services.

The identification of new funding sources was a major component of the study. To supplement user fares, federal, state and local transit funding, the plan looks to partner with human service agencies, municipalities, and private employers for additional funding. The plan has identified the potential for private dollars to fund between 9 and 16% of the additional capital funds needed for the HubLink plan.

**Contact:**

Niagara Frontier Transportation Authority  
 181 Ellicott Street  
 Buffalo, New York 14203  
 (716) 855-7638

**Local Jurisdictions Working Together: King County, Washington**

King County is the largest of four counties that make up the Seattle Metropolitan Statistical Area. The county includes 39 municipalities, including the cities of Seattle and Bellevue, as well as unincorporated areas.

An increase in annexations during the late 1980's and early 1990's as well as the establishment of growth boundaries created the need for King County to re-think its role in transportation. In response, the county created subarea transportation boards, composed of elected officials from local jurisdictions and King County, transportation agency representatives, and the private sector.

The mission of subarea transportation boards is to provide forums for sharing information and building consensus to solve common transportation problems. King County provides the staffing necessary to coordinate decision-making and advancing of multi-modal transportation improvements. To date, three boards have been established in King County, and each board has developed a subarea plan

Activities of the board include: 1) setting a six-year transit plan policy direction and allocating new King County Metro transit service subsidies, 2) developing recommendations for countywide ISTE funds within each subarea, and 3) providing recommendations for policy direction on Sound Transit (the new regional transit provider) plan implementation within each subarea.

The subarea boards have had to overcome and continue to deal with the surrounding skepticism among the different jurisdictions. Over the past five years, however, the boards have developed into effective forums for inter-jurisdictional cooperation. The development of the individual boards has been aided by the Growth Management Act (GMA) that requires each jurisdiction to have a comprehensive plan. Each comprehensive plan must comply with the regional comprehensive plan of the metropolitan planning organization. Boards are set up in such a way that each elected official representing a city or the county (county council members in subarea) has one vote. Participation by individual jurisdictions is voluntary.

## **Creating Bike-Friendly and Walkable Communities**

There are several communities that have established programs and institutionalized policies to improve local conditions for bicycling and walking. At the county level of government, Hennepin County, Minnesota, Maricopa County, Arizona, King County, Washington, Sommerset County, New Jersey, and Dane County, Wisconsin may serve as case studies for best practices.

The State of Illinois provides a good role model for a mechanism to ensure that non-motorized needs are considered in the planning and design phases of all transportation improvements. The Illinois Department of Transportation has adopted policies and procedures for accommodating bicycle travel in highway projects (IDOT DBE Procedure Memorandum 95-21). Roadway planners and engineers are requested to complete a simple checklist to gauge what level of bicycling activity might be present in a

given corridor based upon land use and connections with other facilities; and then, as deemed necessary, plan for bicycle accommodation as a part of the construction project. Several communities nationwide have developed similar scoping checklists for determining the need for sidewalks and other pedestrian improvements.

### **Contact:**

Craig L. Williams  
Bicycle and Pedestrian Coordinator  
Illinois Department of Transportation, Division of Highways  
2300 South Dirksen Parkway  
Springfield, IL 62764  
(217) 785-2148

# Defining St. Louis County's Role in Transportation

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Could and should St. Louis County be a more proactive force in the area of transportation? There are several potential strategies that St. Louis County can take in strengthening its role in transportation. One potential option, of course, is to remain at the status quo. But it is presumed that the status quo is not acceptable.

The following options are just that--options. They are not yet recommendations. They arise from identified problems and from approaches tried both within the St. Louis area and by other communities. Whatever strategies are pursued, it is important that political, economic, and social realities be taken into consideration. It is also important that strategies be initiated and have measurable outcomes within the next five years.

## Option 1 - Land Use and Transportation Plan

One such proactive step could be to establish a land use and transportation plan. The latest future land use map for the County was prepared in 1980, and that document has been characterized as "reactive as opposed to proactive". Development of the plan could be part of an overall planning effort initiated through a partnership with East-West Gateway. The plan should prescribe future highway and transit facilities as well as aviation, port, and intermodal freight facilities. The plan should incorporate the current bike path plan that the Department of Parks and Recreation is initiating.

### ! Obstacles

The large number of municipalities and lack of coordinated land use planning which characterize St. Louis County, as discussed earlier in this paper, present obstacles to combining future land use and transportation planning. However, the very presence of these obstacles may be cause for St. Louis County to take on more of a leadership role in coordinating land use and transportation planning.

## Option 2 - Proactive Role in Future Transit Services

Should St. Louis County take a more proactive role in transit services? Possible roles could be the funding of expansion components such as station development, supporting facilities and services, and right-of-way acquisition. Currently, transit decisions come under the domain of the County Executive's Office, where a County Transportation Commission composed of citizen members appointed by the County Executive meets bi-weekly to consider bus service changes and make recommendations on modification in bus routes and headways. These and other transit issues, including the routes and financing for new rail transit services, are debated as issues of public policy significance at the highest level of the County, with recommendations made to the County Executive and the County Council.

### ! Obstacles

Monies in the Transportation Trust Fund, which are generated by a one-half cent transportation sales tax, are used for both transit and road improvement purposes. Missouri state law (RSMo. 94.600) specifically allows St. Louis County to use revenues from the Transportation Trust Fund for construction, repair, and maintenance of its Arterial Road System. Diverting additional monies from this fund for mass transit use means that there will be fewer resources available for St. Louis County roads. Political resistance to increasing the amount of money allotted to the Bi-State Development Agency from this fund has been strong.

## Option 3 - Promote Multi-modal Facilities

Implementing the bikeway facility treatments being recommended as part of the County Parks and Recreation Department's current Bicycle Transportation

Program study is a logical first step. A mechanism may be easily created, following the Illinois DOT model, to routinely assess the need for bicycle accommodation as a part of all new development and roadway improvement projects located within St. Louis County. The need for sidewalks, safe roadway crossings and other pedestrian facilities should be incorporated into a similar scoping checklist as well.

Finally, to help people get to train stations, consideration should be given to developing non-motorized facilities that intersect, rather than parallel, existing and future MetroLink lines.

### **! Obstacles**

For the past several decades, transportation spending decisions have been made primarily to benefit the automobile. Engineering design formulas are calculated to move the greatest number of cars at the highest speeds, often without consideration of the impact on non-motorized users. In addition, many people view bicycling and walking as special interest recreational activities rather than personal transportation options. These factors -- combined with a lack of existing facilities -- means that few people currently get around on foot or bike, making it difficult to justify additional spending based upon current demand. Yet studies show that more people would bike and walk more often given multi-modal infrastructure improvements.

## **Option 4 - Establish an Annual County Capital Budget**

The annual budget should include improvements that benefit bicycles and/or pedestrians as integral components of the transportation system. Sidewalk construction should be mandatory. Intersections should be designed to safely accommodate motorized as well as non-motorized users. And minimal levels of bicycle accommodation should be routine. State/Federal grants should be sought for high-cost projects such as trail construction and bridge retrofit; however the required matching local funds (often 20%) will need to come from a combination of County and municipal budgets.

## **Option 5 - Implement a Jurisdictional Highway Plan**

The County arterial road system has major gaps in it as county roads turn into municipal roads, which turn into state roads, and then back into county roads. A jurisdictional highway plan would consist of the County, municipal, and State of Missouri officials agreeing on functional criteria for roads under the jurisdiction of municipalities, the County, and the state. These criteria would then be applied to each arterial street and highway in the County, and the appropriate jurisdiction determined.

### **! Obstacles**

Many of the municipalities are reluctant to give up control of roads that are under their jurisdiction, even if they should be classified as County Arterial roads, because of their desire to control rights-of-way within their borders. For financial reasons, there is an unwillingness by some to have the County take over roads, even if they would be better managed by St. Louis County.

## **Option 6 - Increasing Public Participation**

While the St. Louis County Department of Highways and Traffic has initiated a public engagement process on the County's five-year road needs, and the Department of Planning holds various public meetings throughout the year, there is still a need for gathering citizen input regarding transportation issues. Typically, residents show little interest in transportation planning until lines are drawn on a map showing approved road projects, and then negative comments from those whose properties are most directly impacted are usually heard instead of those who are in support.

# References and Resources

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Significant federal and state legislation, as well as local policies, have been adopted to alter the way transportation projects and policies are implemented. This paper has attempted to outline the current and possible future roles of St. Louis County government within the overall framework of transportation. However, because the County is just one of many organizations that oversees transportation projects and policy related issues, it is important to view the role of the County and the impact of the 2000-2004 Strategic Plan within the overall regional context. Listed below are studies that will need to be coordinated to address the strategic issue of transportation in St. Louis County.

## East-West Gateway Coordinating Council (EWGCC)

- ! **Transportation Redefined II 2020 Regional Transportation Plan.** Update of *Transportation Redefined*. A Comprehensive long-range transportation plan for the region. Federal law requires that the plan be updated every three years and that it conforms to federal air quality requirements. March 1999. (*Transportation Redefined* was adopted in 1994).
- ! **Transportation Improvement Program (TIP).** The TIP covers the first three years of the long-range plan. It covers federal funds for specific surface transportation projects. Funding allocations in the TIP are guided by goals and focus areas set in place by *Transportation Redefined*, the region's long-range transportation plan.
- ! **Congestion Management Issue Paper.** Analyzes one of the seven focus areas established in *Transportation Redefined*, August 1998.
- ! **Transportation and Sustainable Development Issue Paper.** Analyzes one of the seven focus areas established in

*Transportation Defined*, August 1998.

## St. Louis County Department of Highways and Traffic

- ! **Strategy for a Mobility Plan Serving St. Louis County.** This report was commissioned by the Department of Highways and Traffic and was completed in May 1997. The report outlines the existing mobility conditions, estimates future mobility conditions and provides 11 recommendations.
- ! **St. Louis County Department of Highways and Traffic 1997 Annual Report.** Outlines the achievements of the Department of Highways and Traffic's six divisions (Division of General Services, Division of Highway Planning, Division of Highway Design, Division of Construction, Division of Maintenance, Division of Traffic).
- ! **St. Louis County Department of Highways and Traffic Capital Improvement Program 1998-2002.** Prepared in June 1998. While the County prepares a list of capital improvements for funding purposes, the 1998-2002 list is the first comprehensive list of capital improvements compiled by the Department of Highways and Traffic.

## Other Studies:

! **St. Louis County Bicycle Transportation Program, by Bicycles &, Inc. for the St. Louis County Parks and Recreation Department, through funding from Missouri Department of Transportation, 1999.**

This is the first phase of implementation for projects and programs outlined in the 1994 St. Louis Regional Bicycle Facilities Plan. The three-part study is focusing on 1) determining the feasibility of six proposed cross-county bicycle corridors; 2) obtaining ongoing citizen involvement in bikeway planning; and 3) developing materials for use in driver education curriculums to teach motorists and cyclists how to share the road.