Adrian
Transportation System Plan
January 1998
Prepared for:
City of Adrian

Chapter 7 Updated June 2001
by TriLand Design Group, Inc.

W&HPACIFIC
8405 SW Nimbus Avenue
Beaverton, OR 97008
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Chapter</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td><strong>INTRODUCTION</strong>&lt;br&gt;Planning Area .......................................................... 1-1&lt;br&gt;Planning Process .......................................................... 1-1</td>
</tr>
<tr>
<td>2</td>
<td><strong>EXISTING PLANS, POLICIES AND CODES</strong>&lt;br&gt;City of Adrian .................................................. 2-1&lt;br&gt;Malheur County Planning Efforts .................................................. 2-1&lt;br&gt;State Transportation Planning Reports, Corridor Studies, Current Planning Efforts and Recent and Future Transportation Improvements .................................................. 2-3&lt;br&gt;Idaho Planning Transportation Efforts .................................................. 2-7&lt;br&gt;Federal Transportation Planning Reports, Current Planning Efforts and Recent and Future Transportation Improvements .................................................. 2-7</td>
</tr>
<tr>
<td>3</td>
<td><strong>GOALS AND OBJECTIVES</strong>&lt;br&gt;Goal Statement .................................................. 3-1&lt;br&gt;Overall Transportation Goal .................................................. 3-1</td>
</tr>
<tr>
<td>4</td>
<td><strong>EXISTING TRANSPORTATION SYSTEM</strong></td>
</tr>
<tr>
<td>5</td>
<td><strong>IMPACTS OF GROWTH AND FUTURE NEEDS</strong>&lt;br&gt;Population .................................................. 5-1&lt;br&gt;Traffic Volumes .................................................. 5-3&lt;br&gt;Future Facility Needs .................................................. 5-4</td>
</tr>
<tr>
<td>6</td>
<td><strong>ALTERNATIVES ANALYSIS</strong>&lt;br&gt;Evaluation of Potential Projects .................................................. 6-1&lt;br&gt;Summary .................................................. 6-4</td>
</tr>
<tr>
<td>7</td>
<td><strong>TRANSPORTATION SYSTEM PLAN</strong>&lt;br&gt;Introduction .................................................. 7-1&lt;br&gt;Recommended Street Standards .................................................. 7-1&lt;br&gt;Modal Plans .................................................. 7-6&lt;br&gt;Transportation Systems Plan Implementation Program .................................................. 7-10</td>
</tr>
<tr>
<td>8</td>
<td><strong>FINANCIAL PLAN</strong>&lt;br&gt;Introduction .................................................. 8-1&lt;br&gt;Transportation System Improvements – Cost and Timing .................................................. 8-1&lt;br&gt;Existing and Historic Financing Sources .................................................. 8-2&lt;br&gt;Potential Future Transportation Funding Sources .................................................. 8-6</td>
</tr>
</tbody>
</table>

## APPENDIXES
- A Inventory of Transportation System
- B Sample Policy and Ordinance language
- C Transportation System Funding Sources
- D Malheur County TSP Financial Plan

January 1998

City of Adrian

Transportation System Plan
## LIST OF TABLES

<table>
<thead>
<tr>
<th>Table</th>
<th>Description</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>4-1</td>
<td>City of Adrian Roads by Pavement Condition and Surface Width</td>
<td>4-5</td>
</tr>
<tr>
<td>4-2</td>
<td>City of Adrian 1996 Average Daily Traffic Volumes on Highway 201</td>
<td>4-6</td>
</tr>
<tr>
<td>5-1</td>
<td>Adrian Population, 1960-1996</td>
<td>5-1</td>
</tr>
<tr>
<td>5-2</td>
<td>Population Estimates, Forecasts and Average Annual Growth Rate, 1995-2015...</td>
<td>5-2</td>
</tr>
<tr>
<td>5-3</td>
<td>1996, 2017 Traffic Volumes on Highway 201 in Adrian</td>
<td>5-3</td>
</tr>
<tr>
<td>6-1</td>
<td>Transportation Planning Goals and Potential Transportation Improvement Projects</td>
<td>6-1</td>
</tr>
<tr>
<td>6-2</td>
<td>Recommended Pavement Improvements</td>
<td>6-3</td>
</tr>
<tr>
<td>6-3</td>
<td>Transportation Project Options: Summary of Recommendations and Costs</td>
<td>6-5</td>
</tr>
<tr>
<td>7-1</td>
<td>Recommended Street Design Standards</td>
<td>7-1</td>
</tr>
<tr>
<td>7-2</td>
<td>Suggested Access Management Guidelines for Rural Streets</td>
<td>7-6</td>
</tr>
<tr>
<td>7-3</td>
<td>Implementation Plan</td>
<td>7-13</td>
</tr>
<tr>
<td>8-1</td>
<td>Financial Plan</td>
<td>8-3</td>
</tr>
<tr>
<td>8-2</td>
<td>Recommended Funding Sources</td>
<td>8-8</td>
</tr>
<tr>
<td>8-3</td>
<td>Added Cost of New Transportation Funding Measures</td>
<td>8-9</td>
</tr>
</tbody>
</table>
## LIST OF FIGURES

<table>
<thead>
<tr>
<th>Figure</th>
<th>Description</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>1-1</td>
<td>Adrian Vicinity</td>
<td>1-2</td>
</tr>
<tr>
<td>4-1</td>
<td>Existing Functional Classification</td>
<td>4-2</td>
</tr>
<tr>
<td>4-2</td>
<td>Pavement Conditions Summary</td>
<td>4-7</td>
</tr>
<tr>
<td>5-1</td>
<td>City of Adrian Population</td>
<td>5-1</td>
</tr>
<tr>
<td>5-2</td>
<td>Distribution of Population by Age Group, Adrian, 1990</td>
<td>5-2</td>
</tr>
<tr>
<td>5-3</td>
<td>Adrian 1990 Employment by Sector (Employed persons 16 years and over: 47)</td>
<td>5-3</td>
</tr>
<tr>
<td>5-4</td>
<td>Traffic Seasonal Variation</td>
<td>5-6</td>
</tr>
<tr>
<td>5-5</td>
<td>Vehicle Classification</td>
<td>5-6</td>
</tr>
<tr>
<td>7-1</td>
<td>Streets Typical Sections</td>
<td>7-2</td>
</tr>
<tr>
<td>7-2</td>
<td>Recommended Street Classifications</td>
<td>7-4</td>
</tr>
</tbody>
</table>
CHAPTER 1:
INTRODUCTION

PLANNING AREA

The City of Adrian TSP study area includes all lands inside the Adrian Urban Growth Boundary. Streets studied in this plan are under several different jurisdictions:

- State of Oregon;
- Malheur County (Nyssa Road District); and,
- City of Adrian.

Oregon State Highway 201 is the primary street through the city. As shown in the vicinity map (Figure 1-1), Adrian is located on the eastern edge of the Malheur County. The city lies near the Washington-Idaho state line, approximately 25 miles south of Ontario. The city itself is bordered by the Snake River to the southeast. The city limits are coterminous with the Urban Growth Boundary (UGB). In 1996, Adrian’s population was 135 people.

The major economic activities in the area are ranching, farming and retail commerce. One of the area’s largest employers is the Adrian School District. The School District serves a large area (approximately 295 square miles) and had a 1997 enrollment of 325 students. Another major part of Adrian’s economy is derived providing goods and services to the surrounding agricultural area. Agriculture, primarily livestock and vegetable crops, is also a significant economic contributor in the area.

PLANNING PROCESS

The Oregon Department of Transportation (ODOT) funded the preparation of the City of Adrian TSP in 1997-98 as part of the Malheur County TSP effort. The plan was developed through a series of technical analyses combined with input from County and ODOT staff. Key elements of the process included:

- Involving the City of Adrian (Chapter 1)
- Reviewing Existing Plans and Policies (Chapter 2)
- Establishing Goals and Objectives (Chapter 3)
- Describing the Existing Transportation System (Chapter 4)
- Developing population, employment and travel forecasts (Chapter 5)
- Developing and analyzing and evaluating potential transportation system improvements (Chapter 6)
- Writing the Transportation System Plan elements (Chapter 7)
- Reviewing and summarizing a capital improvements program (Chapter 8)
Community Involvement

The community involvement and City of Adrian oversight of the TSP process is constituted primarily in the review and recommendations made by the Adrian City Council.

Review and Inventory of Existing Plans, Policies and Public Facilities

The following documents were reviewed and summarized as a part of the TSP:

**Adrian**
- City of Adrian Comprehensive Plan (1980)

**Malheur County**
- Malheur County Comprehensive Plan
- Malheur County Strategic Plan (1996)
- Draft Malheur County Transportation Systems Plan

**Oregon**
- Draft Statewide Transportation Improvement Plan, 1998-2001
- Oregon Transportation Plan, including modal plans

**Federal**
- Intermodal Surface Transportation Efficiency Act of 1991

Goals and Objectives

A set of draft goals and objectives is outlined in Chapter 3. These goals and objectives are used to develop and evaluate transportation system alternatives and make recommendations of a Preferred Alternative and an implementation plan for the TSP.

Inventory of Existing Transportation System

Chapter 3 provides a summary of the existing conditions inventory of transportation facilities in the City of Adrian. This inventory was completed in August 1997.

Future Transportation System Demands

The Transportation Planning Rule (TPR) requires that all TSPs address a 20-year forecasting period. Future traffic volumes for the existing plus committed transportation systems are projected in major road segments in Adrian. Chapter 5 summarizes and illustrates the travel demand forecasting analysis.
Potential Transportation System Improvements

Once the travel forecasts were developed, the consultant team evaluated a series of potential transportation system improvements. Chapter 6 elaborates on each option, and the rationale for the final selection of the Preferred Alternative.

Transportation System Plan

Chapter 7 addresses each mode of transportation and provides an overall implementation program. The elements include a street system plan, a bicycle and pedestrian plan, a public transportation element/discussion, as well as airport, pipeline and rail plan elements.

Funding Options

The City of Adrian needs additional funding mechanisms. Funding options are summarized in Chapter 8. Based on the needed transportation system improvements of TSP as identified in Chapter 7, a financial plan is recommended.
Existing Plans, Policies and Codes

Adrian
Transportation System Plan
CHAPTER 2:
EXISTING PLANS, POLICIES AND CODES

The City of Adrian TSP started with a review and summary of all city, county, state and federal plans, policies and codes relevant to transportation in the city. They are summarized below.

CITY OF ADRIAN

1. The City of Adrian Comprehensive Plan, 1980

The City of Adrian Comprehensive Plan briefly addresses the transportation system (pages 22-23, 28 and 46-47), including a description of the adequacy of the existing transportation system, citing few traffic or facility issues with the following exceptions:

- "... some people feel that the 35 mph speed limit through town is not enforced strictly enough and that speeding is a recurrent problem."

- "... some residents feel that street lighting is inadequate at the present and additional lighting would be desirable."

In terms of land use and urbanization, the Plan notes that the present city boundary is coterminous with the Urban Growth Boundary and that the four land use categories within the city are general use, commercial, residential and agricultural.

There are five transportation-related Comprehensive Plan policies:

- Pedestrian and automotive safety shall be the primary considerations in any changes or modification of existing streets and construction of any new streets.
- The city shall take any necessary steps to promote change and/or enforcement of the speed limit on Highway 201 through the city.
- The city shall establish standards for setbacks and rights-of-way for new street construction, if necessary.
- The city shall cooperate with the State Highway Maintenance Department to ensure adequate maintenance of Highway 201 through Adrian.
- The city shall ensure that adequate street lighting is maintained.

MALHEUR COUNTY PLANNING EFFORTS

1. Malheur County Comprehensive Plan,

The Malheur County Comprehensive Plan designates US Highway 201 as a minor arterial. Transportation policies are cited under the Comprehensive Plan's Goal 12 - Transportation.
Selected policies which may be of particular relevance to transportation systems and facilities within Adrian are listed below:

**Policies**

3. Plans for new transportation facilities will identify impacts on: (a) the transportation needs of all citizens, including the handicapped and the elderly; (b) local land use patterns; (c) the local economy; (d) environmental quality; (e) energy and resources; (f) existing transportation systems; (g) fiscal resources; and (h) natural resources.

5. During the design or improvement of transportation facilities, consideration will be given to pedestrian, bicycle, and equestrian traffic.

10. Access management on arterial highways will be coordinated with the Oregon State Department of Transportation.

14. The county will cooperate with cities and other governmental agencies to improve the transportation system.

19. The county will establish agreements with the cities that, whenever lands are annexed to a city, all county roads or segments thereof that are within or along the boundaries of the proposed annexation will be incorporated into the city’s street system, thereby removing such roads from the county’s road system.

27. All road maintenance agreements between the Road Department or road districts and other agencies, including but not limited to the cities, utility companies, the BLM, and the U.S. Forest Service, will be in writing and filed with the County Court. These agreements will be reviewed at the annual meeting of the Road Advisory Board.

28. The County Court will coordinate road improvement and maintenance activities between the Road Department, road districts, and local, state, and federal agencies.

29. The county will request the state to initiate a comprehensive road-signing program.

2. **Malheur County Strategic Plan, December 1996**

The Strategic Plan recently adopted by the County includes Physical Infrastructure and Business Development goals that call for transportation improvements. These include the following suggested strategies:

**General Transportation Planning**

- Collaborate with the Community Solutions Team, Oregon Department of Transportation, and NOVA Transportation Committee to forge a Transportation Master Plan outlining development plans and implementation schedules to complete the transportation projects in Malheur County.
- Coordinate with ODOT and other responsible public jurisdictions the priority for project funding, engineering and implementation.
New Financing Mechanisms
- Investigate the benefits and feasibility of establishing a Port District in Malheur County to fund infrastructure improvements for industrial site development projects.

3. Draft Malheur County Transportation Systems Plan (TSP), 1998

The Malheur County TSP addresses rural and intercity transportation issues in response to Oregon’s statewide Transportation Planning Rule or “TPR” for short. The TPR requires all Oregon cities and counties to develop 20-year, transportation plans with strategies and local land use and transportation policies to manage future growth. It also requires local jurisdictions to assess ways in which future transportation improvements are paid for.

The Malheur County TSP includes a full evaluation of transportation alternatives to identify needed transportation improvements in rural Malheur County needed over the next 20 years. The cost of these improvements is estimated at approximately $33 million. The County’s share of these costs is about $9 million over the next 20 years. One of the key projects in the plan is to improve the East-West, farm to market truck route, that offers a parallel route to Highway 20/26 between Vale and Ontario.

Other recommended projects include:

- Improve “S” curve on Arcadia Avenue and Alameda Boulevard
- Replace bridges as needed
- Widen Graham Boulevard/Bully Creek Road
- Extend Stanton Boulevard to Highway 201
- Construct a new Jordan Valley Airport
- Reconstruct Owyhee Avenue
- Extend Columbia Ave. to Lytle Blvd.

New funding measures to pay for the recommended projects could include a $0.01 per gallon County-wide gas tax over the next 20 years, $10 per year, County-wide Vehicle Registration Fee over the next 20 years; and $0.55 per $1,000 assessed value, Road Bond over the last 10 year period.

STATE TRANSPORTATION PLANNING REPORTS, CORRIDOR STUDIES, CURRENT PLANNING EFFORTS AND RECENT AND FUTURE TRANSPORTATION IMPROVEMENTS

1. ODOT Statewide Transportation Improvement Program 1998-2001 Draft

No projects are identified for the City of Adrian.
2. Oregon Transportation Plan (1992)

The Oregon Transportation Plan (OTP), in a policy element, defines the goals, policies and actions for the state over the next forty years. It directs the coordination of transportation modes and the relationship of transportation to land use, economic development, the environment and energy use. It also addresses the coordination of transportation with federal, state, regional and local plans. In its system element, described below, the OTP identifies a coordinated multimodal transportation system, a network of facilities and services for air, rail, highway, public transit, pipeline waterways, marine transportation, bikeways and other modes of transportation. The OTP, including the policy and system elements and adopted modal and facility plans (described in a - h, below), is intended to meet the requirements for the state TSP.


The Oregon Bicycle and Pedestrian Plan outlines the general principles and policies that ODOT follows to provide bikeways along state highways and describes the framework for cooperation between ODOT and local jurisdictions. The Plan also offers guidance to cities and counties for the development of local plans. It also states ODOT's commitment to providing wide, paved shoulders in rural areas as a part of its standard construction practices. The state priority is to complete the bicycle and pedestrian networks within urban areas and to accommodate recreational improvements as a part of rural road improvements.


The Oregon Highway Plan (OHP), adopted by the Oregon Transportation Commission in 1991, outlines the policies which enable the Department of Transportation to better manage the highway system for the period 1991-2010. A key component of the OTP, it merits special consideration. The adopted policies of the OHP that pertain to the City of Adrian include both Level of Importance (LOI) and Access Management policies.

Level Of Importance (LOI) Policy

ODOT has devised a "level of importance" classification system to prioritize highway improvement needs and define operational objectives. The highway classification system defines four levels of importance including: (1) Interstate, (2) Statewide, (3) Regional, and (4) District. The level of importance concept is based on the premise that the more important routes require a higher level of service. Interstate routes, for example, should maintain a higher level of service than district routes.

1. Interstate Highways: The primary function of highways in this level is to provide connections and links to major cities, regions of the state, and other states. The City of Adrian contains no Interstate Highway facilities.
2. **Statewide Highways:** The primary function of highways in this level is to provide connections and links to larger urban areas, ports and major recreation areas that are not directly served by interstate highways. Statewide highways provide links to the interstate system and alternate links to other states. A secondary function is to provide links and connections for intra-urban and intra-regional trips. Connections are primarily with roadways that serve areas of regional significance or scope. *The City of Adrian contains no Statewide Highway facilities.*

3. **Regional Highways:** The primary function of highways in this level is to provide connections and links to areas within regions of the state, between small urbanized areas and larger population centers, and to higher level facilities. *The City of Adrian contains no Regional Highway facilities.*

4. **District Highways:** The primary function of highways in this level is to serve local traffic and land access. *US Highway 201 south of Nyssa is designated as having a District Level of Importance.*

**Level of Service (LOS) Standards:** The LOI policy includes operational level of service (LOS) standards. These standards are to be used by ODOT when making operating decisions (such as access management decisions) and when coordinating with local comprehensive planning. LOS standards range from LOS A (free flowing traffic) to LOS F (unacceptably high levels of congestion). The ODOT's objective is to maintain LOS at or above the listed standards. *The standards for US Highway 201, which is classified as a District Level of Importance, are as follows: LOS D for urban, urbanizing and rural development center areas; LOS C for rural areas; and, LOS E for Special Transportation Areas.* Special Transportation Areas are compact areas, such as central business districts, in which growth management consideration outweigh LOS policy considerations.

**Access Management Policy**

Several factors, including the number, spacing, type and location of accesses, intersections, and traffic signals have a significant effect on the capacity, speed, safety and general operational efficiency of highways. These factors need to be effectively managed in order to operate the highway system. Collectively these factors comprise access management.

The OHP Access Management policy provides a framework for making access decisions which will be consistent with the function and operating levels of service identified in the LOI Policy. It will be used by the ODOT to carry out its responsibilities for managing access under statutes and administrative rules. It will also be used by the OSHD to guide the design of highways and coordination with local comprehensive planning.
The OHP Access Management Policy standards are defined by roadway. These standards are intended to guide new development, not to retrofit existing facilities. There are six Access Management categories. **US Highway 201 within the City of Adrian is in Access Management Category 6.** Category 6 calls for partial control on District LOI facilities in Urban areas as follows:

- Intersections with Public Roads - at grade allowed with 500’ spacing;
- Intersections with Private Roads - Left or right turns allowed with 150’ spacing;
- Signal Spacing - 1/4 mile;
- Median Control - None.

c. **Oregon Benchmarks (1994)**

The Oregon Benchmarks (updated in 1994) is a planning guide used by all State agencies to track quality of life issues throughout the State. A number of transportation-related Benchmarks guide ODOT planning efforts addressing issues such as livable communities, improving transportation access options, access to alternative transportation modes, improving state highways, transit facilities, and air service, improvements to telecommunication networks.

d. **Oregon Aviation System Plan (1991)**

There is no airport within the City of Adrian. The nearest airport is in Ontario, 25 miles away.

e. **Oregon Rail Freight Plan (1994)**

The Nyssa-Homedale Railroad line goes through Adrian and a freight spur is available for freight pick-up and delivery.

f. **Oregon Rail Passenger Policy and Plan (1992)**

There is no passenger rail service in the City of Adrian.

g. **Section 1.6.7 - Oregon Transportation Safety Action Plan (1995)**

The Oregon Transportation Safety Action Plan (OTSAP) is the safety component of the OTP. The OTSAP identifies 70 specific actions which constitute a safety agenda to guide ODOT and the state over the next 20 years. Of the 70 actions, the following 11 respond to most traffic-related deaths and injuries or other key areas of concern:

- Develop a traffic law enforcement strategic plan;
- Seek a dedicated funding source for traffic law enforcement services and support needs;
- Continue a sustained research-based transportation safety public information/education program;
• Support the expansion of local transportation safety programs;
• Complete a strategic plan for traffic records improvements and establish a traffic records system that will serve the needs of state and local agencies;
• Recognize the prevalence of driving under the influence of a controlled substance and revise DUll standards;
• Pass legislation to establish 0.04 percent blood alcohol count (BAC) as the standard for measuring alcohol impairment for all drivers 21 years and over. Continue zero tolerance law for persons under 21;
• Establish and fund a statewide accident management program designed to minimize traffic congestion and secondary crashes by clearing incidents as quickly as possible;
• Ensure access to child safety seats to all young children;
• Develop and implement a comprehensive youth transportation safety strategy for youth to age 21; and
• Increase emphasis on programs that will encourage pedestrian travel and improve pedestrian safety.

h. Corridor Planning

Corridor Planning is a program to develop a long-range “vision” and plan for improving and managing the state transportation system. The program aims to assure consistency of land use plans and transportation plans in these corridors. Corridor planning will identify the functions and levels of service of each corridor, needed transportation facility and service improvements, transportation management actions, priorities for actions, and any changes in comprehensive land use plans needed to make transportation improvements and to protect the integrity of the transportation investments.

IDAHO PLANNING TRANSPORTATION EFFORTS

Malheur County borders on four Idaho counties: (from north to south) Washington County, Payette County, Canyon County and Owyhee County. There are a number of stateline crossings (e.g. US Highway 95 and Main Street/Yturri). A review of the Idaho Department of Transportation General Highway Maps suggests that most of the road classifications are the same or compatible with those established by Malheur County and ODOT.

FEDERAL TRANSPORTATION PLANNING REPORTS, CURRENT PLANNING EFFORTS AND RECENT AND FUTURE TRANSPORTATION IMPROVEMENTS

1. Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA)

ISTEA set maximum funding levels for federal-aid highway and transit programs through the fiscal year 1997. The funding levels set by ISTEA could be reduced by congress each year as part of the appropriation process and were proposed to increase significantly in later years of the act. For the City of Adrian, the prioritization of projects and funding would not change
significantly from past practice in that the City’s priorities must compete with statewide priorities and needs.

The major programs funded under ISTEA that applied to the City of Adrian include a - d, below:

a. National Highway System

Which includes the interstate system and other major highways. These other major highways are those routes designated in the Oregon Highway Plan as "statewide" significant routes.

b. Surface Transportation Program

Funds under this program can be used for any transportation project on any road except those classified as local or rural minor collector. The act sets aside 10% at this fund for safety improvements, 10% for transportation enhancement activities, 50% to be distributed to areas within the state based upon the states relative share of population between urbanized areas over 200,000 population and other areas, with the remaining 30% available to use in any area of the state.

c. Bridge Program

This program provides for inspection, maintenance, rehabilitation or replacement of bridges on any highway system.

d. Safety

As stated above, 10% of the surface Transportation Program funds are set aside for safety projects.

Although there are a number of other programs funded by ISTEA, such as Congestion Mitigation, IVHS and Mass Transit, these programs would generally not apply directly to the City of Adrian.

In order for any needed project to balance the transportation and land use requirements, a thorough description of each project as well as its benefits, estimated cost and alternatives must be prepared in order to compete with the statewide needs. In addition, potential funding sources must be identified for each project.

The enactment of the ISTEA began moving decision-making for federal programs to states and this program and other state policies incorporated in the Oregon Transportation Plan encourage reassessment of responsibilities and obligations for funding. These changing relationships have resulted in significant issues for state and local governments. There is no clear definition of state responsibility. At one time, the state operated on an informal consensus that it should provide
one-half the match on federally funded local and other projects that served statewide needs. No similar consensus seems to exist today. The state’s responsibility for transit, airports and other local transportation infrastructure and services is not clear.
Goals and Objectives

Adrian
Transportation System Plan
CHAPTER 3:
GOALS AND OBJECTIVES

The purpose of the TSP is to provide a guide for the City of Adrian to meet its transportation goals and objectives. The following goals and objectives were developed for the scope of work for this project. The goals were reviewed and amended as necessary by the stakeholders and decision makers. After the final goals were developed, each element in the plan was evaluated against these goals.

GOAL STATEMENT

The City of Adrian Transportation System Plan (TSP) shall meet all specifications and requirements set out in the 1995 DLCD Transportation Planning Rule (TPR) and the 1995 Oregon Department of Transportation (ODOT) Transportation Plan.

OVERALL TRANSPORTATION GOAL

Develop a transportation system that enhances the livability of the City of Adrian and accommodates growth and development through careful planning and management of existing and future transportation facilities.

Goal 1: Improve and enhance safety and traffic circulation

Objectives
- Develop an efficient road network
- Improve and maintain existing roadways and bridges
- Identify local problem spots and recommended solutions
- Work with ODOT to address speeding on Highway 201 in Adrian

Goal 2: Identify the 20-year roadway system needs to accommodate developing or undeveloped areas without undermining the agricultural character of the surrounding area.

Objectives
- Adopt policies and standards that address street connectivity, spacing and access management
- Coordinate rights-of-way and alignments between the City, County and State well in advance of street projects
- Improve access into and out of commercial and industrial areas
- Improve the access onto and off of arterial roadways to encourage growth
- Promote railroad freight service to reduce truck-related traffic
Goal 3: Preserve the function, level of service and safety of City streets.

Objectives:
- Develop access management standards
- Promote alternative modes of transportation
- Promote transportation system management
- Develop procedures to minimize impacts to and protect transportation facilities, corridors or sites during the development review process
- Promote railroad freight service

Goal 4: Increase the use of alternative modes of transportation (walking and bicycling) through improved access, safety and service.

Objectives
- Provide sidewalks and safe crossings on arterial and collector streets
- Provide appropriate bikeways
- Promote alternative modes through community awareness and education
Existing Transportation System

Adrian Transportation System Plan
CHAPTER 4: EXISTING TRANSPORTATION SYSTEM

A detailed assessment of the existing transportation system has been conducted for the City of Adrian. This section of Chapter 4 provides a summary of the existing system conditions within the City of Adrian, and includes the following:

- physical characteristics and existing traffic control measures on state highways, collectors and local roads;
- existing traffic volumes;
- existing traffic operations (levels-of-service) and safety characteristics of state highway facilities within the City;
- characteristics of existing pedestrian facilities;
- characteristics of existing bicycle facilities;
- existing public transit service; and
- existing rail, air, pipeline and waterway service.

Roadway Facilities

The transportation system in Adrian consists almost entirely of roadway facilities for motorized vehicles. As the foundation of the most significant portion of the transportation network, all roads within the Adrian Urban Growth Boundary (UGB) were driven to collect and verify inventory information. Appendix A lists the complete inventory information gathered through the Oregon Department of Transportation, Malheur County and the street inventory.

Functional Classification

Three roadway types have been identified within the City of Adrian: arterial, collector and local. Figure 4-1 illustrates the location of these facilities.
FIGURE 4-1

LEGEND

ROADS
- Arterial
- Collector
- Local

PUBLIC BUILDING
POST OFFICE
SCHOOL

URBAN GROWTH AREA/CITY LIMITS
STATE ROUTE
TERMINATION OF FA SYSTEM
CURB

SCALE 1"=1000'

0 800 1600 FEET

BASE MAP: OSOT TDB

Revised 2-10-98 M&G
Arterials

Arterials form the primary roadway network within and through a region. In Malheur County, arterials generally link major cities in the County with, and providing a connection between, urban areas outside the region, as well as serve area land uses. Within smaller cities, arterials act as conduits through town. These arterials often function as main streets, operating at low travel speeds with moderate to high interruptions to flow. In the City of Adrian, Highway 201 acts as this main thoroughfare, passing through the commercial center and connecting Adrian with Nyssa to the north, Idaho and eventually Jordan Valley to the south.

Collectors

In Malheur County, collectors connect other collectors and local roads to urban centers or to interstate, major arterial or minor arterial facilities. Collectors perform an analogous function in smaller cities, serving traffic between local roads and activity centers or arterial streets. Adrian has three collector roads: Emerald Slope Road, Main Street and Fifth Street/Otis Road to its east.

Local Roads

Local roads allow private residences and businesses to access any other type of roadway facility, except the interstate. In the City of Adrian, local roads connect local residents with the arterial and collectors described previously, as well as with significant destinations, such as schools.

State Highways

Highway 201 provides the primary route between the City of Adrian and other Malheur County urban areas. Although the County is neither responsible for, nor owns or maintains this roadway, it functions as part of the foundation of County transportation and supports commercial and industrial development in Adrian.

Highway 201 in Adrian passes through the three-block commercial center of town, with development along the highway’s east side and the Union Pacific railroad to its west. This two-lane facility has a posted speed of 30 mph.

Other Roadways

The majority of roads in Adrian are maintained by the Nyssa Road District of Malheur County and serve local traffic. Emerald Slope Road, a collector, connects the agricultural community west of Adrian with the City and provides farm-to-market access. Main Street and northern Fifth Street channel residential traffic in and near eastern Adrian to its commercial center and to Highway 201. Each of these collectors is a two-lane facility with posted speeds of 25 mph. The remaining, local roads directly access housing and are generally paved with no curbs, thereby
allowing for residential parking along their undesignated shoulders. The posted speed on these roads is 25 mph.

Existing Traffic Control

Traffic control in the City of Adrian consists of stop signs on minor street approaches at significant intersections. These intersections occur along arterial and collector streets, as well as along Main Street and Oregon Street. Emerald Slope Road on either approach to the Union Pacific Railroad also has painted stop bars and crossbuck signs.

Pavement Condition

Pavement conditions vary on roads within the City of Adrian. As with facilities in greater Malheur County, inventoried roadways have been classified as having Very Good, Good, Fair, Poor or Very Poor pavement, as shown in Table 4-1. No roads in Adrian exhibit Very Good conditions. The majority of pavement on city roads ranges from Good to Fair conditions, with a significant portion of roads falling into the categories Poor and Very Poor conditions.

Bridges

There are no public bridges in the City of Adrian.

Traffic Volumes

Traffic volume along Highway 201 through the City of Adrian in 1996 are shown in Table 4-2. Traffic counts along other facilities in Adrian, are estimated to range from 200-400 vehicles per day on collectors to less than 200 vehicles per day on local roads.

Traffic Safety

A summary of the reported accidents on State highway facilities in the study area over a five-year period (January 1992 to December 1996) was assembled from ODOT records and is described below.

According to ODOT, only one accident occurred on Highway 201 within Adrian City Limits. The turning movement accident took place in August, 1995 just south of High Street and resulted in no personal injury. The accident rate along Highway 201 in Adrian is ~0.7 accidents/per million vehicle miles, indicating that this segment of the Highway does not have significant traffic safety problems.
<table>
<thead>
<tr>
<th>Road</th>
<th>From</th>
<th>To</th>
<th>Pavement Type</th>
<th>Pavement Condition (1)</th>
<th>Roadway Width (m)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fifth St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td>X</td>
<td>2</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Oregon St</td>
<td>Main St</td>
<td>X</td>
<td>4</td>
<td>14</td>
</tr>
<tr>
<td>Fourth St</td>
<td>Washington St</td>
<td>Main St</td>
<td>X</td>
<td>4</td>
<td>14</td>
</tr>
<tr>
<td>High St</td>
<td>Hwy 201</td>
<td>end (E)</td>
<td>X</td>
<td>2</td>
<td>12</td>
</tr>
<tr>
<td>Holly Ln</td>
<td>Main St</td>
<td>end (S)</td>
<td>X</td>
<td></td>
<td>12</td>
</tr>
<tr>
<td>Hwy 201</td>
<td>City Limit (N)</td>
<td>City Limit (S)</td>
<td>X</td>
<td>3</td>
<td>22-46</td>
</tr>
<tr>
<td>Main St</td>
<td>Hwy 201</td>
<td>Fifth St</td>
<td>X</td>
<td>2</td>
<td>18</td>
</tr>
<tr>
<td>Oregon St</td>
<td>Hwy 201</td>
<td>Third St</td>
<td>X</td>
<td>3</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Third St</td>
<td>Fourth St</td>
<td>X</td>
<td>2</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Fourth St</td>
<td>Fifth St</td>
<td>X</td>
<td>3</td>
<td>14</td>
</tr>
<tr>
<td>Otis Rd</td>
<td>5th St</td>
<td>City Limit</td>
<td>X</td>
<td>4</td>
<td>12</td>
</tr>
<tr>
<td>Owyhee St</td>
<td>Hwy 201</td>
<td>Second St</td>
<td>X</td>
<td>4</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Second St</td>
<td>Third St</td>
<td>X</td>
<td>2</td>
<td>14</td>
</tr>
<tr>
<td>Parker Ln</td>
<td>Hwy 201</td>
<td>end (E)</td>
<td>X</td>
<td>3</td>
<td>16</td>
</tr>
<tr>
<td>Second St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td>X</td>
<td>2</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Main St</td>
<td>Owyhee St</td>
<td>X</td>
<td>5</td>
<td>22</td>
</tr>
<tr>
<td>Emerald Slope</td>
<td>Emerald Slope Spur</td>
<td>Hwy 201</td>
<td>X</td>
<td>2</td>
<td>14</td>
</tr>
<tr>
<td>Slope Rd Spur</td>
<td>Slope Rd</td>
<td>end (S)</td>
<td>X</td>
<td>3</td>
<td>12</td>
</tr>
<tr>
<td>Third St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td>X</td>
<td>3</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Oregon St</td>
<td>Owyhee St</td>
<td>X</td>
<td>4</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Owyhee St</td>
<td>High St</td>
<td>X</td>
<td>(2)</td>
<td>(2)</td>
</tr>
<tr>
<td>Washington St</td>
<td>Hwy 201</td>
<td>Second St</td>
<td>X</td>
<td>3</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Second St</td>
<td>Fifth St</td>
<td>X</td>
<td>4</td>
<td>14</td>
</tr>
<tr>
<td>Well Rd</td>
<td>Emerald Slope Spur</td>
<td>end (N)</td>
<td>X</td>
<td>2</td>
<td>16</td>
</tr>
</tbody>
</table>

(1) 1 - Very Good  
2 - Good  
3 - Fair  
4 - Poor  
5 - Very Poor  

(2) The roadway was under construction at the time of inventory.
Table 4-2
City Of Adrian 1996 Average Daily Traffic Volumes On Highway 201

<table>
<thead>
<tr>
<th>Location</th>
<th>Milepost</th>
<th>Average Daily Traffic</th>
</tr>
</thead>
<tbody>
<tr>
<td>North City Limits</td>
<td>11.72</td>
<td>1500</td>
</tr>
<tr>
<td>0.01 miles north of High Street</td>
<td>11.77</td>
<td>1600</td>
</tr>
<tr>
<td>0.01 miles north of Main Street</td>
<td>11.97</td>
<td>1700</td>
</tr>
<tr>
<td>0.01 miles north of Washington Street</td>
<td>12.11</td>
<td>1700</td>
</tr>
<tr>
<td>South City Limits</td>
<td>12.23</td>
<td>1300</td>
</tr>
</tbody>
</table>

Although accident data for other roads in the City of Adrian is not available for analysis, it is unlikely that collector or local roads have significant safety problems. Volumes on these facilities are low, substantially reducing the opportunity for accidents.

Pedestrian Facilities

Pedestrian travel occurs throughout the City of Adrian between residences and schools, commercial areas, public service buildings and churches. Existing pedestrian generators and facilities are shown in Figure 4-2.

Because of the low volume and low speeds of traffic along the local and collector roads, they generally warrant no separate pedestrian facilities. Highway 201, however, experiences higher volumes of traffic, traveling at approximately 35 mph. The residential and commercial areas of Adrian lie almost entirely to the east of Highway 201, although some businesses also lie on the west between the highway and the railroad. Along the east side of Highway 201, only one of three commercially developed blocks contains sidewalks. These are shown in Figure 4-2.

Bicycle Facilities

Bicycle travel in the City of Adrian generally occurs along the same routes as pedestrian travel. Again, because of the low volume and low speeds of traffic along all roads except Highway 201, separate bicycle travel facilities would not significantly impact safety: bicyclists typically share through-travel lanes with motorized vehicles in a fairly safe environment.

Highway 201 experiences heavier traffic than the rest of the City streets. Between Main Street and Washington Street through Adrian’s commercial center, an 11-foot, paved shoulder exists, which can accommodate bicycles and thereby remove them from the stream of motorized vehicles. Highway 201 north of Main Street and south of Washington Street does not have paved shoulders.
Public Transportation

The City of Adrian supports no public transportation system. However, Boise/Winnemucca Trailways runs one round-trip bus daily between Boise and Reno with stops in Jordan Valley and McDermitt. Additionally, there are paratransit providers based in the Treasure Valley area which provide services to the area residents including:

- The Oregon State Department of Human Resources Volunteer Program provides rides for residents of Malheur County; and
- Malheur County Transportation Service has accessible van which is driven by volunteers and is used to take people (elderly and disabled) to the doctor.

Rail Service

The City of Adrian lies on a spur railroad owned by Union Pacific.

Air Transportation

The City of Adrian contains no airports. Chapter 4, Existing Transportation System, describes nearby air transportation facilities within and near Malheur County.

Waterways

The City of Adrian lies adjacent to the Snake River and supports no waterborne transportation services. The river and nearby Deer Flat Wildlife Refuge, however, provide ample opportunity for recreational use.

Pipeline

The City of Adrian contains no pipeline infrastructure.
Impacts of Growth and Future Needs

Adrian Transportation System Plan
CHAPTER 5:
IMPACTS OF GROWTH AND FUTURE TRANSPORTATION FACILITY NEEDS

The City of Adrian’s future transportation facility needs presented in this Chapter are based on several factors: historic and projected population change, historic and projected economic change, and historic and projected traffic growth on the state highways.

POPULATION

Land use and population change are key factors in projecting future facility needs. However, preparing accurate projections in a small community such as Adrian can be challenging. As Figure 5-1 illustrates, historically Adrian has experienced significant population shifts. The 1980 Adrian Comprehensive Plan noted from incorporation in 1972 to 1974, Adrian’s population increased, peaking at 180 people. Table 5-1, below, shows the city and county’s population from 1970 to 1996 as well as the percent change between 1990 and 1996. As this table shows, after declining for a number of years, the City of Adrian’s population now appears to be slowly increasing.

![Figure 5-1: City of Adrian Population, 1970-1996](image)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>City</td>
<td>NA</td>
<td>155</td>
<td>162</td>
<td>131</td>
<td>135</td>
<td></td>
<td>3.05%</td>
</tr>
<tr>
<td>County</td>
<td>22,764</td>
<td>23,169</td>
<td>26,896</td>
<td>26,038</td>
<td>28,700</td>
<td></td>
<td>10.22%</td>
</tr>
</tbody>
</table>

* City of Adrian incorporated in 1972.

1 All data from Oregon Economic Development Department, current and valid as of 9/8/97, except 1970 population which is from the Center for Population Research and Census, Oregon State University.
As Figure 5-2 shows, the largest single age group in Adrian in 1990 was 45-64 year olds. However, the three age groups that generally contain the most transportation-disadvantaged individuals (age 65 and over, under 5 years, and 5-19 years) together represented 39 percent of the population in 1990.²

Malheur County, together with the incorporated cities, has developed growth projections for the year 2015. Table 5-2 identifies the 2015 projection for Adrian and Malheur County. Intermediate year projections are based on the 1995-2015 average annual growth rate (compounded). As this table shows, Adrian is forecast to continue to grow slowly through the next 18 years to reach a population of 143 by the year 2015.

Table 5-2:
Population Estimates, Forecasts
And Average Annual Growth Rate, 1995-2015

<table>
<thead>
<tr>
<th>Jurisdiction</th>
<th>1995</th>
<th>2000</th>
<th>2005</th>
<th>2010</th>
<th>2015</th>
<th>Average Annual Growth Rate (compounded)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adrian</td>
<td>130</td>
<td>131</td>
<td>136</td>
<td>140</td>
<td>143</td>
<td>0.48%</td>
</tr>
<tr>
<td>Co. Total</td>
<td>28,305</td>
<td>30,122</td>
<td>32,079</td>
<td>34,189</td>
<td>36,466</td>
<td>1.27%</td>
</tr>
</tbody>
</table>

² Oregon Economic Development Department data, current and valid as of 9/8/97.
³ Center for Population Research and Census, Portland State University.
⁴ Forecast based on estimated growth rate.
⁵ 2015 forecast as agreed upon by Malheur County, City of Ontario, and DLCD.
⁶ Average annual growth rates based on 1995 present values, 2015 future values, and 20 year timeframe.
Employment forecasts and patterns can also affect future traffic volumes. According to the Oregon Economic Development Department, the city had a 1990 total employment of 47 persons. The largest single local employer was the Adrian School District with 54 people. This is reflected by Figure 5-3 which identifies educational services as one of the largest employment sectors.

**TRAFFIC VOLUMES**

Projected traffic volumes are based on both the population and land use factors described above as well as the historic traffic volumes described below. Traffic volumes on southern Malheur County highways have historically grown very slowly and this trend is expected to continue. This forecast for continued gradual growth is also reflected by the population projection for Adrian. Table 5-4 identifies the projected traffic volumes on Highway 201 in Adrian. While traffic volume data is not available for local streets, it is likely that traffic volumes on local streets will also follow the same trend, increasing at approximately 1% per year.

<table>
<thead>
<tr>
<th>Location</th>
<th>Milepost</th>
<th>1996 ADT</th>
<th>2017 ADT</th>
</tr>
</thead>
<tbody>
<tr>
<td>North City Limits</td>
<td>11.72</td>
<td>1,500</td>
<td>1,833</td>
</tr>
<tr>
<td>0.01 miles north of High Street</td>
<td>11.77</td>
<td>1,600</td>
<td>1,955</td>
</tr>
<tr>
<td>0.01 miles north of Main Street</td>
<td>11.97</td>
<td>1,700</td>
<td>2,078</td>
</tr>
<tr>
<td>0.01 miles north of Washington Street</td>
<td>12.11</td>
<td>1,700</td>
<td>2,078</td>
</tr>
<tr>
<td>South City Limits</td>
<td>12.23</td>
<td>1,300</td>
<td>1,589</td>
</tr>
</tbody>
</table>

**Seasonal Variations**

Time of year may affect the amount of traffic on a roadway system, for example tourism, harvest and closure due to snow or flooding are generally seasonal events. While monthly traffic data is not available for Highway 201, it is likely that it experiences a seasonal impact similar to other highways in Malheur County. For example, on US Highway 95 at Basque Station traffic...
volumes are at their lowest (70% of the annual ADT) during January and February and at their highest during June and July (121% of the annual ADT).

In the City of Adrian the school may also play a role in creating seasonal variations in the traffic flow. With 325 students and 54 employees, the school is the largest single traffic generator in town; and thus, the start and end of the school year may significantly affect traffic volumes within Adrian.

Level of Service (LOS) Impacts

As discussed previously, gradual increases in daily traffic are expected through the year 2017 on Highway 201 and Adrian’s local street system. The LOS on those section of Highway 201 within Adrian is expected to remain satisfactory (LOS A/B) through the next 20 years and all other roadways in the study area are expected to maintain acceptable LOS throughout the twenty year planning period as well.

FUTURE FACILITY NEEDS

Based on the travel demand forecast, outstanding safety issues (as described in Chapter 4, Existing Transportation System), the special needs of the transportation-disadvantaged (e.g., the elderly and disabled), as well public input, the following needs have been identified:

Roadway
- Work with ODOT to reduce traffic speed on Highway 201;
- Improve street lighting where appropriate;
- Repair pavement in poor or failing condition; and
- Improve access management in Highway 201 corridor.

Bus/Rail
- Improve intercity passenger bus and/or rail service;
- Enhance rideshare opportunities for commuters through the Boise Rideshare program; and
- Better meet the local and regional transportation needs of the transportation-disadvantaged.

Bicycle/Pedestrian
- Extend and improve pedestrian/bicycle facilities in downtown commercial core.
CHAPTER 6:
ALTERNATIVES ANALYSIS

As required by the Oregon Transportation Planning Rule, transportation alternatives were developed and explored for the Adrian Transportation System Plan. The alternatives reflect the various potential project options which might be considered for inclusion in the final TSP (Chapter 7). The alternatives were developed in order to address the goals and objectives identified in Chapter 3.

The potential transportation system improvements described in this chapter were each developed to address specific problems or concerns. Table 6-1, below, identifies all of the potential transportation system improvements evaluated during the TSP development process and their relationship to the goals identified in Chapter 3.

Table 6-1
Transportation Planning Goals and Potential Transportation Improvement Projects

<table>
<thead>
<tr>
<th>Goal</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Improve and enhance safety and traffic circulation on Highway 201 in Adrian</td>
</tr>
<tr>
<td>2</td>
<td>Identify the 20-year roadway system needs to accommodate developing or undeveloped areas without undermining the agricultural character of the surrounding area</td>
</tr>
<tr>
<td>3</td>
<td>Preserve the function, level of service, and safety of City Streets</td>
</tr>
<tr>
<td>4</td>
<td>Increase the use of alternative modes of transportation (walking and bicycling) through improved access, safety, and services</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Project</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Implement measures to reduce speeding on Highway 201 in Adrian</td>
</tr>
<tr>
<td>2</td>
<td>Adopt and implement access management for Highway 201 in Adrian</td>
</tr>
<tr>
<td>3</td>
<td>Adopt and implement a street classification and design program</td>
</tr>
<tr>
<td>4</td>
<td>Repair pavement in poor or very poor condition</td>
</tr>
<tr>
<td>5</td>
<td>Extend and improve pedestrian/bicycle facilities in downtown commercial area</td>
</tr>
<tr>
<td>6</td>
<td>Increase availability and usage of public transportation and ridesharing</td>
</tr>
</tbody>
</table>

EVALUATION OF POTENTIAL PROJECTS

Each of the potential transportation system improvements was qualitatively evaluated based on its effectiveness at meeting the transportation planning goals identified in Chapter 3, its safety, environmental, socioeconomic and land use impacts, as well as its financial feasibility.
Project 1: Implement measures to reduce speeding on Highway 201 in Adrian

Speeding on Highway 201 has been identified as a concern in Adrian. Various measures could be implemented that would discourage motorists from exceeding the posted speed limit. These include:

- Physical measures such as speed bumps, road humps, rumble strips, median barriers, traffic circles and road narrowing;
- Passive measures such as stop signs and speed limit signs;
- Police enforcement, crosswalks, and bicycle lanes.

Implementation of some of these measures may not be desirable, as they would conflict with other transportation goals and may create significant problems. For example, speed bumps, while effective at reducing traffic can create a safety hazard, increase noise, and cause problems for snowplows. However, it is likely that a combination of appropriate measures could increase speed limit compliance in Adrian; therefore, the city should work with ODOT to develop a speed control system for Highway 201. The project cost is likely minimal, and can be borne through ODOT’s regular maintenance program.

Project 2: Adopt and implement access management standards for all arterials in Adrian

Access management is an important tool for maintaining the efficiency and safety of a transportation system. Too many access points can diminish the functionality of an arterial, by creating delays and hazards due to turning movements. Currently Highway 201 is the only arterial roadway in Adrian. Improved access management has been raised as an issue in the TPR and adopting standards is an objective under both Goals 2 and 3 in Chapter 3.

The 1991 Oregon Highway Plan specifies an access management classification system for state facilities. Although the City of Adrian may designate state highways as arterial roadways within its transportation systems, the access management categories for these facilities should generally follow the guidelines of the Oregon Highway Plan. Highway 201 is currently designated as a highway of statewide importance. This designation permits: at-grade or interchanges with 500’ mile spacing for intersections with public roads, left or right turns with 150’ spacing for intersections with private roads, signal spacing of 1/4 mile, and no median control.

While the access management described above can be applied to some portions of Highway 201 within the city limits, in the developed, downtown core the spacing distances may be excessive. Shorter block lengths and a well-developed grid system are important to small cities, along with convenient and safe pedestrian facilities. To address this issue, the Oregon Highway Plan allows for the designation of Special Transportation Area (STA) for compact areas in which growth management considerations outweigh the need to limit access. STA can include central business districts, however, they do not apply to whole cities or strip development areas along individual highway corridors.
In Adrian, an STA is recommended on Highway 201 from Washington Street to High Street. To accommodate a compact development pattern and the existing public roadway spacing and to allow reasonable access spacing for private driveways, less restrictive access standards are recommended for this downtown section. Within the STA, access standards should allow intersection spacing at a minimum of 250 feet and driveway spacing at a minimum of 100 feet.

**Project 3: Adopt and Implement a street classification and design program**

The function of a street is determined by operational characteristics such as traffic volume and capacity. By classifying streets according to their function, the City of Adrian can provide for consistency in construction, operation and maintenance. These classifications should be reflected in street design standards which link the design of the street to its function. Street design standards should establish desired street widths and amenities (e.g. sidewalks, bike lanes) for the various street classifications at a scale appropriate for the City of Adrian. Adoption of a TSP which includes street classification and design standards will allow the City of Adrian to implement this program.

**Project 4: Repair pavement in poor or very poor condition**

Pavement conditions on streets within Adrian were identified in Chapter 4. The street sections with pavement in “very poor” or “poor” condition are shown in Table 6-2 as well as a rough estimate of the repair costs.

<table>
<thead>
<tr>
<th>Table 6-2</th>
<th>Recommended Pavement Improvements</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Very Poor Condition</strong></td>
<td><strong>Length</strong></td>
</tr>
<tr>
<td>Second St. from Main St. to Owyhee St.</td>
<td>300'</td>
</tr>
<tr>
<td>Subtotal</td>
<td></td>
</tr>
<tr>
<td><strong>Poor Condition</strong></td>
<td><strong>Length</strong></td>
</tr>
<tr>
<td>Fifth St. from Oregon St. to Main St.</td>
<td>300'</td>
</tr>
<tr>
<td>Fourth St. from Washington St. to Main St.</td>
<td>600'</td>
</tr>
<tr>
<td>Otis Rd. from Fifth St. to City Limit</td>
<td>800'</td>
</tr>
<tr>
<td>Owyhee St. from Highway 201 to Second St.</td>
<td>300'</td>
</tr>
<tr>
<td>Third St. from Oregon St. to Owyhee St.</td>
<td>700'</td>
</tr>
<tr>
<td>Washington St. from Second St. to Fifth St.</td>
<td>1000'</td>
</tr>
<tr>
<td>Subtotal</td>
<td></td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td></td>
</tr>
</tbody>
</table>

* Based on planning cost estimates for 2” pavement overlay.
It is recommended that the City of Adrian coordinate with the Nyssa Road Districts to schedule the repair of roads in “Very Poor” condition within the next five year timeframe at a cost of $8,700; and those with “Poor” condition within the next ten years at a cost of $80,700. This recommended schedule should be modified based on factors such as traffic volumes and funding availability.

Project 5: Extend and improve pedestrian/bicycle facilities in downtown commercial area

Providing a safe, pedestrian-friendly environment is a key factor in creating a successful small town environment. Pedestrian safety on Highway 201 has long been a concern in Adrian. Sidewalks should be considered on the east side of Highway 201 from High Street to Washington Street; on Main Street from Highway 201 to Third Street; on Owyhee Street from Highway 201 to Third Street, and on High Street from Highway 201 to Third Street. Costs for these projects are estimated at $194,000.

Project 6: Increase availability and usage of public transportation and ridesharing

Malheur County is responsible under state law for administration of the Special Transportation Fund program in Malheur County. This program, which is funded by cigarette tax moneys, is intended to provide transportation services to the elderly and disabled. Statewide 75% of the available funds are distributed by formula (for FY 1998 Malheur County received $34,533) and the remaining 25% are discretionary funds available through a competitive grant program. Generally, the discretionary funds are used for capital purchases (e.g., new vehicles) with the other moneys going to operations.

Currently, Malheur County provides limited Dial-a-Ride service for the elderly and disabled. Some limited public transportation service is also provided the City of Ontario, the Department of Human Resources, Malheur Council on Aging, Nyssa Senior Center, Ontario Senior Center, and Vale Senior Center. However, service in the Adrian area is extremely limited. In order to increase available service, Adrian should work with ODOT and the County to either develop a new senior van program or extend the services of an existing provider. Additional opportunities may also exist through enhanced interstate coordination to provide improved service in conjunction with nearby Idaho jurisdictions.

SUMMARY

Table 6-3, below, summarizes the project option recommendations described in this chapter. Chapter 7 goes into greater detail about how the recommended project options will fit into the modal plans for the City of Adrian.
<table>
<thead>
<tr>
<th>Option</th>
<th>Recommendation</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Implement measures to reduce speeding on Highway 201 in Adrian</td>
<td>Implement, ODOT has jurisdiction</td>
<td>TBD</td>
</tr>
<tr>
<td>2. Adopt and implement access management for Highway 201 in Adrian</td>
<td>Implement</td>
<td>Low Cost</td>
</tr>
<tr>
<td>3. Adopt and implement a street classification and design program</td>
<td>Implement, partner with ODOT</td>
<td>Low Cost</td>
</tr>
<tr>
<td>4. Repair pavement in poor or very poor condition</td>
<td>Implement</td>
<td>$89,400</td>
</tr>
<tr>
<td>5. Extend and improve pedestrian/bicycle facilities in downtown</td>
<td>Implement</td>
<td>$194,000</td>
</tr>
<tr>
<td>6. Increase availability and usage of public transportation and ridesharing</td>
<td>Implement</td>
<td>TBD</td>
</tr>
</tbody>
</table>
CHAPTER 7:  
TRANSPORTATION SYSTEM PLAN 

INTRODUCTION 

The City of Adrian TSP includes separate elements for each travel mode within the city: Street, Pedestrian, Bikeway, Public Transportation, Rail Service, Air Service, Pipeline Service and Waterway Transportation plans. The analysis and evaluation of six project options was summarized in Chapter 6. Based on the recommended project options that resulted from that analysis and an update provided in 2001, a number of transportation system plan and project improvements are identified and summarized as part of this chapter. Other components of the TSP include transportation policies and standards to effectively guide plan development. These include street design standards, functional classification and access management. 

RECOMMENDED STREET STANDARDS 

Street Standards 

Street standards link the design of a street to its function. Function is determined by operational characteristics (e.g., traffic volume, operating speed, safety, and capacity). Street design standards help guide the development of streets which are both safe and consistent. Additionally, they simplify the administrative process associated with the planning and construction of a new street. The development of the City of Adrian TSP provides the City with an opportunity to review and revise street design standards to more closely fit with the functional street classification and the goals and objectives of the TSP. Street design standards are based on local needs, experience, policies and publications of the profession. Revised street standards are illustrated in Figure 7-1 and summarized in Table 7-1, below. 

<table>
<thead>
<tr>
<th>Classification</th>
<th>Minimum Right-of-Way Width</th>
<th>Minimum Improvement Width</th>
</tr>
</thead>
<tbody>
<tr>
<td>Arterial</td>
<td>60-80 feet</td>
<td>36 feet</td>
</tr>
<tr>
<td>Collector &amp; Local Street</td>
<td>40 feet</td>
<td>28 feet</td>
</tr>
<tr>
<td>Alley</td>
<td>20 feet</td>
<td>15 feet</td>
</tr>
</tbody>
</table>

Table 7-1 
Recommended Street Design Standards
Functional Classification

The City of Adrian streets and highways should be classified according to their function, providing for consistency in construction, operation and maintenance. The functional hierarchy of streets provides: grouping of roads and highways by the service they provide; facility definitions to handle different desired levels of access and mobility; an understanding of how a street is being used; and, guidelines on how roads are to be designed. The function of the street within the street system and the types and intensities of land use along their routes are other important factors in their appropriate designation.

**Arterial Streets** provide linkage between population centers within the region and connection to state and national highways, serving primarily through traffic with limited access. Delays are generally associated with the inability to pass on two-lane highways as opposed to heavy volume. Within the City of Adrian, Highway 201 is the only arterial street. (See Figure 7-2).

New or improved arterials should include two 12 foot wide travel lanes, two 6 foot wide bike lanes, two 8 foot wide parking strip (optional), two 5 foot wide planted strips (optional) and two 6 foot wide sidewalks. Generally, new or improved arterials also include curbs and gutters.

**Collector Streets** provide both local access and circulation within the City, distributing trips from the arterials through the area to their ultimate destinations, often serving abutting uses directly. Unlike arterials, access control may not be required. Currently, within the City of Adrian, there are no collector streets.

New or improved collectors should include a minimum 14 foot wide travel lane with 7 foot parallel parking on both sides and two 6 foot wide sidewalks. A drainage swale can be provided between the parking and the sidewalk.

**Local Streets** have the primary function of providing access to immediately adjacent land and serve little or no through traffic. They are generally narrower than collector streets. Currently, within the City of Adrian, all streets other than Highway 201 are local streets. (See Figure 7-2).

New or improved local streets should include a minimum 14 foot travel lane with 7 foot parallel parking on both sides and two 6 foot wide sidewalks. A drainage swale can be provided between the parking and the sidewalk.

**Bike Lanes.** For the most part, collector and local streets in small towns such as Adrian do not require separate bikeway facilities. Bicyclists can generally be accommodated on the shared street or on a shoulder, depending on traffic volumes on arterials particularly. However, on arterials, particularly in areas with higher bicycle use, striping the shoulder for a bicycle lane may be appropriate.
Sidewalks. Sidewalks are recommended for all street classifications in Adrian. The compact size of the town makes walking a viable alternative mode which should be encourage with the provision of a safe and complete pedestrian circulation system. Sidewalks are particularly important in areas with higher pedestrian activity and traffic volumes (e.g., Highway 201 in downtown Adrian). For new streets outside the developed area of the city, the city may wish to consider allowing sidewalk exceptions, if pedestrians can safely share an improved shoulder of the street with bicyclists.

Access Management Plan

The TPR defines access management as measures regulating access to streets, roads and highways from public roads and private driveways and requires that new connections to arterials and state highways be consistent with designated access management categories. As the City of Adrian continues to develop, the arterial/collector/local street system will become more heavily used and relied upon for a variety of travel needs. As such, it will become increasingly important to manage access on the existing and future arterial/collector street system as new development occurs.

It should be noted that existing developments and accesses on the transportation network will not be affected by the recommended access management techniques until either a land use action is proposed, a safety or capacity deficiency is identified that requires specific mitigation, or a major construction project is begun on the street.

Experience throughout the United States has shown that a well managed access plan for a street system can:

- minimize the number of potential conflicts between all users of the street system, and hence provide safer and more efficient traffic operations
- minimize local cost for transportation improvements needed to provide additional capacity and/or access improvements along unmanaged roadways

One objective of the Adrian TSP is to develop an access management policy that maintains and enhances the integrity (capacity, safety, and level-of-service) of the city's streets. Too many access points along a street can contribute to deterioration its safety, and on some streets, can interfere with efficient traffic flow.

Table 7-2 provides general access management guidelines for each of the street classifications. General access management techniques can include restricting the spacing of private driveways based on the type of development. Or, the city could consider offsetting driveways to minimize the number of conflict points between traffic using driveways and public streets. Additional access management strategies are embedded in Adrian's recommended development ordinances, which already restrict development to appropriate zones and consider the effect of development on the existing transportation network.
Access management is important to promoting safe and efficient travel for both local and long distance users along State Highway 201 in the City of Adrian. The 1999 Oregon Highway Plan specifies an access management spacing standards and policies for state facilities. Although the City of Adrian may designate state highways as arterial roadways within their transportation system, access management for these facilities follows the Access Management Spacing Standards of the 1999 Oregon Highway Plan. These spacing standards are based on highway classification, type of area and speed, which are shown in the appendix to this document. This section of the TSP describes the state highway access management objectives and specific highway segment where special access spacing standards apply.

General

Highway 201 through the City of Adrian is categorized in the 1999 Oregon Highway Plan as a Regional Highway. The primary function of these highways is to provide connections to larger urban areas, ports, and major recreation areas of the state not served by freeways. The management objective of Statewide urban highways is to provide high to moderate speed operations with limited interruptions in traffic flow.

To assist in implementing state access management standards and policies, the 1999 Oregon Highway Plan also recognizes that state highways serve as main streets of many communities, such as downtown Adrian. Shorter block lengths and a well-developed grid system are important to a downtown area, along with convenient and safe pedestrian facilities. In general, downtown commercial arterial streets typically have blocks 200 to 400 feet long, driveway access sometimes as close as 100-foot intervals and occasionally, crosswalks, along with on street parking. The need to maintain these typical downtown characteristics must be carefully considered along with the need to maintain the safe and efficient movement of through traffic. The Oregon Highway Plan recognizes the main street function through the designation of Special Transportation Areas (STAs).

Special Transportation Area

A Special Transportation Area (STA) is a designation that may be applied to a state highway, when a downtown, business district or community center straddles the state highway within a community’s urban growth boundary. STAs can include central business districts but they do not apply to whole cities or strip development areas along individual highway corridors.

The primary objective of a STA is to provide access to community activities, businesses and residences, and to accommodate pedestrian, and bicycle movements along and across the highway in a compact central business district. A STA designation will allow reduced mobility standards, accommodate existing public street spacing and compact- development patterns, and enhance opportunities to provide improvements for pedestrians and bicyclists in the downtown area. Inclusion in a STA allows for redevelopment with exception to the proposed access management standards.
Access management in STAs corresponds to the existing city block for public road connections and discourages private driveways. However, where driveways are allowed and land use patterns permit, the minimum spacing for driveways is 175 feet or mid-block if the current city block spacing is less than 350 feet. In addition, the need for local street connections may outweigh the consideration of maintaining highway mobility within a STA.

In Adrian, the area along Highway 201 between Owyhee Street (M.P. 11.91) and Washington Street (M.P. 12.10) exemplifies the design features of a historic downtown. Within this three-block segment, buildings are spaced close together, parking is on street, and the posted speed limit is 30 m.p.h. The compact development pattern qualifies this area for a STA highway segment designation.

Upon adoption of the TSP by the Adrian City Council and a finding of compliance with the Oregon Highway Plan, the City of Adrian and ODOT Region 5 may jointly designate this segment of Highway 201 as an STA through a Memorandum of Understanding (MOU). The MOU will incorporate by reference the TSP and the following STA Management Plan provisions.

**Special Transportation Area Management Plan**

The Adrian STA is located on the portion of Highway 201 between the intersections of Owyhee Street (M.P. 11.91) and Washington Street (M.P. 12.10), which is located completely within the urban growth boundary and city limits of the City of Adrian.

The primary objective of the Adrian STA is to provide access to community activities, businesses and residences, and to accommodate pedestrian, and bicycle movements along and across the highway in the city’s central business district.

The designation of an STA in Adrian is intended to accommodate the existing public street spacing and compact development pattern. Specific access management conditions for the Adrian STA on Highway 201 include:

a) Minimum spacing for public road connections at the current city block spacing of approximately 250 feet.

b) Public road connections are preferred over private driveways. Private driveways are discouraged in an STA.

c) Where land use patterns permit, ODOT will work with the City and property owners to identify appropriate access to adjacent property owners within the STA.

d) Where a right to access exists, access will be allowed to property at less than the designated spacing standard only if the property does not have reasonable alternative. If possible, other options should be considered, such as joint access.

e) Where a right to access exists, the number of driveways to a single property shall be limited to one. ODOT will work with the City and property owners if additional driveways are
necessary to accommodate and service the traffic to the property, and will not interfere with
driver expectancy and the safety of through traffic on the highway.

f) Driveways shall be located where they do not create undue interference or hazard to the free
movement of normal highway or pedestrian traffic. Locations in areas of restricted sight
distance or at points that interfere with the placement and proper functioning of traffic control
signs, lighting or other devices that affect traffic operation will not be permitted.

g) If a property is landlocked (no reasonable alternative exists) because a driveway cannot be
safely constructed and operated and all other alternatives have been explored and rejected,
ODOT might be required to purchase the property. However, if a hardship is self-inflicted,
such as by partitioning or subdividing a property, ODOT has no responsibility for purchasing
the property.

Today, traffic on the state highway operates at LOS A/B or better. Increase in traffic volumes
over the 20 year projection period will not impact the level-of-service (LOS) or meet the
maximum volume to capacity ratio of 0.80 for Highway 201 within the city’s urban growth
boundary.

To maintain highway mobility through a STA in Adrian, land use development decisions (within
the urban growth boundary) shall not cause traffic flow to exceed a volume to capacity ratio of
0.80. The posted speed limit in the STA is currently 30 mph and will remain at 30 or 25 miles
per hour as allowed by state statute in a business district. Curb (parallel) parking is permitted in
the STA, provided minimum sight distance requirements are met for all public road connections
and private driveways. Parking in this area is adequate at this time. No signals or traffic control
devices currently exist in this area. No changes are contemplated.

The designation of a STA in Adrian further identifies the need to accommodate pedestrian, and
bicycle movements along and across the highway in the compact central business district. The
recommended urban arterial standard within the STA consists of a 60 to 80-foot right-of-way
with a paved width of 36-52 feet that includes two 12-foot travel lanes with six foot bike lane and
optional 8-foot parking strip on each side of the road. The standard includes a 6-10 foot
walkway on each side of the road and an optional planting strip up to five feet wide depending on
the width of the walkway. To accommodate bicycle movements along the highway, bike lanes
will be installed within the STA and extended to the north end of the city at milepoint 11.72 and
south of Parker Lane at milepoint 12.23, as recommended in the TSP. There are no other bicycle
and pedestrian improvements identified in this area.

Another essential component to accommodate pedestrians in a STA is street crossings. There are
no specific crosswalk enhancements or safety improvements recommended within the STA at
this time. Future improvements and modifications to the highway within the STA and within the
curb line, or if no regular established curb, to the r/w utilized for highway purposes will be made
in accordance with the Oregon Highway Design Manual and with ODOT approval.

Existing maintenance and operational strategies along Highway 201 will be employed within the
STA, consistent with Oregon Revised Statute 373.020, as follows:
ODOT shall be responsible for the ongoing maintenance of: a) the roadway surface between curbs, or if no regular established curb, to that portion of right-of-way utilized for highway purposes b) painting centerline stripe, c) designated school crosswalk delineation, directional and regulatory signs except those signs described as the City's responsibility and d) plowing snow one blade-width of centerline stripe provided there are no conflicts with utilities.

City shall be responsible for the ongoing maintenance of: a) storm sewer system, b) sidewalks, c) landscaping, d) luminaries, e) U-turn signs, parking signs, and street name signs, f) painting parking-stripes and other pavement delineation not described as ODOT's responsibility, and g) snow removal from parking strip.

Future improvements and modifications to the highway within the STA will include maintenance and operational strategies with ODOT and City approval.

**Table 7-2**

<table>
<thead>
<tr>
<th>Functional Classification</th>
<th>Public Road Intersection Type</th>
<th>Spacing</th>
<th>Private Drive Intersection Type</th>
<th>Spacing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Arterial (Hwy 201)*</td>
<td>at-grade</td>
<td>**</td>
<td>Left/Right Turns</td>
<td>**</td>
</tr>
<tr>
<td>Collector</td>
<td>at-grade</td>
<td>0.25 mile</td>
<td>Left/Right Turns</td>
<td>300 feet</td>
</tr>
<tr>
<td>Local</td>
<td>at-grade</td>
<td>200-400 feet</td>
<td>Left/Right Turns</td>
<td>Access to each lot.</td>
</tr>
</tbody>
</table>

* Hwy 201 through Adrian is classified as a Regional Highway.

** Per the 1999 Oregon Highway Plan, for Special Transportation Areas (STAs) such as Highway 201 through Adrian, minimum spacing for public road approaches is either the existing city block spacing or the city block spacing as identified in the local comprehensive plan. Public road connections are preferred over private driveways, and in STAs driveways are discouraged. However, where driveways are allowed and where land use patterns permit, the minimum spacing for driveways is 175 feet (55 meters) or mid-block if the current city block spacing is less than 350 feet (110 meters).

**MODAL PLANS**

The City of Adrian modal plans have been developed using information collected and analyzed through the goals and objectives (Chapter 3), the physical inventory (Chapter 4), forecasts (Chapter 5), the alternatives analysis (Chapter 6) and input from area residents. The plans address transportation system needs for City of Adrian for the next 20 years. The specific timing of individual projects will be influenced by changes in the land use pattern and actual population growth in future years.

**Street Plan**

The TSP recommends a detailed program of local, collector and arterial street improvements as listed below. The TSP identifies those transportation projects and programs, which together with the existing transportation system, will serve the land uses as defined in the City of Adrian Comprehensive Plan. Over the next 20 years these street projects will increase traffic safety and capacity and enhance connectivity and circulation throughout City of Adrian.

January 1998

Revised June 2001 by TriLand Design Group, Inc.

City of Adrian
Transportation System Plan
Any new street construction or street widening project that expands the street system capacity is defined as a capacity improvement. Street upgrades and safety projects (i.e., all non-capacity work) generally include improvements to existing facilities such as street reconstruction or intersection upgrades, that increase the level of safety or efficiency.

The following descriptions detail, by project number, the purpose and scope of each improvement at the planning level. Prior to project design and construction, specific environmental impacts, grading requirements, and street alignments should be analyzed as necessary.

**Project 1**  
*(safety and capacity)*  
Adopt and Implement Access Management for Highway 201 in Adrian  
The intent of this project is to improve the safety and capacity of Highway 201 (the only designated arterial in Adrian) by establishing access management standards which will minimize vehicular conflicts while meeting the needs of the local community. This Project will be implemented by adoption and implementation of this TSP.

**Project 2**  
*(safety and capacity)*  
This project should include curb and gutters where appropriate, and new sidewalks along the east side of Highway 201. ODOT will coordinate with the City to resurface Highway 201 from the city limits north of High Street to the south city limits (south of Parker Lane). The street overlay costs are estimated at $69,000, and the sidewalk improvements are estimated at $60,000.

**Project 3**  
*(safety)*  
Repair Pavement in poor or very poor condition  
Pavement maintenance is an ongoing concern for most jurisdictions. The purpose of this project is to identify and schedule for repair those streets with pavement which is currently in "poor" or "very poor". Tentatively, pavement in "very poor" condition is proposed for repair within the first five years of the planning period and pavement in "poor" condition for the following ten years. The total twenty year planning level project cost is estimated at $89,400.

**Pedestrian Plan**

Walking is our most basic transportation mode and a popular form of recreation. Given the compact size of the City of Adrian, walking may provide a viable transportation alternative for many trips. In order to encourage pedestrian activity, the city should develop a complete pedestrian circulation system on all paved streets, with particular emphasis placed on arterials (i.e., Highway 201). The city's sidewalk system should be expanded to include at a minimum the project described below:
**Pedestrian Project**

Improve and extend sidewalks as follows:

<table>
<thead>
<tr>
<th>Project</th>
<th>From</th>
<th>To</th>
<th>Length</th>
<th>Cost per Linear Ft</th>
<th>Cost</th>
<th>Priority</th>
</tr>
</thead>
<tbody>
<tr>
<td>Highway 201</td>
<td>High St</td>
<td>Washington (1 side)</td>
<td>1500 ft</td>
<td>$40</td>
<td>$60,000*</td>
<td>High</td>
</tr>
<tr>
<td>Owyhee St</td>
<td>Highway 201</td>
<td>3rd St (2 sides)</td>
<td>1050 ft</td>
<td>$40</td>
<td>$42,000</td>
<td>High</td>
</tr>
<tr>
<td>3rd St</td>
<td>Main St</td>
<td>Schools (1 side)</td>
<td>800 ft</td>
<td>$40</td>
<td>$32,000</td>
<td>Medium</td>
</tr>
<tr>
<td>Main St</td>
<td>Highway 201</td>
<td>3rd St (2 sides)</td>
<td>1000 ft</td>
<td>$40</td>
<td>$40,000</td>
<td>Medium</td>
</tr>
<tr>
<td>High St</td>
<td>Highway 201</td>
<td>3rd St (1 side)</td>
<td>500 ft</td>
<td>$40</td>
<td>$20,000</td>
<td>Low</td>
</tr>
</tbody>
</table>

* Including Highway 201 sidewalks

The estimated the cost of these projects as $134,000. New sidewalks should be constructed with curb cuts for wheelchairs at every crosswalk to comply with the Americans with Disabilities Act (ADA).

**Bikeway Plan**

Currently, bicyclists in the City of Adrian share the street with motorists. Given the size of the city, the small population and the generally low traffic volumes, bicycle-only facilities on local or collector streets, such as dedicated bicycle lanes, would likely be of little benefit in creating a modal shift toward bicycling in the City of Adrian. Highway 201, Adrian’s only arterial street, dedicated six foot wide bike lanes are an appropriate safety improvement.

Bicycle parking is generally lacking in Adrian. Bike racks could be installed in front of downtown businesses and all public facilities (schools, post office), as appropriate. Typical rack designs cost about $50 per bike plus installation. Adrian could begin by placing racks where needs are identified and respond to requests for racks at specific locations.

**Transportation Demand Management**

The goal of transportation demand management (TDM) is to reduce or redistribute peak travel demands in order to more efficiently use the transportation system, rather that building new or wide streets. There is a wide range of techniques which have been successful in other communities and which could be initiated to help alleviate some traffic congestion (e.g., carpooling and vanpooling, alternative work schedules, bicycle and pedestrian facilities). However, the effectiveness of many of these TDM measures is dependent upon sufficient population densities.

In City of Adrian, where traffic volumes are generally low and the population and employment bases are relatively small, implementing TDM strategies is not effective in most cases. However, implementing bike lane and sidewalk improvements for bicyclists and pedestrians when making other street improvements, can encourage the use of alternative modes and thus is considered a TDM strategy.
No costs have been estimated for the TDM plan. Grants may be available to set up programs; other aspects of Transportation Demand Management can be encouraged through ordinance and policy (see Implementation Section).

Public Transportation Plan

Malheur County currently provides limited Dial-a-Ride service for the elderly and disabled. Some limited public transportation service is also provided the City of Ontario, the Department of Human Resources, Malheur Council on Aging, Nyssa Senior Center, Ontario Senior Center, and Vale Senior Center. In order to increase available service, the City of Adrian should work with Malheur County, ODOT and existing public transportation providers to increase mobility for the transportation-disadvantaged and improve commuter ridesharing opportunities. Opportunities may exist through enhanced interstate coordination to provide improved service in conjunction with nearby Idaho jurisdictions.

Neither the City of Adrian nor Malheur County have local fixed-route transit service at this time. Fixed-route transit generally requires relatively high population densities in order to be effective. In the City of Adrian a small population and low traffic volumes on the highways indicate that mass transit is not necessary or economically feasible at this time. The TPR exempts areas of less than 25,000 from including mass transit facilities in their development regulations.

Rail Service Plan

The City of Adrian has no passenger or freight rail service.

Air Service Plan

The City of Adrian contains no airports. Nearby service at the Ontario Municipal Airport and Boise International Airport provide airport service.

Pipeline Service Plan

Other than local sewer and water service, the City of Adrian has no existing pipeline services.

Waterways Transportation Plan

The Snake River flows through the City, but is too shallow to allow for effective water transportation.

Utilities Coordination Plan

The cost to move private utilities is an expense to the tax payer/rate payer, and should be minimized at every opportunity. Utility improvements will be coordinated with street improvements to the extent possible. Where this is not possible, utilities should be responsible
for the full cost of returning the transportation facility to its original condition. Emphasis should be placed on two-way communication and a partnership between the jurisdictions and the private utilities to minimize costs for all transportation improvements.

TRANSPORTATION SYSTEMS PLAN IMPLEMENTATION PROGRAM

Implementation of the City of Adrian TSP will require changes to the City’s comprehensive plan, zoning code and capital improvement plan. These actions will enable City of Adrian to address both existing and future transportation issues throughout the city in a timely and cost effective manner.

Recommended Policies for Implementation

The following policies, which are part of the TSP, are intended to guide the approval process for different types of projects:

- The Transportation System Plan is an element of the City of Adrian Comprehensive Plan. It identifies the general location of transportation improvements. Changes in the specific alignment of proposed public road and highway projects that shall be permitted without plan amendment of the new alignment falls within a transportation corridor identified in the Transportation System Plan.

- Operation, maintenance, repair, and preservation of existing transportation facilities shall be allowed without land use review, except where specifically regulated.

- Dedication of right-of-way, authorization of construction and the construction of facilities and improvements, for improvements designated in the Transportation system Plan, the classification of the roadway and approved road standards shall be allowed without land use review.

- Changes in the frequency of rail services that are consistent with the Transportation System Plan shall be allowed without land use review.

- For State projects that require an Environmental Impact Study (EIS) or Environmental Assessment (EA), the draft EIS or EA shall serve as the documentation for local land use review, if local review is required.

- Where the project is consistent with the Transportation System Plan, formal review of the draft EIS or EA and concurrent or subsequent compliance with applicable development standards or conditions;
- Where the project is not consistent with the Transportation System Plan, formal review of the draft EIS or EA and concurrent completion of necessary goal exceptions or plan amendments.

**Updating the Adrian Comprehensive Plan**

Essential to implementing the TSP is establishing a linkage between the TSP and the City’s Comprehensive Plan. In order to do this the City of Adrian may wish to include a policy in its Comprehensive Plan which clarifies the role to the TSP. For example:

*The Transportation System Plan is an element of the City of Adrian Comprehensive Plan. All development proposals, plan amendments, or zone changes shall conform with the adopted Transportation System Plan.*

To further ensure that the policies and projects of the TSP are implemented, the City of Adrian may wish to take the following steps (Appendix B contains sample ordinance language):

- Amend land use regulations to reflect and implement the Transportation System Plan.

- Clearly identify which transportation facilities, services, and improvements are allowed outright, and which will be conditionally permitted or permitted through other procedures. (See above).

- Adopt land use or subdivision ordinance measures, consistent with applicable federal and state requirements, to protect transportation facilities, corridors and sites for their identified functions, to include the following topics:
  
  * access management and control;
  * protection of public use airports;
  * coordinated review of land use decisions potentially affecting transportation facilities;
  * conditions to minimize development impacts to transportation facilities;
  * regulations to provide notice to public agencies providing transportation facilities and services of land use applications that potentially affect transportation facilities;
  * regulations assuring that amendments to land use applications, densities and design standards are consistent with the Transportation System Plan.

- Adopt land use or subdivision regulations for urban areas and rural communities to provide safe and convenient pedestrian and bicycle circulation and bicycle parking, and to ensure that new development provides on-site streets and access ways that provide reasonable direct routes for pedestrian and bicycle travel.

- Establish street standards that minimize pavement width and total right-of-way.

**Improvement Schedule**

City of Adrian
Transportation System Plan

7-14

January 1998

Revised June 2001 by TriLand Design Group, Inc.
Table 7-3, on the following page provides an outline for TSP implementation. It is intended to provide the city with guidance in terms of the projected timeframes and partnerships available for the various projects outlined above. Specific financing issues are addressed in Chapter 8.
### TABLE 7-3
City of Adrian TSP
Implementation Plan

<table>
<thead>
<tr>
<th>PROJECT DESCRIPTION</th>
<th>PROJECT / PROGRAM SCHEDULE</th>
<th>BENEFIT</th>
<th>COST</th>
<th>PARTNERSHIP</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>0-5</td>
<td>6-10</td>
<td>11-15</td>
<td>16-20</td>
</tr>
<tr>
<td>Roadway System Plan</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1 Adopt and Implement Access Management</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2 Highway 201 Overlay and Sidewalk Improvements</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3 Repair Pavement in poor or very poor condition</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pedestrian System Plan</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Improve and extend sidewalks</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bicycle System Plan</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ongoing bicycle facility improvements</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Public Transportation System Plan</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>(including Transportation Demand Management programs)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pipeline / Waterway / Utilities Plan</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**NOTES:**
Financial Plan

Adrian Transportation System Plan

WHPACIFIC
CHAPTER 8: FINANCIAL PLAN

INTRODUCTION

The Transportation Planning Rule (OAR 660-12-040) requires that the City of Adrian Transportation System Plan (TSP) include a transportation financing program. These programs are to include:

- a list of planned transportation facilities and major improvements;
- a general estimate of the timing for planned transportation facilities and major improvements;
- determination of planning level cost estimates for the transportation facilities and major investments identified in the TSP (intended to provide an estimate of the fiscal requirements to support the land uses in the acknowledged comprehensive plan(s) and allow jurisdictions to assess the adequacy of existing and possible alternative funding mechanisms); and,
- a discussion of existing and potential financing sources to fund the development of each transportation facility and major improvement (which can be described in terms of general guidelines or local policies).

The timing and financing provisions in the transportation financing program are not considered a land use decision as defined by the TPR and ORS 197.712(2)(e) and, therefore, cannot be the basis of appeal under State law. In addition, the transportation financing program is to implement the comprehensive plan policies which provide for phasing of major improvements to encourage infill and redevelopment of urban lands prior to facilities which would cause premature development of urbanizable areas or conversion of rural lands to urban uses.

This chapter summarizes the financing program defined for the City of Adrian TSP as required by the TPR. It summarizes the transportation improvement projects, identifies general timing and rough cost estimates of transportation system improvements, and summarizes the existing and potential future financial resources to pay for these improvements, as a general policy guideline.

TRANSPORTATION SYSTEM IMPROVEMENTS - COST AND TIMING

The total cost of all transportation system improvements in the City of Adrian is expected to exceed $352,400. These improvements include roadway and pedestrian facility improvements on
the State and City transportation system over the next 20 years (as identified in Chapter 7 - Transportation Systems Plan).

Roadways

Seven roadway improvement projects will be needed to upgrade the roadway and highway system within the City of Adrian. Approximately $218,400 of the total transportation system improvements are attributed to these roadway projects. Target dates for project construction have been tentatively identified by five-year increment.

Pedestrian Facilities

New pedestrian facilities (along collector/arterial roads) in the City of Adrian Transportation system will increase by 4,850 feet at a total cost of $194,000 (including the Highway 201 sidewalk improvements).

Timing

Project priorities have been grouped into four, five-year increments. Table 8-1 summarizes the improvements that will occur within those timeframes. Funding responsibility and recommended funding sources are also indicated.

City expenditures are the greatest in the next second and third five years, a total of $72,350 and 80,350 respectively. Another major expenditure for transportation is required in the first 5 years for an estimated $56,700 million. The City is expected to make investments to improve transportation facilities for existing development and to improve major collectors and arterials that serve the entire area. In future years, however, the burden for expansion of the transportation network should be borne by the development creating the additional demand, and this is reflected in the projected costs/responsibilities.

EXISTING AND HISTORIC FINANCING SOURCES

Road-Related Funding

In 1992, Oregon received $704 million, or 67 percent of its highway revenues, from the collection of user taxes and fees. The second largest category is almost entirely comprised of the sale of timber logged from National Forests. In 1992, these timber receipts raised roughly $115 million. The remaining revenue sources - road and crossing tolls, general fund appropriations, property taxes, miscellaneous receipts and bond receipts - accounted for $223.5 million or roughly 21 percent of total transportation revenues.
# TABLE 8-1  
City of Adrian TSP  
Financial Plan

<table>
<thead>
<tr>
<th>PROJECT DESCRIPTION</th>
<th>PROJECT / PROGRAM SCHEDULE</th>
<th>COST</th>
<th>PARTNERSHIP</th>
<th>ADRIAN CAPITAL OUTLAY (millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>0-5 6-10 11-15 16-20</td>
<td>1997 Dollars</td>
<td>State</td>
<td>County</td>
</tr>
<tr>
<td>Roadway System Plan</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1 Adopt and Implement Access Management</td>
<td></td>
<td></td>
<td>TBD</td>
<td>✓</td>
</tr>
<tr>
<td>2 Highway 201 Overlay and Sidewalk Improvements</td>
<td></td>
<td>$129,000</td>
<td>✓</td>
<td>✓</td>
</tr>
<tr>
<td>3 Repair Pavement In very poor condition</td>
<td></td>
<td>$8,700</td>
<td>100%</td>
<td>$8,700</td>
</tr>
<tr>
<td>Repair Pavement In poor condition</td>
<td></td>
<td>$80,700</td>
<td>100%</td>
<td>$40,350</td>
</tr>
<tr>
<td>Pedestrian System Plan</td>
<td></td>
<td>$134,000</td>
<td>100%</td>
<td>$42,000</td>
</tr>
<tr>
<td>Improve and extend sidewalks</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bicycle System Plan</td>
<td></td>
<td></td>
<td>TBD</td>
<td>TBD</td>
</tr>
<tr>
<td>Ongoing bicycle facility improvements</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Public Transportation System Plan</td>
<td></td>
<td></td>
<td>TBD</td>
<td>✓</td>
</tr>
<tr>
<td>(Including Transportation Demand Management programs)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pipeline / Waterway / Utilities Plan</td>
<td></td>
<td></td>
<td>TBD</td>
<td>✓</td>
</tr>
</tbody>
</table>

**COST PER 5-YEAR INCREMENT**  
$50,700 $72,350 $50,350 $20,000

**TOTAL COST**  
$223,400

[1] Requires coordination with Nyssa Road District for the application of District maintenance revenues to improve City Streets.
The most significant portion of Oregon's highway user taxes and fees come from federal fuel and vehicle taxes, state taxes, and general motor vehicle fees. These categories account for 32 percent, 34 percent, and 25 percent, respectively, of all highway user taxes and fees collected in the state. During the 1980's, Oregon's transportation budget was bolstered by a series of two-cent annual gas tax increases. At the same time, the Federal Government was increasing investment in highways and public transportation. The situation is different today. The last two Legislatures failed to increase the gas tax and federal budget cuts are reducing transportation funding available to Oregon. The State Highway Fund is further losing buying power because the gas tax is not indexed to inflation, and increased fuel efficiency of vehicles reduces overall consumption.

Oregon Highway Trust Fund revenues are distributed among state (60.22 percent), County (24.38 percent) and City (15.40 percent) governments to fund their priority road needs. In 1995-96, the state estimated it would collect $575 million in state highway funds. Counties and cities would then receive about $140 and $90 million, respectively.

Oregon law allows local government, in addition to receiving state highway trust fund revenues to levy local fuel taxes for roadway related improvements. Multnomah and Washington Counties, and some small cities (Tillamook, The Dalles, Woodburn) have used this authorization. Several attempts have been made by other jurisdictions but have not been supported by the electorate. As few local governments have implemented this option, non-user road revenues tend to be relied upon, to supplement the funds received from state and federal user revenues. Other local funding sources have included property tax levies, local improvement district assessments, bonds, traffic impact fees, road user taxes, general fund transfers, receipts from other local governments, and other miscellaneous sources.

Oregon's basic vehicle registration fee is $15 per year regardless of the vehicle being registered. Oregon law permits local governments (counties) and governmental entities to impose local option vehicle registration fees. To date, no county has implemented this tax.

Cities have relied more than counties on transfers from their general funds to support roadway improvements. Ballot Measure 5, however, approved by the voters in 1990, reduced the range of funding and financing options available to both cities and counties. Measure 5 limited the property tax rate for purposes other than for payment of certain general obligation indebtedness to $15 per $1000 of assessed value. The measure further divided the $15 per $1000 property tax authority into two components: $5 per thousand dedicated to the public schools; the remaining $10 dedicated to other local government units, including cities, counties, special service districts, and other non-school entities. The tax rate limitation for cities and counties went into effect in 1992. The school portion of the measure is being phased in over a five-year period beginning in FY 1992. In 1996, voters again approved a property tax limitation measure, Ballot Measure 47/50 which will further impact the ability of cities and counties to pay for needed infrastructure through historic or traditional means. The full impact of Measure 47/50 will likely find further definition in the 1997 Legislative session.
At the same time that increased growth and increased transportation demands are occurring, cities and counties have lost another traditional source of revenue for infrastructure construction and upgrade - timber harvest receipts. Under a 1993 negotiated mitigation plan, federal forest receipts to support county roads are decreasing 3 percent per year. In 1996, counties will receive 74 percent of their 1986-90 average receipts, and by 2003 they will receive 55 percent of the late 1980s revenues.

Given this funding environment, current funding levels and sources are not adequate to meet the transportation needs of the State, cities and counties for the next 20 years. In response to this gap between needs and funding, Governor Kitzhaber organized the Oregon Transportation Initiative to look at statewide transportation needs and to develop a program to address how these needs will be met. Through a public process led by business and civic leaders across the state, findings and recommendations on the state of transportation needs and methods to address those needs was submitted to the Governor in July 1996. A result of these recommendations was appointment of a committee to develop a legislative proposal to the 1997 Legislature regarding transportation funding. Part of that proposal will be identification of a “base” transportation system, with a priority of maintenance, preservation and operation of a system of transportation facilities and services that ensures every Oregonian a basic level of mobility within and between communities. It is expected that other components will include efficiencies resulting from better intergovernmental cooperation (shared resources and equipment, better communication on project needs and definition), and elimination of legislative barriers to more efficient and cost-effective methods of providing transportation services.

A part of transportation funding will be identification of relationships and responsibilities relative to delivery of projects and services. In Oregon, the primary state role has been to construct and maintain the state highway system and to assist local government with funding of other modes. The state also has a role in intercity passenger services and airports. This has historically been minor, but would grow significantly if serious efforts were put into intercity rail improvements. Local governments, in addition to providing local road and bridge construction, maintenance and preservation, provide local transit and airport support. The Federal Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA) began moving decision-making for federal programs to states and this program and other state policies incorporated in the Oregon Transportation Plan (OTP) encourage reassessment of responsibilities and obligations for funding.

These changing relationships have resulted in two significant issues for state and local governments. First, there is no clear definition of state responsibility. At one time, the state operated on an informal consensus that it should provide one-half the match on federally funded local and other projects that served statewide needs. No similar consensus seems to exist today. The state’s responsibility for transit, airports and other local transportation infrastructure and services is not clear. The question of regional equity is raised in considering especially high-cost project needs, such as the Bend Parkway or the Portland area light rail program. Regional equity
will probably require consideration of all modes together, because different regions may have different modal needs and financial arrangements.

Given this dynamic transportation funding environment, it is clear that local governments need to reassess traditional methods of funding projects and look creatively at ways to meet public expectations of high quality transportation services.

**Transit Funding**

Transit service in Oregon has evolved from private development and reliance on user fees for operating revenue to public ownership with public subsidy for operations. No clear philosophy of the state role in providing transit services is evident and the state is continuing its discussion on how the state should raise revenue in support of transit. The state has used general funds, lottery funds, stripper well funds, cigarette tax revenue and other funds at various times to support transit service. These efforts have largely been targeted towards supplying half the required match to federal capital improvement grants. Other than the elderly and disabled program, the state has provided no operating funds for transit. The state role has been one of granting authority to local governments to raise locally-generated operating revenue.

Federal Transit Administration (FTA) grants account for 69 percent of Oregon’s funding for transit capital construction, which includes purchase of buses and other equipment. Federal funding for transit was increased through the flexibility provided by ISTEA. This federal legislation expired September 30, 1997 and, while new legislation is still pending, there is strong indication that current flexibility will be retained, although it will be dependent on Congressional approval to continue current programs. The largest source of transit operating revenues, $87 million, are local funds, which provide 64 percent of revenues needed for transit operations. Passenger fares cover 22 percent of Oregon’s transit system operating costs. Transportation for the elderly and disabled is funded through dedication of two cents of the state cigarette tax and through federal programs.

**POTENTIAL FUTURE TRANSPORTATION FUNDING SOURCES**

There are a variety of methods to generate revenue for transportation projects. Funding for transportation improvement projects are derived from three sources: federal, state and local governments. Appendix C provides a summary of federal, state and local highway, bridge, sidewalk, bicycle and transit funding programs that have typically been used in the past. Although property tax is listed as a possible revenue source, the impacts of Ballot Measure 47/50 are not clear.
Recommendations for Receiving Federal and State Sources

Most Federal funding is passed through ODOT to the local jurisdictions. A good working relationship with ODOT Region 5 planners and the Region Manager is important to have major transportation improvements included as part of the STIP when it is updated every two years. ODOT maintains interstate and state highways - in the City of Adrian this includes Highway 201. State and federal funds administered through ODOT are the primary sources of funding for improvements to this facility. Projects that involve Highway 201 account for $129,000 in the next five years. The City should take an active role in representing its transportation priorities to ODOT during its process of formally incorporating priorities into the STIP to include street and sidewalk improvements on Highway 201.

Recommendations for Local Funding

In review and summary, the City of Adrian has no funding mechanism for local improvements. The Nyssa Road District should be prepared to work with the City to repave those local streets identified in the TSP. There appears to be no available revenue programs to pay for new sidewalks. Hence, the City of Adrian should consider some form of local financing to fund high priority sidewalk improvements.

Potential funding sources are typically judged based on a number of criteria, including:

- legal authority;
- financial capacity;
- stability;
- administrative feasibility;
- equity; and
- political acceptability.

In general recognition of these criteria, new LID’s, SDC’s/TIF’s and street maintenance fees were considered but dropped as viable, local funding measures for new transportation improvement projects in the City of Adrian areas for the following reasons:

- In general, street maintenance is already funded through current programs (statewide gas tax/vehicle registration fees and weight-mile taxes), new maintenance/utility fees could be interpreted as over-or double-taxing;

- New development may not occur at significant levels, yielding low impact fee revenues - or impact fees would need to be extremely high in order to yield significant revenue, quite possibly resulting in discouraging even the smallest of developments (as planned); and,
• new LID’s would be difficult to form around large city projects, placing the financial burden disproportionately in select areas instead of across the city (to all those who benefit by the projects).

Hence, the City of Adrian TSP includes a more focused evaluation of local gasoline taxes, vehicle registration fees and street improvement bonds as new and viable measures to fund the City of Adrian’s share of needed transportation system improvements consistent with and part of an overall county program. As summarized in Appendix D, a range of funding options were investigated to ascertain the level of revenue generated based on county-wide application for each funding measure. Table 8-2 summarizes the 20-year revenues generated by the new county-wide funding measures recommended in the Draft Malheur County TSP (January 1998).

### Table 8-2
Recommended Funding Sources

<table>
<thead>
<tr>
<th>Funding Source</th>
<th>Rate</th>
<th>Value</th>
<th>Adrian</th>
<th>Jordan Valley</th>
<th>Nyssa</th>
<th>Ontario</th>
<th>Unit County: Malheur County</th>
</tr>
</thead>
<tbody>
<tr>
<td>County-Wide Local Gas Tax - 20 Years</td>
<td>$0.01 per gallon</td>
<td>$409,900</td>
<td>$23,400</td>
<td>$82,300</td>
<td>$557,500</td>
<td>$2,355,200</td>
<td>$2,550,800</td>
</tr>
<tr>
<td>County-Wide Vehicle Registration Fee - 20 Years</td>
<td>$10 per year</td>
<td>$574,600</td>
<td>$32,900</td>
<td>$115,400</td>
<td>$781,500</td>
<td>$3,301,700</td>
<td>$3,575,900</td>
</tr>
<tr>
<td>County-Wide Road Bond - 10 Years (2008-2017)</td>
<td>$0.55 per $1,000 assessed value</td>
<td>$411,250</td>
<td>$23,500</td>
<td>$82,600</td>
<td>$559,300</td>
<td>$2,362,900</td>
<td>$2,559,200</td>
</tr>
<tr>
<td>Total Revenue</td>
<td></td>
<td>$1,395,750</td>
<td>$79,800</td>
<td>$280,300</td>
<td>$1,898,300</td>
<td>$8,019,800</td>
<td>$8,685,900</td>
</tr>
</tbody>
</table>


The diversification of residential and commercial/industrial in the City of Adrian and Malheur County makes it difficult to translate the real, added cost of new transportation funding measures. The valuation of homes and industry vary greatly across the City. For the purposes of illustrating the impact of these new funding measures a simplified summary is provided based on a typical household (dwelling) in the City of Adrian. Table 8-3 summarizes the added expenses for a "typical" dwelling to pay for needed transportation system improvements in the City of Adrian through these measures. Beginning in 1998, each typical dwelling would pay $42.22 per year in added local gas tax and vehicle registration fees. Beginning in 2008, the 10-year Road Bond would add $66.00 in local property tax to the local gas tax and vehicle registration fees, totaling $108.22 in annual expense to the typical dwelling.

---

1 Single-family dwelling assessed at $120,000, with 2 automobiles accumulating 20,000 miles per year at 18 miles per gallon.
Table 8-3  
Added Cost of New Transportation Funding Measures

<table>
<thead>
<tr>
<th>New County-Wide Transportation Revenue Measures</th>
<th>In 1998</th>
<th>In 2006</th>
</tr>
</thead>
<tbody>
<tr>
<td>20-Year Local Gas Tax ($.01/gal)</td>
<td>$22.22</td>
<td>$22.22</td>
</tr>
<tr>
<td>20-Year Local Vehicle Registration Fee ($10/year)</td>
<td>$20.00</td>
<td>$22.00</td>
</tr>
<tr>
<td>10-Year Road Bond ($.55 per $1,000 assessed value)</td>
<td>$66.00</td>
<td></td>
</tr>
<tr>
<td>TOTAL</td>
<td>$42.22</td>
<td>$108.22</td>
</tr>
</tbody>
</table>

Revenues from the proposed funding measures should be adequate to meet the financial needs of the City of Adrian for major street projects over the next 20 years. Additional evaluation of the economic impact of any new tax and bonding measures, particularly a local gasoline tax should be completed before a public vote and eventual implementation (assuming voter approval). Furthermore, the introduction of new local funding measures will require significant public support. Those measures adopted by the City will require definition of local programs to administer the fee and/or tax collection programs.

The City of Adrian should continue to explore state and federal funding opportunities to meet its long-term transportation needs. State funding is available for funding bike lane modifications, with a state requirement that one percent of the State Highway Fund be spent for the development of pedestrian and bikeways. Federal ISTEA programs include the Surface Transportation Program that provides funds for any road not classified as a local or rural minor collector. The Transportation Enhancement Program provides funds for enhancing pedestrian and bicycle facilities, landscaping and other scenic beautification, and improvements to scenic or historic sites. This program may be a source of funds for projects that include adding bicycle lanes, sidewalks and off-road pathways. The Highway Enhancement Program provides funds for safety improvement projects on public roads. All of these programs are coordinated through the ODOT Region 5 staff and must be included in the STIP.

---

Appendices

Adrian
Transportation System Plan

W&HPACIFIC
APPENDIX A
INVENTORY OF TRANSPORTATION SYSTEM
## TABLE A-1
### CITY OF ADRIAN ROADWAY INVENTORY

<table>
<thead>
<tr>
<th>Road</th>
<th>From</th>
<th>To</th>
<th>Pavement Type and Condition</th>
<th>Travel Lanes and Width (ft)</th>
<th>Bike Lanes</th>
<th>Sidewalks</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hwy 201</td>
<td>City Limit</td>
<td>High St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td>1 - 12' and 1 - 14' travel lane, 1 - 6' shoulder/bike lane</td>
</tr>
<tr>
<td></td>
<td>High St</td>
<td>Owyhee St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Owyhee St</td>
<td>Main St/Slope Rd</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Main St/Slope Rd</td>
<td>Oregon St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Oregon St</td>
<td>Washington St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Washington St</td>
<td>Parker Ln</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Slope Rd</td>
<td>Dead end</td>
<td>Well Rd</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Well Rd</td>
<td>Hwy 201</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Slope Rd</td>
<td>end (N)</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>High St</td>
<td>Hwy 201</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>3rd St</td>
<td>end (E)</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Owyhee St</td>
<td>Hwy 201</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>2nd St</td>
<td>3rd St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>2nd St</td>
<td>3rd St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Main St</td>
<td>Hwy 201</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>2nd St</td>
<td>3rd St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>2nd St</td>
<td>3rd St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>3rd St</td>
<td>4th St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>4th St</td>
<td>5th St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Holly Ln</td>
<td>Main St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Oregon St</td>
<td>Hwy 201</td>
<td>2nd St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>2nd St</td>
<td>3rd St</td>
<td></td>
<td></td>
<td>3</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Inventory Date: September 1, 1997

Source: W&H Pacific and ODOT Transportation System Plan Appendix A-1

City of Adrian Transportation System Plan Final Draft
<table>
<thead>
<tr>
<th>Road</th>
<th>From</th>
<th>To</th>
<th>Pavement Type and Condition</th>
<th>Travel Lanes and Width (ft)</th>
<th>Bike Lanes</th>
<th>Sidewalks</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Oregon St</td>
<td>3rd St</td>
<td>4th St</td>
<td>Concr. Asph. Ch. Seal. Grav. Dirt. Very good</td>
<td>2 3</td>
<td>3</td>
<td>8 9 10 11 12</td>
<td>Good Fair Poor</td>
</tr>
<tr>
<td></td>
<td>4th St</td>
<td>5th St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Washington St</td>
<td>Hwy 201</td>
<td>2nd St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>3rd St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>4th St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parker Ln</td>
<td>Hwy 201</td>
<td>end (E)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2nd St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2nd St</td>
<td>Main St</td>
<td>Owyhee St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3rd St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Oregon St</td>
<td>Main St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Main St</td>
<td>Owyhee St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3rd St</td>
<td>Owyhee St</td>
<td>High St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4th St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Oregon St</td>
<td>Main St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5th St</td>
<td>Washington St</td>
<td>Oregon St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Oregon St</td>
<td>Main St</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Otis Rd</td>
<td>5th St</td>
<td>City Limit</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dead end</td>
<td>Slope Rd</td>
<td>south</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Inventory Date: September 1, 1997

March 1998
Source: W&H Pacific and ODOT
City of Adrian
Transportation System Plan
Appendix A-2
Final Draft
APPENDIX B
SAMPLE POLICY AND ORDINANCE LANGUAGE

The Appendix includes Policy and Ordinance Language addressing the following issues:

- Standards for Transportation Improvements.
- Recommended Policies for Protection of Transportation Facilities including Recommended Policies to Protect Public Use Airports.
- Recommended Policies to Assure that Amendments are Consistent with the Transportation System Plan.
- Recommended Policies for Pedestrian and Bicycle Circulation.
- Recommended Ordinances for Bicycle Parking.
Standards for Transportation Improvements

--- Standards for Transportation Improvements

--- Uses Permitted Outright. Except where otherwise specifically regulated by this ordinance, the following improvements are permitted outright:

A. Normal operation, maintenance, repair, and preservation activities of existing transportation facilities.

B. Installation of culverts, pathways, medians, fencing, guardrails, lighting, and similar types of improvements within the existing right-of-way.

C. Projects specifically identified in the Transportation System Plan as not requiring further land use regulation.

D. Landscaping as part of a transportation facility.

E. Emergency measures necessary for the safety and protection of property.

F. Acquisition of right-of-way for public roads, highway, and other transportation improvements designated in the Transportation System Plan except for those that are located in exclusive farm use or forest zones.

G. Construction of a street or road as part of an approved subdivision or land partition approved consistent with the applicable land division ordinance.

--- Conditional Uses Permitted

A. Construction, reconstruction or widening of highways, roads, bridges or other transportation projects that are: (1) not improvements designated in the Transportation System Plan or (2) not designed and constructed as part of a subdivision or planned development subject to the site plan and/or conditional use review, shall comply with the Transportation System Plan and applicable standards, and shall address the following criteria. For State projects that require an Environmental Impact Statement (EIS) or EA (Environmental Assessment), the draft EIS or EA shall be reviewed and used as the basis for findings to comply with the following criteria:

1. The project is designed to be compatible with existing land use and social patterns, including noise generation, safety, and zoning.

2. The project is designed to minimize avoidable environmental impacts to identified wetlands, wildlife habitat, air and water quality, cultural resources, and scenic qualities.
3. The project preserves or improves the safety and function of the facility through access management, traffic calming, or other design features.

4. Project includes provision for bicycle and pedestrian circulation as consistent with the comprehensive plan and other requirements of this ordinance.

B. If review under this section indicates that the use or activity is inconsistent with the Transportation System Plan, the procedure for a plan amendment shall be undertaken prior to or in conjunction with the conditional permit review.

Time Limitation on Transportation-Related Conditional Use Permits

A. Authorization of a conditional use shall be void after a period specified by the applicant as reasonable and necessary based on season, right-of-way acquisition, and other pertinent factors. This period shall not exceed three years.
Recommended Policies for Protection of Transportation Facilities
For inclusion in the Comprehensive Plan.

- The City of Jordan Valley shall protect the function of existing and planned roadways as identified in the Transportation System Plan.

- The City of Jordan Valley shall include a consideration of their impact on existing or planned transportation facilities in all land use decisions.

- The City of Jordan Valley shall protect the function of existing or planned roadways or roadway corridors through the application of appropriate land use regulations.

- The City of Jordan Valley shall consider the potential to establish or maintain access ways, paths, or trails prior to the vacation of any public easement or right-of-way.

- The City of Jordan Valley shall preserve right-of-way for planned transportation facilities through exactions, voluntary dedication, setbacks.

- The function of existing or planned general use airports shall be protected through the application of appropriate land use designations to assure future land uses are compatible with continued operation of the airport.

Recommended policies to Protect Public Use airports

- To avoid danger to the public safety from potential aircraft accidents, commercial and residential uses resulting in concentrations of people shall not be permitted beneath the airport approach surfaces and an area within _____ feet parallel from the runway centerline.

- Land uses around the airport shall be required to provide an environment that will not be adversely affected by noise and safety problems and will be compatible with the airport and its operations.

- The airport is recognized as an important transportation facility. Its operation, free from conflicting land uses, is in the best interests of the citizens of the City of Jordan Valley; therefore, incompatible land uses will be prohibited on the lands adjacent to the airport.

- The City of Jordan Valley shall encourage cooperation between the City of Jordan Valley, and the Oregon Aeronautics Section when reviewing any land use development near the airport.
The City of Jordan Valley will cooperate and coordinate with the Malheur County, and the Oregon Aeronautics Section in the protection of the airport and future expansion areas from potential adverse effects posed by incompatible land uses.

The City of Jordan Valley shall create local airport Advisory Committees for each airport. This committee shall be responsible for advising the sponsors during the development of airport Master plans, implementing ordinances or in individual land use actions.

The land use element of the airport Master Plan shall be protected from development that could conflict with aircraft approach safety, or threaten surrounding development.

Development in highly hazardous areas, such as land within a floodway or under the Airport Runway Approach Zone will be restricted or prohibited.

Because of potential bird hazards to airborne aircraft, land uses beneath designated airport approach surfaces within 500 feet off the approach end of runway(s) accommodating piston engine aircraft, and within 10,000 feet of the approach end of runway(s) accommodating jet aircraft shall not create water impoundments, sanitary landfills, or sewer treatment plants.

The City of Jordan Valley shall adopt and implement an Airport Overlay Zone supporting land use compatibility around the airport.

The City of Jordan Valley supports:

* Land Use Zoning with respect to the airport land use plan and noise contours;

* A comprehensive capital-improvements program for land acquisition for airport expansion and safety; and

* Frequent updating of the Airport Master Plan and related land use plans to keep the Planning program current with changes in community goals.

The City of Jordan Valley shall coordinate with the Department of Transportation to implement the highway improvements listed in the Statewide Transportation Improvement Program (STIP) that are consistent with the Transportation System Plan and comprehensive plan.

The City of Jordan Valley shall consider the findings of ODOT's draft Environmental Impact Statements and Environmental Assessments as integral parts of the land use decision-making procedures. Other actions required, such as a goal exception or plan amendment, will be combined with review of the draft EA or EIS and land use approval process.
The proposed use shall impose an undue burden on the public transportation system. For developments that are likely to generate more than 400 average daily motor vehicle trips (ADTs), the applicant shall provide adequate information, such as a traffic impact study or traffic counts, to demonstrate the level of impact to the surrounding street system. The developer shall be required to mitigate impacts attributable to the project.

The determination of impact or effect and the scope of the impact study should be coordinated with the provider of the affected transportation facility.

Dedication of land for streets, transit facilities, sidewalks, bikeways, paths, or access ways shall be required where the existing transportation system will be impacted by or is inadequate to handle the additional burden caused by the proposed use.

Improvements such as paving, curbing, installation or contribution to traffic signals, construction of sidewalks, bikeways, access ways, paths, or streets that serve the proposed use where the existing transportation system may be burdened by the proposed use.

Review of land use actions is typically initiated by a Notice. This process is usually defined by a Procedures Ordinance or Noticing Policy. This Ordinance or Policy should be amended to provide for Notice to ODOT regarding any land use action on or adjacent to a State facility. Similarly, all actions by a city or county potentially affecting another jurisdiction's road should require notice to that jurisdiction's public work department. In addition, the policy should be to notice providers of public transit and special interest transportation groups such as truckers, railroad, bicyclists, pedestrians, and the disabled on any roadway or other transportation project.

Information that should be conveyed to reviewers includes:

- Project location.
- Proposed land use action.
- Location of project access point(s).

Additional information that could be supplied to the review upon request (provided the information is available) includes a site plan showing the following:

- Distances to neighboring constructed access points, median openings, traffic signals, intersections, and other transportation features on both sides of the property;
- Number and direction of lanes to be constructed on the driveway, plus striping plans;
- All planned transportation features (lanes, signals, bikeways, sidewalks, crosswalks, etc.).
• Trip generation data or appropriate traffic studies;

• Parking (motor vehicle and bicycle) and internal circulation plans for vehicles and pedestrians;

• Plat map showing property lines, right-of-way, and ownership of abutting properties; and

• A detailed description of any requested variance.
Recommended Regulations to Assure that Amendments are Consistent with the Transportation System Plan

The following statements should be added to the local ordinance and policy language governing zone changes and plan amendments:

A plan or land use regulation amendment significantly affects a transportation facility if it:

a. Changes the functional classification of an existing or planned transportation facility;

b. Changes standards implementing a functional classification system;

c. Allows types or levels of land use that would result in levels of travel or access what are inconsistent with the functional classification of a transportation facility; or

d. Would reduce the level of service of the facility below the minimum acceptable level identified in the Transportation System Plan.

Amendments to the comprehensive plan and land use regulations which significantly affect a transportation facility shall assure that allowed land uses are consistent with the function, capacity, and level of service of the facility identified in the Transportation System Plan. This shall be accomplished by one of the following:

a. Limiting allowed land uses to be consistent with the planned function of the transportation facility;

b. Amending the Transportation System Plan to ensure that existing, improved or new transportation facilities are adequate to support the proposed land uses consistent with the requirement of the Transportation Planning Rule; or,

c. Altering land use designations, densities, or design requirements to reduce demand for automobile travel and meet travel needs through other modes.
Recommended Policies for Pedestrian and Bicycle Circulation

To comply with objectives of the Transportation System Plan and the Transportation Planning Rule, it is recommended that the small jurisdiction amend its Comprehensive Plans with policies such as the following to protect, support, and encourage bicycle and pedestrian travel.

Comprehensive Plan Policies:

- **It is the policy of the City of Jordan Valley to plan and develop a network of streets, access ways, and other improvements, including bikeways, sidewalks, and safe street crossings to promote safe and convenient bicycle and pedestrian circulation within the community.**

- The City of Jordan Valley shall require streets and access ways where appropriate to provide direct and convenient access to major activity centers, including downtown, schools, shopping areas, and community centers.

- In areas of new development the City of Jordan Valley shall investigate the existing and future opportunities for bicycle and pedestrian access ways. Many existing access ways such as user trails established by school children distinguish areas of need and should be incorporated into the transportation system.

- Bikeways shall be included on all new arterial and collectors within the Urban Growth Boundary except on limited access freeways.

- Retrofitting existing streets with sidewalks shall proceed on a prioritized schedule.

- Priority shall be given to developing access ways to major activity centers within the Urban Growth Boundary, such as the downtown commercial center, schools, and community centers.

- Bikeways and pedestrian access way shall connect to local and regional travel routes.

- Bikeways and pedestrian access ways shall be designed and constructed to minimize potential conflicts between transportation modes. Design and construction of such facilities shall follow the guidelines established by the Oregon Bicycle and Pedestrian Plan.

- Maintain and repair of existing bikeways and pedestrian access ways (including sidewalks) shall be given equal priority to the maintenance and repair of motor vehicle facilities.

- A citizens advisory committee shall be established to protect and promote bicycle and pedestrian transportation within the Urban Growth Boundary.
Recommended Ordinances for Bicycle Parking

- A minimum of 2 bicycle parking spaces per use (one sheltered and one unsheltered) shall be required.

- The following Special Minimum Standards shall be considered as supplemental requirements for the number of required bicycle parking spaces.

  - **Multi-Family Residences.** Every residential use of four (4) or more dwelling units shall provide at least one sheltered bicycle parking space for each unit.

  - **Parking Lots.** All public and commercial parking lots and parking structures shall provide a minimum of one bicycle parking space for every 10 motor vehicle parking spaces.

  - **Schools.** Elementary and middle schools, both private and public, shall provide one bicycle parking space for every 10 students and employees. High schools shall provide one bicycle parking space for every 5 students and employees. All spaces shall be sheltered under an eave, overhang, independent structure or similar cover.

  - **Downtown Areas.** In downtown areas with on-street parking, bicycle parking for customers shall be provided along the street at a rate of at least one space per use. Spaces may be clustered to serve up to six (6) bicycles; at least one cluster per block shall be provided. Bicycle parking spaces shall be located in front of the stores along the street, either on the sidewalks in specially constructed areas such as pedestrian curb extensions. Inverted "U" style racks recommended. Bicycle parking shall not interfere with pedestrian passage, leaving a clear area of at least 5 feet. Customer spaces are not required to be sheltered. Sheltered parking (within a building, or under an eave, overhang, or similar structure) shall be provided at a rate of one space per 10 employees, with a minimum of one space per store.

  - **Rural Schools, Service Centers, and Industrial Parks.** Where a school, service center, or industrial park is located 5 or more miles from the closest urban area or rural residential subdivision with a density of more than one dwelling unit per 20 acres, a minimum of two bicycle parking spaces per use shall be required.

- The following formulas for Calculating the Number of Required Bicycle Parking Spaces are recommended.

  - Fractional numbers of spaces shall be rounded up to the next whole space.

  - For facilities with multiple uses (such as commercial center), the bicycle parking requirements shall be calculated by using the total number of motor vehicle parking spaces for the entire development.
Approval of Subdivision Tentative Plans and Final Plats. Information required shall include the location and design of all proposed pedestrian and bicycle facilities, including access ways.

1. Pedestrian and Bicycle Circulation.

a) On-site facilities shall be provided that accommodate safe and convenient pedestrian and bicycle access within new subdivisions, multi-family developments, planned development, shopping centers, and commercial districts, and connecting to adjacent residential areas and neighborhood activity centers within one-half mile of the development. Residential developments shall include streets with sidewalks and access ways. Pedestrian circulation through parking lots shall be provided in the form of access ways.

b) Bikeways shall be required along arterial and collectors with ADT’s greater than 3,000. Sidewalks shall be required along arterial, collectors, and most local streets, except that sidewalks are not required along controlled access roadways (freeways).

2. Cul-de-Sacs and Access ways.

a) Cul-de-sacs or permanent dead-end streets may be used as part of a development plan; however, through streets are encouraged except where topographical, environmental, or existing adjacent land use constraints make connecting streets infeasible. Where cul-de-sacs are planned, access ways shall be provided connecting the ends of cul-de-sacs are planned, access ways shall be provided connecting the ends of cul-de-sacs to each other, to other streets, or to neighborhood activity centers.

b) Access ways for pedestrians and bicyclists shall be 10 feet wide and located within 20-foot-wide right-of-way or easement. If the streets within the subdivision are lighted, the access ways shall also be lighted. Stairs or switchback paths may be used where grades are steep.

c) Access ways for pedestrians and bicyclists shall be provided at mid-block where the block is longer than 600 feet.

d) The Hearings Body or Planning Director may determine, based upon evidence in the record, that an access way is impracticable. Such evidence may include but is not limited to:

i) Physical or topographic conditions make an access way connection impractical. Such conditions include but are not limited to freeways, railroads, extremely steep slopes, wetlands, or other bodies of water where a connection cannot reasonably be provided.

ii) Buildings or other existing development on adjacent lands physically preclude a connection now or in the future, considering potential for redevelopment.
iii) Where access ways would violate provisions of leases, easements, covenants, restrictions, or other agreements existing as of May 1, 1995 that preclude a required access way connection.
APPENDIX C
TRANSPORTATION SYSTEMS FUNDING SOURCES

Table 1: Summary of Road-Related Transportation Funding Programs: Federal Sources
Table 2: Summary of Road-Related Transportation Funding Programs: State Sources
Table 3: Summary of Road-Related Transportation Funding Programs: Local Sources
Table 4: Currently Used Revenue Sources For Cities
Table 5: Summary of Transit Funding Programs
Table 6: Currently Used Transit Revenue Sources in Oregon
Table 1
Transportation Systems Plan
Summary of Road-Related Transportation Funding Programs: Federal Sources

<table>
<thead>
<tr>
<th>Program Name</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intermodal Surface Transportation Efficiency Act (ISTEA)</td>
<td>ISTEA is designed to provide flexibility in federal funding of transportation projects. ISTEA established several funding programs including the 1) National Highway System; 2) Interstate Program; 3) Surface Transportation Program; 4) Congestion Management and Air Quality Improvements Program; and 5) National Scenic Byways Program.</td>
</tr>
<tr>
<td>Surface Transportation Program (STP)</td>
<td>The Surface Transportation Program was authorized by Title I of the ISTEA. The STP funds are allocated to the State and suballocated to cities and counties on a formula basis by the Oregon Transportation Commission. STP funds may be used for any road that is not functionally classified as a local or rural minor collector and must be included in the Transportation Improvement Program to receive STP funds.</td>
</tr>
<tr>
<td>Transportation Enhancement Program (Part of STP)</td>
<td>The ISTEA includes provisions that require the State to set aside a portion of its Surface Transportation Program (STP) funds for projects that will enhance the cultural and environmental value of the State's transportation system. Eligible transportation enhancement projects must be directly related to the intermodal transportation system. This program funds enhancements including pedestrian and bicycle facilities; preservation of abandoned railway corridors; landscaping and other scenic beautification; control and removal of outdoor advertising; acquisition of scenic easements and scenic or historic sites; scenic or historic highway programs; historic preservation; rehabilitation and operation of historic transportation buildings, structures or facilities; archaeological planning and research; and mitigation of water pollution due to highway runoff.</td>
</tr>
<tr>
<td>Highway Enhancement System (HES)</td>
<td>The FHWA Highway Enhancement System Program provides funding for safety improvement projects on public roads. Safety improvement projects may occur on any public road and must be sponsored by a county or city. To be eligible for Federal aid, a project should be part of either the annual element of a Regional Transportation Plan or the annual listing of rural projects by ODOT, although they do not have to be part of the approved State Highway Improvement Program to receive HES funding.</td>
</tr>
<tr>
<td>Timber Receipts (USFS)</td>
<td>The United States Forest Service shares 25 percent of national forest receipts with counties. By Oregon law (ORS 294.060), the County then allocates 75 percent of the national forest receipts to the road fund and 25 percent to local school districts.</td>
</tr>
<tr>
<td>Community Development Block Grants (CDBG)</td>
<td>Community Development Block Grants (CDBG) are administered by the Department of Housing and Urban Development (HUD) and could potentially be used for transportation improvements in eligible areas.</td>
</tr>
</tbody>
</table>

Table 2
City of Adrian
Transportation System Plan
Appendix C-2
January 1998
Transportation Systems Plan
Summary of Road-Related Transportation Funding Programs: State Level

<table>
<thead>
<tr>
<th>Program/Name</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>State Highway Fund</td>
<td>The State Highway Fund composed of gas taxes, vehicle registration fees, and weight-mile taxes assessed on freight carrier. In 1994, the state gas tax was $0.24 per gallon. Vehicle registration fees were $15 annually. Revenues are divided as follows: 15.57 percent to cities, 24.38 percent to counties, and 60.05 percent to ODOT. The city share of the State Highway Fund is allocated based on population. ORS 366.514 requires at least one percent of the State Highway Fund received by ODOT, counties and cities be expended for the development of footpaths and bikeways. ODOT administers the bicycle funds, handles bikeway planning, design, engineering and construction, and provides technical assistance and advice to local governments concerning bikeways.</td>
</tr>
<tr>
<td>Special Public Works Fund (SPWF)</td>
<td>The State of Oregon allocates a portion of revenues from the state lottery for economic development. The Oregon Economic Development Department provides grants and loans through the SPWF program to construct, improve and repair infrastructure to support local economic development and create new jobs. The SPWF provides a maximum grant of $500,000 for projects that will help create a minimum of 50 jobs.</td>
</tr>
<tr>
<td>Transportation Access Charges</td>
<td>The most familiar form of a transportation access charge is a bridge or highway toll. Transportation access charges are most appropriate for high-speed, limited access corridors; service in high-demand corridors; and bypass facilities to avoid congested areas. Congestion pricing, where drivers are charged electronically for the trips they make based on location and time of day, is the most efficient policy for dealing with urban congestion. It not only generates revenue for maintenance and improvements; but also decreases congestion and the need for capital improvements by increasing the cost of trips during peak periods.</td>
</tr>
<tr>
<td>Immediate Opportunity Fund (IOF)</td>
<td>Financed at a level of $5 million per year to a maximum of $40 million through FY96. The fund is to support specific economic developments in Oregon through the construction and improvement of roads and is restricted for use in situations that require a quick response and commitment of funds. It is anticipated that the maximum amount available for a single project is $500,000 or 10 percent of the annual program level. This fund may be used only when other sources of financial support are unavailable or insufficient and are not a replacement or substitute for other funding sources.</td>
</tr>
<tr>
<td>OR Transportation Infrastructure Bank</td>
<td>As a pilot program for the USDOT, the Oregon Transportation Commission has made $10 million available from projects that will not be contracted in FY 1996. The OTIB will make loans for transportation projects and will offer a variety of credit enhancements. Initial loans must be for improvements on federal aid highways, repayments go into an account that will be made available for any mode. Ability to repay will be a key factor in all loans.</td>
</tr>
<tr>
<td>Traffic Control Projects</td>
<td>The State maintains a policy of sharing installation, maintenance, and operational costs for traffic signals and luminaire units at intersections between State highway and city streets (or county roads). Intersections involving a State highway and a city street (or county road) which are included on the state-wide priority list are eligible to participate in the cost sharing policy. ODOT establishes a statewide priority list for traffic signal installations on the State Highway System. The priority system is based on warrants outlined in the Manual for Uniform Traffic Control Devices. Local agencies are responsible for coordinating the statewide signal priority list with local road requirements.</td>
</tr>
</tbody>
</table>
### Table 3
Transportation Systems Plan
Summary of Road-Related Transportation Funding Programs: Local Sources

<table>
<thead>
<tr>
<th>Program Name</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Special Assessments/Local Improvements Districts</td>
<td>Special assessments are charges levied on property owners for neighborhood public facilities and services, with each property assessed a portion of total project cost. They are commonly used for such public works projects as street paving, drainage, parking facilities and sewer lines. The justification for such levies is that many of these public works activities provide services to or directly enhance the value of nearby land, thereby providing direct and/or financial benefit to its owners. Local Improvement Districts (LIDs) are legal entities established by the City to levy special assessments designed to fund improvements that have local benefits. Through a local improvement district (LID), streets or other transportation improvements are constructed and a fee is assessed to adjacent property owners.</td>
</tr>
<tr>
<td>Systems Development Charges (Impact Fees)</td>
<td>Systems Development Charges (SDCs) are fees paid by land developers intended to reflect the increased capital costs incurred by a municipality or utility as a result of a development. Development charges are calculated to include the costs of impacts on adjacent areas or services, such as increased school enrollment, parks and recreation use, or traffic congestion. Numerous Oregon cities and counties presently use SDCs to fund transportation capacity improvements. SDCs are authorized and limited by ORS 223.297 - 223.314.</td>
</tr>
<tr>
<td>Local Gas Tax</td>
<td>A local gas tax is assessed at the pump and added to existing state and federal taxes. Tillamook, The Dalles and Woodburn are Oregon cities that have a local gas tax. Multnomah and Washington Counties also have gas taxes.</td>
</tr>
<tr>
<td>Local Parking Fees</td>
<td>Parking fees are a common means of generating revenue for public parking maintenance and development. Most cities have some public parking and many charge nominal fees for use of public parking. Cities also generate revenues from parking citations. These fees are generally used for parking-related maintenance and improvements.</td>
</tr>
<tr>
<td>Street Utility Fee</td>
<td>Most city residents pay water and sewer utility fees. Street user fees apply the same concept to city streets. A fee would be assessed to all businesses and households in the city for use of streets based on the amount of use typically generated by a particular use. For example, a single-family residence might, on average, generate 10 vehicle trips per day compared to 130 trips per 1,000 square feet of floor area for retail uses. Therefore, the retail use would be assessed a higher fee based on higher use. Street services fees differ from water and sewer fees because usage cannot be easily monitored. Street user fees are typically used to pay for maintenance more than for capital projects.</td>
</tr>
<tr>
<td>Vehicle Registration Fees</td>
<td>Counties can implement a local vehicle registration fee. The fee would operate similar to the state vehicle registration fee. A portion of the County fee would be allocated to the City.</td>
</tr>
<tr>
<td>Property Taxes</td>
<td>Local property taxes could be used to fund transportation, although this is limited by Ballot Measure 5 and 47.</td>
</tr>
<tr>
<td>---------------</td>
<td>---------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Revenue Bonds</td>
<td>Revenue Bonds are bonds whose debt service is financed by user charges, such as service charges, tolls, admissions fees, and rents. If revenues from user charges are not sufficient to meet the debt service payments, the issuer generally is not legally obligated to levy taxes to avoid default, unless they are also based by the full faith and credit of the insuring governmental unit. In that case, they are called indirect general obligation bonds. Revenue bonds could be secured by a local gas tax, street utility fee, or other transportation-related stable revenue stream.</td>
</tr>
<tr>
<td>Facility</td>
<td>Revenue Source</td>
</tr>
<tr>
<td>----------</td>
<td>----------------</td>
</tr>
<tr>
<td>Streets/Bridges/Sidewalks/Bike Lanes</td>
<td>Oregon Highway Trust Fund</td>
</tr>
<tr>
<td>General Fund Transfers</td>
<td>9% or $15.</td>
</tr>
<tr>
<td>Special Property Tax Levies</td>
<td>5% or $7.</td>
</tr>
<tr>
<td>Improvement District Assessments</td>
<td>7% or $12.5.</td>
</tr>
<tr>
<td>Systems Development Charges/Traffic Impact Fees</td>
<td>4% or $7.</td>
</tr>
<tr>
<td>Utility Franchise Fees</td>
<td>3% or $4.</td>
</tr>
<tr>
<td>Interest Earnings</td>
<td>4% or $6.</td>
</tr>
<tr>
<td>Local Gas Tax</td>
<td>0.44% or $0.7</td>
</tr>
<tr>
<td>Private Contributions</td>
<td>3% or $4.3</td>
</tr>
<tr>
<td>Misc. - permit fees, fines, parking, Motel Tax, other</td>
<td>8% or $14.5.</td>
</tr>
<tr>
<td>Federal - FHWA+HUD</td>
<td>3% or $5.6</td>
</tr>
<tr>
<td>Misc. State Revenues - mainly Lottery funds.</td>
<td>2% or $3.</td>
</tr>
<tr>
<td>Off-street Bike Paths</td>
<td>Misc. general funds &amp; ISTEA</td>
</tr>
<tr>
<td>Program Name</td>
<td>Description</td>
</tr>
<tr>
<td>--------------------------------------------------</td>
<td>-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td><strong>FEDERAL SOURCES</strong></td>
<td>All funds from the Federal Transit Administration (FTA) pay 80 percent of capital costs and require a 20 percent local match.</td>
</tr>
<tr>
<td>FTA Section 18</td>
<td>Section 18 is a federally sponsored program for small urban and rural areas (under 50,000 population) to support both capital and operating needs. These funds are dispersed through ODOT and distributed on a population basis.</td>
</tr>
<tr>
<td>FTA Section 16</td>
<td>These funds are distributed through ODOT to support the capital needs of nonprofit social service transportation providers. Funding of paratransit vehicles for public agencies is done through FTA Section 16.</td>
</tr>
<tr>
<td>FTA Section 9</td>
<td>If an urban area reaches a population of 50,000, it will no longer be eligible for Section 18 funds but will be eligible for Section 9 funds for urban populations greater than 50,000. Operating assistance is available to a predetermined regional cap based on the size and productivity of the operation. Capital assistance is available with a limit of 80 percent of a capital project. FTA funds are allocated to transit agencies based on a complex formula which includes population, population density, and the number of revenue service hours operated within a year.</td>
</tr>
<tr>
<td>FTA Section 3</td>
<td>FTA Section 3 funds are limited to capital purchases and fall into three categories: 1) bus/bus facilities, 2) new rail starts, and 3) rail upgrade. As with other FTA grants, the Section 3 Discretionary funds provide 80 percent funding with a 20 percent required local match.</td>
</tr>
<tr>
<td>Congestion Management/Air Quality Program (CMAQ)</td>
<td>This program was included in ISTEA for non-attainment areas as defined in the Federal Clean Air Act. ISTEA funds are administered by ODOT and are generally focused on air quality improvements.</td>
</tr>
<tr>
<td><strong>STATE SOURCES</strong></td>
<td></td>
</tr>
<tr>
<td>Oregon Public Transit Assistance (In-Lieu Payroll Tax)</td>
<td>This fund source is a local payroll tax disbursed by the state to support transit services. To be eligible for these funds, a transit district must be formed and it must be generating local revenues (i.e., property tax). The amount is determined based on the number of State and Federal employees within the Transit District and is the reimbursement of payroll taxes collected from those employees. There is a restriction on the funds specifying that the amount of money received cannot exceed the amount of funding generated locally through the property tax. These funds can be used to support operations or as local match for federal capital grants.</td>
</tr>
</tbody>
</table>
### Developer Impact Fees

An impact fee is a charge imposed on new development to compensate for its impact on the local transportation infrastructure. A fee is typically assessed on square footage of planned development. Impact fees can be implemented by local ordinance with specific criteria for establishing an impact fee and can be imposed in downtown urban areas or in outlying growth areas.

An impact fee is a controversial measure and, like other developer fees, must show a connection between the development and the service provided.

### Parking Taxes and Fees

A parking tax or fee could be levied by a city and all or a portion of it dedicated to transit uses. Many downtown areas levy parking fees and as the city grows, the levy can be used as a strategy to encourage transit use for trips to the downtown area.
<table>
<thead>
<tr>
<th>Transit Service Type/Function</th>
<th>Funding Source</th>
<th>Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>Urban Public Transportation</td>
<td>1. Local Payroll Tax - operating</td>
<td>1. Major Source - $100 million/yr. Growing - Sensitive to Economic Conditions</td>
</tr>
<tr>
<td>(Portland &amp; Eugene)</td>
<td>2. Federal grants - capital</td>
<td>2. Major source - $10 million/yr - Stable</td>
</tr>
<tr>
<td>(operating &amp; capital)</td>
<td>3. Federal grants - operating</td>
<td>3. Minor source - $5 million/yr - Declining</td>
</tr>
<tr>
<td></td>
<td>4. Fares &amp; advertising</td>
<td>4. Minor source - Growing w/ridership</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Urban Public Transportation</td>
<td>1. Property tax (typically a taxbase or stand-alone levy w/in $10 cap for local gov’t services)</td>
<td>1. Major Source - Growing Slowly</td>
</tr>
<tr>
<td>(Salem, Corvallis, Medford, K-Falls)</td>
<td>2. Federal grants - capital</td>
<td>2. Major Source - $2 million/yr. - Stable</td>
</tr>
<tr>
<td>(operating &amp; capital)</td>
<td>3. Federal grant - operating</td>
<td>3. Major Source - $2 million/yr. - Declining</td>
</tr>
<tr>
<td></td>
<td>4. Fares &amp; advertising</td>
<td>4. Minor Source - Growing w/ridership</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Small City &amp; Rural</td>
<td>1. Federal grants - capital &amp; operating</td>
<td>1. Major Source - Declining</td>
</tr>
<tr>
<td>(Astoria, Union County, etc.)</td>
<td>2. Local Property Tax (typically w/in city or county operating levy)</td>
<td>2. Major Source - Stable</td>
</tr>
<tr>
<td>(operating &amp; capital)</td>
<td>3. Fares, donations &amp; advertising</td>
<td>3. Minor Source - Stable</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mobility for Seniors &amp; People with Disabilities -</td>
<td>1. Special Transportation Fund (2% state cigarette tax) - operating &amp; capital</td>
<td>1. Major Source - $5 million/yr. - Declining</td>
</tr>
<tr>
<td>(operating &amp; capital)</td>
<td>2. Social Service Agency grants / contracts - operating</td>
<td>2. Major Source - Declining</td>
</tr>
<tr>
<td></td>
<td>3. Local Property Tax (typically w/in city or county operating levy)</td>
<td>3. Minor Source - Stable</td>
</tr>
<tr>
<td></td>
<td>5. Fares, donations advertising</td>
<td>5. Minor - Stable</td>
</tr>
<tr>
<td>(operating &amp; capital)</td>
<td>2. Branch &amp; feeder routes: Private capital, Fares</td>
<td>2. Private</td>
</tr>
</tbody>
</table>
APPENDIX D
MALHEUR COUNTY TSP FINANCIAL PLAN
CHAPTER 8:
FINANCIAL PLAN

INTRODUCTION

The Malheur County TSP financial plan includes a transportation financing program that includes:

- a list of planned transportation facilities and major improvements;
- a general estimate of the timing for planned transportation facilities and major improvements;
- determination of planning level cost estimates for the transportation facilities and major investments identified in the TSP (intended to provide an estimate of the fiscal requirements to support the land uses in the acknowledged comprehensive plan(s) and allow jurisdictions to assess the adequacy of existing and possible alternative funding mechanisms); and,
- a discussion of existing and potential financing sources to fund the development of each transportation facility and major improvement (which can be described in terms of general guidelines or local policies).

The timing and financing provisions in the transportation financing program are not considered a land use decision as defined by the TPR and ORS 197.712(2)(e) and, therefore, cannot be the basis of appeal under State law. In addition, the transportation financing program is to implement the comprehensive plan policies which provide for phasing of major improvements to encourage infill and redevelopment of urban lands prior to facilities which would cause premature development of urbanizable areas or conversion of rural lands to urban uses.

This chapter summarizes the financing program defined for the Malheur County TSP as required by the TPR. It summarizes the transportation improvement projects, identifies general timing and rough cost estimates of transportation system improvements, and summarizes the existing and potential future financial resources to pay for these improvements, as a general policy guideline.

TRANSPORTATION SYSTEM IMPROVEMENTS - COST AND TIMING

The total cost of all transportation system improvements in Malheur County is expected to exceed $33 million. Malheur County’s portion of these costs is estimated at almost $9 million. These improvements include roadway, bicycle and airport facility improvements on the State and County transportation system over the next 20 years (as identified in Chapter 7 - TSP).

Appendix E summarizes the individual projects along with their planning-level cost estimates. All costs are estimated in constant 1997 dollars. Table 8-1 provides an estimate of the schedule (five-year increments) and jurisdiction (State, County, city and private) responsible for making major roadway improvements. Descriptions of the types of projects and their associated costs follow.
Table 8.1

<table>
<thead>
<tr>
<th>PARTNERSHIP</th>
<th>YEARS</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-8</td>
<td>R-4</td>
</tr>
<tr>
<td>11-18</td>
<td>R-5</td>
</tr>
<tr>
<td>20+</td>
<td>R-6</td>
</tr>
</tbody>
</table>

**NOTES:**
- Cost per year measurement is based on the first year of the ODOT Capital Improvement Plan (CIP) for construction projects and on the second year of the CIP for maintenance projects.
- All costs are in the current year dollars.
- Costs are rounded to the nearest thousand dollars.
- Costs are subject to change due to inflation and other factors.
- Costs are inclusive of indirect costs such as administrative and engineering costs.
Roadways

Fourteen roadway improvement projects will be needed to upgrade the roadway and highway system within Malheur County over the next 20 years. Approximately $31 million of the total transportation system improvements are attributed to these roadway projects. Target dates for project construction have been tentatively identified by five-year increment, as illustrated in Table 8-1.

Bicycle Facilities

New bicycle facilities (along collector/arterial roads) in the Malheur County transportation system will increase by approximately 32 miles, most of which are included in roadway improvement projects. The Graham Boulevard/Bully Creek Road shoulder widening project, estimated at $1.7 million provides a significant system improvement linking Bully Creek Reservoir to the major state highway system of bicycle facilities.

Pedestrian Facilities

New pedestrian facilities (along collector/arterial roads) in the Malheur County transportation system will also increase by approximately 32 miles, all of which are included in roadway improvement projects.

Airport Facilities

The estimated cost for the siting and development of a new airstrip in the Jordan Valley area is $250,000. The Malheur County's share of that amount is estimated to be $125,000, planned for completion in the 11-15 year time frame.

Timing

Project priorities have been grouped into five-year categories. Table 8-1 summarizes the improvements that will occur within those time frames. Malheur County expenditures to extend and improve Railroad Avenue are the greatest in the first 10 years, averaging about $290,000 per year. Other major expenditures for transportation improvements are expected in the last 10 years for an estimated $5 million to widen Bully Creek Road and extend Stanton Boulevard and Columbia Boulevard. The County will be expected to make investments to improve transportation facilities for existing development and to improve major collectors and arterials that serve the entire area.
EXISTING AND HISTORIC FINANCING SOURCES

Road-Related Funding

In 1992, Oregon received $704 million, or 67 percent of its highway revenues, from the collection of user taxes and fees. The second largest category is almost entirely comprised of the sale of timber logged from National Forests. In 1992, these timber receipts raised roughly $115 million. The remaining revenue sources - road and crossing tolls, general fund appropriations, property taxes, miscellaneous receipts and bond receipts - accounted for $223.5 million or roughly 21 percent of total transportation revenues.

The most significant portion of Oregon’s highway user taxes and fees come from federal fuel and vehicle taxes, state taxes, and general motor vehicle fees. These categories account for 32 percent, 34 percent, and 25 percent, respectively, of all highway user taxes and fees collected in the state. During the 1980’s, Oregon’s transportation budget was bolstered by a series of two-cent annual gas tax increases. At the same time, the Federal Government was increasing investment in highways and public transportation. The situation is different today. The last two Legislatures failed to increase the gas tax and federal budget cuts are reducing transportation funding available to Oregon. The State Highway Fund is further losing buying power because the gas tax is not indexed to inflation, and increased fuel efficiency of vehicles reduces overall consumption.

Oregon Highway Trust Fund revenues are distributed among state (60.22 percent), County (24.38 percent) and City (15.40 percent) governments to fund their priority road needs. In 1995-96, the state estimated it would collect $575 million in state highway funds. Counties and cities would then receive about $140 and $90 million, respectively.

Oregon law allows local government, in addition to receiving state highway trust fund revenues, to levy local fuel taxes for roadway related improvements. Multnomah and Washington Counties, and some small cities (Tillamook, The Dalles, Woodburn) have used this authorization. Several attempts have been made by other jurisdictions but have not been supported by the electorate. As few local governments have implemented this option, non-user road revenues tend to be relied upon, to supplement the funds received from state and federal user revenues. Other local funding sources have included property tax levies, local improvement district assessments, bonds, traffic impact fees, road user taxes, general fund transfers, receipts from other local governments, and other miscellaneous sources.

Oregon’s basic vehicle registration fee is $15 per year regardless of the vehicle being registered. Oregon law permits local governments (counties) and governmental entities to impose local option vehicle registration fees. To date, no county has implemented this tax.

Cities have relied more than counties on transfers from their general funds to support roadway improvements. Ballot Measure 5, however, approved by the voters in 1990, reduced the range of funding and financing options available to both cities and counties. Measure 5 limited the property tax rate for purposes other than for payment of certain general obligation indebtedness to $15 per $1000 of assessed value. The measure further divided the $15 per $1000 property tax
authority into two components: $5 per thousand dedicated to the public schools; the remaining $10 dedicated to other local government units, including cities, counties, special service districts, and other non-school entities. The tax rate limitation for cities and counties went into effect in 1992. The school portion of the measure is being phased in over a five-year period beginning in FY 1992. In 1996, voters again approved a property tax limitation measure, Ballot Measure 47/50, which will further impact the ability of cities and counties to pay for needed infrastructure through historic or traditional means.

At the same time that increased growth and increased transportation demands are occurring, cities and counties have lost another traditional source of revenue for infrastructure construction and upgrade - timber harvest receipts. Under a 1993 negotiated mitigation plan, federal forest receipts to support county roads are decreasing 3 percent per year. In 1996, counties will receive 74 percent of their 1986-90 average receipts, and by 2003 they will receive 55 percent of the late 1980s revenues.

Given this funding environment, current funding levels and sources are not adequate to meet the transportation needs of the State, cities and counties for the next 20 years. In response to this gap between needs and funding, Governor Kitzhaber organized the Oregon Transportation Initiative to look at statewide transportation needs and to develop a program to address how these needs will be met. Through a public process led by business and civic leaders across the state, findings and recommendations on the state of transportation needs and methods to address those needs was submitted to the Governor in July 1996. A result of these recommendations was appointment of a committee to develop a legislative proposal to the 1997 Legislature regarding transportation funding. Part of that proposal identified a "base" transportation system, with a priority of maintenance, preservation and operation of a system of transportation facilities and services that ensures every Oregonian a basic level of mobility within and between communities. It is expected that other components will include efficiencies resulting from better intergovernmental cooperation (shared resources and equipment, better communication on project needs and definition), and elimination of legislative barriers to more efficient and cost-effective methods of providing transportation services. However, the 1997 Legislature failed to pass either the Governor's measures or their own.

A part of transportation funding will be identification of relationships and responsibilities relative to delivery of projects and services. In Oregon, the primary state role has been to construct and maintain the state highway system and to assist local government with funding of other modes. The state also has a role in intercity passenger services and airports. This has historically been minor, but would grow significantly if serious efforts were put into intercity rail improvements. Local governments, in addition to providing local road and bridge construction, maintenance and preservation, provide local transit and airport support. The Federal Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA) began moving decision-making for federal programs to states and this program and other state policies incorporated in the Oregon Transportation Plan (OTP) encourage reassessment of responsibilities and obligations for funding.
These changing relationships have resulted in two significant issues for state and local governments. First, there is no clear definition of state responsibility. At one time, the state operated on an informal consensus that it should provide one-half the match on federally funded local and other projects that served statewide needs. No similar consensus seems to exist today. The state's responsibility for transit, airports and other local transportation infrastructure and services is not clear. The question of regional equity is raised in considering especially high-cost project needs, such as the Bend Parkway or the Portland area light rail program. Regional equity will probably require consideration of all modes together, because different regions may have different modal needs and financial arrangements.

Given this dynamic transportation funding environment, it is clear that local governments need to reassess traditional methods of funding projects and look creatively at ways to meet public expectations of high quality transportation services.

Transit Funding

Transit service in Oregon has evolved from private development and reliance on user fees for operating revenue to public ownership with public subsidy for operations. No clear philosophy of the state role in providing transit services is evident and the state is continuing its discussion on how the state should raise revenue in support of transit. The state has used general funds, lottery funds, stripper well funds, cigarette tax revenue and other funds at various times to support transit service. These efforts have largely been targeted towards supplying half the required match to federal capital improvement grants. Other than the elderly and disabled program, the state has provided no operating funds for transit. The state role has been one of granting authority to local governments to raise locally-generated operating revenue.

Federal Transit Administration (FTA) grants account for 69 percent of Oregon's funding for transit capital construction, which includes purchase of buses and other equipment. Federal funding for transit was increased through the flexibility provided by ISTEA. This federal legislation expired September 30, 1997 and, while new legislation is still pending, there is strong indication that current flexibility will be retained, although it will be dependent on Congressional approval to continue current programs. The largest source of transit operating revenues, $87 million, are local funds, which provide 64 percent of revenues needed for transit operations. Passenger fares cover 22 percent of Oregon's transit system operating costs. Transportation for the elderly and disabled is funded through dedication of two cents of the state cigarette tax and through federal programs.

Airport Funding

Federal grants from the Federal Aviation Administration (FAA) Airport Improvement Program (AIP) are used to support general airport infrastructure improvements, with 90 percent Federal funding and a 10 percent local match. Given the ability to adjust user charges to address inflation, revenues will likely remain stable for operation and maintenance of the airport, particularly in relation to funding issues faced by other transportation modes. and advertising
space in the terminal, and a variety of user fees - fuel flowage fees, aircraft landing fees, terminal rent fees for airlines, rental cars and the restaurant.

MALHEUR COUNTY TRANSPORTATION FUNDING

Revenues for roadway purposes for fiscal years 1991-1996 for Malheur County are summarized in Table 8-2. The majority of funds have been received from state gas tax revenues. The other sources of income have been on interest on reserves, and moneys from the State Highway fund. State Highway Fund moneys have historically been dedicated to operation and maintenance of the road-related system. There are minimal local sources of funding applied to transportation improvements within Malheur County.

In review and summary, it appears that Malheur County is continuing to keep pace with roadway maintenance needs. The County also has some reserve funds to improve a limited number of bridges in the future. However, Malheur County currently has no significant revenue programs to match needed capital improvements over the next 20 years like the Railroad and Alberta Avenue extension projects.

Table 8-2
Malheur County Revenues For Roadway Purposes

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Federal (ISTEA, other)</td>
<td>202,221</td>
<td>92,132</td>
<td>62,930</td>
<td>113,079</td>
<td>430,780</td>
<td>389,708</td>
</tr>
<tr>
<td>State (gas tax, veh.reg.)</td>
<td>1,319,260</td>
<td>1,556,577</td>
<td>1,955,171</td>
<td>1,551,321</td>
<td>1,982,676</td>
<td>1,510,398</td>
</tr>
<tr>
<td>Local (property tax *)</td>
<td>560,657</td>
<td>543,803</td>
<td>560,196</td>
<td>657,500</td>
<td>669,481</td>
<td>N/A</td>
</tr>
<tr>
<td>Other (interest, sales, etc.)</td>
<td>89,786</td>
<td>104,524</td>
<td>117,033</td>
<td>147,886</td>
<td>139,619</td>
<td>N/A</td>
</tr>
<tr>
<td><strong>SUBTOTAL</strong></td>
<td>2,171,924</td>
<td>2,297,036</td>
<td>2,695,330</td>
<td>2,469,786</td>
<td>3,222,556</td>
<td>N/A</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>EXPENSE</th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Carryovers</td>
<td>892,759</td>
<td>1,013,018</td>
<td>1,150,098</td>
<td>1,646,687</td>
<td>1,468,765</td>
<td>N/A</td>
</tr>
<tr>
<td>Dedicated Reserves</td>
<td>498,178</td>
<td>591,520</td>
<td>714,695</td>
<td>625,845</td>
<td>649,580</td>
<td>N/A</td>
</tr>
<tr>
<td>(equipment, bridges, projects)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>TOTAL AVAILABLE</strong></td>
<td>3,562,861</td>
<td>3,901,574</td>
<td>4,560,123</td>
<td>4,742,318</td>
<td>5,340,901</td>
<td>N/A</td>
</tr>
</tbody>
</table>

* only road assessment districts
N/A = not available

POTENTIAL FUTURE TRANSPORTATION FUNDING SOURCES

There are a variety of methods to generate revenue for transportation projects. Funding for transportation improvement projects are derived from three sources: federal, state and local governments. Appendix G provides a summary of federal, state and local highway, bridge, sidewalk, bicycle and transit funding programs that have typically been used in the past.
Although property tax is listed as a possible revenue source, the impacts of Ballot Measure 47/50 are likely significant, but still vague.

Recommendations for Receiving Federal and State Sources

Most Federal funding is passed through ODOT to the local jurisdictions. *A good working relationship with ODOT Region 5 planners and the Region Manager is important to have major transportation improvements included as part of the STIP when it is updated every two years.* ODOT maintains interstate and state highways - in Malheur County this includes I-84 and Highways 20, 26, 78, 95 and 201. State and federal funds administered through ODOT are the primary sources of funding for improvements to this facility. Projects that involve ODOT bridges and highways account for approximately $16 million in the next ten years and $5 million in the remaining 10 year period.

As shown in Figure 8-1, ODOT's contribution towards transportation improvements in unincorporated Malheur County is needed within the next 10 years. The two significant projects include partnering with Malheur County and the City of Ontario to extend Railroad Avenue and improve and extend 18th Street across the UPRR; and replacing obsolete bridges along state highways, particularly across the Snake River. ODOT currently has approximately $12 million in the current STIP for the "Ontario Transportation Solution Package." A portion of this funding package should be dedicated to the Railroad Avenue/18th Street Extension (approximately $6.5 million) and the remaining should be dedicated towards the North-South Arerial (ODOT, City of Ontario and Malheur County project to be determined as part of the Ontario TSP).

*ODOT should update the STIP to prioritize needed bridge improvements.* Current federal and state revenue programs will likely fall short of needs in Malheur County. Hence, *Malheur County and ODOT should take an active role in representing their priorities to the Oregon State Legislature, Governor and members of the US Congress and Senate to enhance state and federal investment in Malheur County bridge infrastructure.*

As noted earlier, the 1997 Oregon Legislature failed to pass enhancements to transportation infrastructure investment. In lieu of statewide funding enhancements, Malheur County must look to local measures to fund future capacity projects.

Recommendations for Developing Local Funding Sources

The 1997 Oregon Legislature failed to adopt statewide funding program enhancements. An increase in Oregon gas tax, associated weight-mile tax, vehicle registration fees and dedicated transit funding would have helped Malheur County (significantly) meet the needs for new transportation system improvements. Without those measures, Malheur County will have to rely on enhanced local funding measures, at least until statewide funding measures are secured. *The County should consider developing local financing to support funding the higher priority projects, to be more attractive for state and federal allocations by providing a larger local match.* Malheur County could consider any one or combination of the following financing measures:
Potential funding sources are typically judged based on a number of criteria, including:

- legal authority;
- financial capacity;
- stability;
- administrative feasibility;
- equity; and
- political acceptability.

In general recognition of these criteria, new LID’s, SDC’s/TIF’s and roadway maintenance fees were considered but dropped as viable, local funding measures for new transportation improvement projects in the Malheur County rural areas for the following reasons:

- roadway maintenance is already funded through current road programs (statewide gas tax/vehicle registration fees and weight-mile taxes), new maintenance/utility fees could be interpreted as over- or double-taxing;
- rural development is not likely to occur at significant levels, yielding low impact fee revenues - or impact fees would need to be extremely high in order to yield significant revenue, quite possibly resulting in discouraging even the smallest of developments (as planned); and,
- LID’s would be difficult to form around large county projects, placing the financial burden disproportionately in select areas instead of across the county (to all those who benefit by the projects).

Hence, the Malheur County TSP includes a more focused evaluation of local gasoline taxes, vehicle registration fees and road improvement bonds as new and viable measures to fund the Malheur County share of needed transportation system improvements. A range of funding options were investigated to ascertain the level of revenue generated based on county-wide application for each funding measure. As described separately below, each county-wide funding measure is also summarized by reporting the revenue generated for each of the County jurisdictions (assuming a revenue distribution to local jurisdictions based on future, year 2017 population).

**Local Vehicle Registration Fee**
Statewide vehicle registration fees are lowest in Oregon ($15/year) when compared to neighboring states, as shown in Table 8-3. Only counties can implement local vehicle registration fees in Oregon. A summary of annual and 20-year revenues from a local vehicle
registration fee in Malheur County is provided in Table 8-4. Local revenues are listed by jurisdiction, with options for both a $10 and $20 local fee in addition to the current $15/year statewide fee. County-wide (including incorporated cities) revenues from a $10-$20 local vehicle registration fee ranges from $8.4 to $16.8 million over 20 years. Revenues allocated to unincorporated Malheur County are estimated at $3.6 million over 20 years based on a $10 per year local vehicle registration fee. Regardless of the option chosen, a local vehicle registration fee would require local voter approval.

Table 8-3
Comparison of Automobile-Related Taxes
(as of March 1997)

<table>
<thead>
<tr>
<th>Tax</th>
<th>Oregon</th>
<th>Washington</th>
<th>California</th>
<th>Idaho</th>
<th>Nevada</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gas Tax</td>
<td>$.24/gal*</td>
<td>$.23/gal</td>
<td>$.25/gal*</td>
<td>$.25/gal</td>
<td>$.28/gal*</td>
</tr>
<tr>
<td>Registration Fee</td>
<td>$15/year</td>
<td>$36/year</td>
<td>$29/year</td>
<td>$28/year</td>
<td>$33/year</td>
</tr>
<tr>
<td>AD Valoreum Tax</td>
<td>$0</td>
<td>$172/year</td>
<td>$148/year</td>
<td>$0</td>
<td>$78/year</td>
</tr>
<tr>
<td>Auto Sales Tax**</td>
<td>$0</td>
<td>$191/year</td>
<td>$191/year</td>
<td>$123/year</td>
<td>$172/year</td>
</tr>
</tbody>
</table>

Source: ODOT, Policy Section.
* California includes sales tax, Oregon and Nevada include local option tax.
** Prorated over eight years.

Table 8-4
Local Vehicle Registration Fee Option

<table>
<thead>
<tr>
<th>Jurisdiction</th>
<th>Population</th>
<th>Distribution</th>
<th>1998 ANNUAL REVENUE</th>
<th>20-YEAR REVENUE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(2017)</td>
<td></td>
<td>Local Vehicle Registration Fee Options</td>
<td>Local Vehicle Registration Fee Options</td>
</tr>
<tr>
<td>Adrian</td>
<td>143</td>
<td>0.4%</td>
<td>$1,500 $2,900</td>
<td>$32,900 $65,700</td>
</tr>
<tr>
<td>Jordan Valley</td>
<td>502</td>
<td>1.4%</td>
<td>$5,100 $10,200</td>
<td>$115,400 $230,800</td>
</tr>
<tr>
<td>Nyssa</td>
<td>3,400</td>
<td>9.3%</td>
<td>$34,500 $69,100</td>
<td>$781,500 $1,563,000</td>
</tr>
<tr>
<td>Ontario</td>
<td>14,364</td>
<td>39.4%</td>
<td>$145,900 $291,800</td>
<td>$3,301,700 $6,603,400</td>
</tr>
<tr>
<td>Vale</td>
<td>2,500</td>
<td>6.9%</td>
<td>$25,400 $50,800</td>
<td>$574,600 $1,149,300</td>
</tr>
<tr>
<td>Unincorporated Co.</td>
<td>15,557</td>
<td>42.7%</td>
<td>$158,000 $316,000</td>
<td>$3,575,900 $7,151,800</td>
</tr>
<tr>
<td>TOTAL</td>
<td>36,466</td>
<td>100.0%</td>
<td>$370,400 $740,800</td>
<td>$8,382,000 $16,764,000</td>
</tr>
</tbody>
</table>

Local Gasoline Tax
Oregon’s state-wide gasoline tax, as summarized in Table 8-3, is quite similar to neighboring states, and is $.01 (per gallon) lower than Idaho. Raising a Malheur County gasoline tax may introduce impacts to the Oregon/Idaho economy of gasoline sales and the revenues they generate locally. By assuming no change in the gasoline sales/revenue economy, the estimated annual and
20-year revenues from a county-wide local gasoline tax can yield significant revenues for transportation system improvements. As shown in Table 8-5, county-wide revenues over a 20-year period range from approximately $6.0 to $12.0 million based on a $0.01-$0.02 local gas tax (per gallon). Revenues allocated to unincorporated Malheur County range from $2.5 to $5.1 million over the next 20 years based on the same local gas tax options.

Table 8-5
Local Option Gas Tax

<table>
<thead>
<tr>
<th>Jurisdiction</th>
<th>Gallons</th>
<th>Population</th>
<th>Distribution</th>
<th>Annual Revenue $0.01/Gal</th>
<th>Annual Revenue $0.02/Gal</th>
<th>20-Year Revenue $0.01/Gal</th>
<th>20-Year Revenue $0.02/Gal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adrian</td>
<td>143</td>
<td>0.4%</td>
<td>$1,200</td>
<td>$2,300</td>
<td>$23,400</td>
<td>$46,900</td>
<td></td>
</tr>
<tr>
<td>Jordan Valley</td>
<td>502</td>
<td>1.4%</td>
<td>$4,100</td>
<td>$8,200</td>
<td>$82,300</td>
<td>$164,600</td>
<td></td>
</tr>
<tr>
<td>Nyssa</td>
<td>3,400</td>
<td>9.3%</td>
<td>$27,900</td>
<td>$55,700</td>
<td>$557,500</td>
<td>$1,115,000</td>
<td></td>
</tr>
<tr>
<td>Ontario</td>
<td>14,364</td>
<td>39.4%</td>
<td>$117,800</td>
<td>$235,500</td>
<td>$2,355,200</td>
<td>$4,710,400</td>
<td></td>
</tr>
<tr>
<td>Vale</td>
<td>2,500</td>
<td>6.9%</td>
<td>$20,500</td>
<td>$41,000</td>
<td>$409,900</td>
<td>$819,800</td>
<td></td>
</tr>
<tr>
<td>Unincorporated Co.</td>
<td>15,557</td>
<td>42.7%</td>
<td>$127,500</td>
<td>$255,100</td>
<td>$2,550,800</td>
<td>$5,101,700</td>
<td></td>
</tr>
<tr>
<td>TOTAL</td>
<td>29,896,036</td>
<td>36,466</td>
<td>100.0%</td>
<td>$298,960</td>
<td>$597,920</td>
<td>$5,979,207</td>
<td>$11,958,414</td>
</tr>
</tbody>
</table>

Road Bond Measure
Local property taxes could be used to fund transportation improvements. Roadway capital improvements are typically funded by a serial levy that implements property taxes for a set period of time, often for a specific set or list of projects. Voter approval is required for serial levies. Since passage of Measures 5 and 47/50, property tax levies are primarily used to support General Obligation bonds that finance transportation improvements, because levies for bonded indebtedness are exempt from property tax limitations.

Table 8-6 summarizes a range of road bond options based on the rate of added bond indebtedness ranging from $.25 to $.60 per $1,000 assessed property value. The estimated 20-year revenues from county-wide bond measure options ranges from $5.5 to $13.1 million. Revenues allocated to unincorporated Malheur County range from $2.3 to $5.6.

Summary
A summary of the estimated revenues generated by the county-wide funding sources described above is provided in Table 8-7. Annual, five-year and 20-year revenues are listed in the table,
## ROAD BOND OPTIONS

20-Year Revenues*

Rate per $1,000 Assessed Value

<table>
<thead>
<tr>
<th>Jurisdiction</th>
<th>Population Distribution</th>
<th>Future</th>
<th>$0.25</th>
<th>$0.30</th>
<th>$0.35</th>
<th>$0.40</th>
<th>$0.45</th>
<th>$0.50</th>
<th>$0.55</th>
<th>$0.60</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adrian</td>
<td>143, 0.4%</td>
<td>$21,400</td>
<td>$25,700</td>
<td>$29,900</td>
<td>$34,200</td>
<td>$38,500</td>
<td>$42,800</td>
<td>$47,000</td>
<td>$51,300</td>
<td></td>
</tr>
<tr>
<td>Jordan Valley</td>
<td>502, 1.4%</td>
<td>$75,100</td>
<td>$90,100</td>
<td>$105,100</td>
<td>$120,100</td>
<td>$135,100</td>
<td>$150,100</td>
<td>$165,200</td>
<td>$180,200</td>
<td></td>
</tr>
<tr>
<td>Nyssa</td>
<td>3,400, 9.3%</td>
<td>$508,500</td>
<td>$610,200</td>
<td>$711,900</td>
<td>$813,500</td>
<td>$915,200</td>
<td>$1,016,900</td>
<td>$1,118,600</td>
<td>$1,220,300</td>
<td></td>
</tr>
<tr>
<td>Ontario</td>
<td>14,364, 39.4%</td>
<td>$2,148,100</td>
<td>$2,577,700</td>
<td>$3,007,400</td>
<td>$3,437,000</td>
<td>$3,866,600</td>
<td>$4,298,200</td>
<td>$4,725,800</td>
<td>$5,155,500</td>
<td></td>
</tr>
<tr>
<td>Vale</td>
<td>2,500, 6.9%</td>
<td>$373,900</td>
<td>$448,600</td>
<td>$523,400</td>
<td>$598,200</td>
<td>$673,000</td>
<td>$747,700</td>
<td>$822,500</td>
<td>$897,300</td>
<td></td>
</tr>
<tr>
<td>Uninc. Co.</td>
<td>15,557, 42.7%</td>
<td>$2,326,500</td>
<td>$2,791,800</td>
<td>$3,257,100</td>
<td>$3,722,400</td>
<td>$4,187,700</td>
<td>$4,653,000</td>
<td>$5,118,400</td>
<td>$5,583,700</td>
<td></td>
</tr>
<tr>
<td>TOTAL</td>
<td>36,466, 100.0%</td>
<td>$5,453,433</td>
<td>$6,544,120</td>
<td>$7,634,806</td>
<td>$8,725,493</td>
<td>$9,816,179</td>
<td>$10,908,868</td>
<td>$11,997,553</td>
<td>$13,088,239</td>
<td></td>
</tr>
</tbody>
</table>

* Based on a 1996/1997 Total Assessed Valuation of $1,090,686,597.
and were used in the process of matching the scope and timing of transportation system needs in Malheur County, with the appropriate type and mix of new funding sources. Table 8-8 summarizes the recommended funding sources (and their implementation period) which include the following:

- $.01 per Gallon, County-wide Local Gas Tax over the next 20 years;
- $10 per year, County-wide Vehicle Registration Fee over the next 20 years; and,
- $0.55 per $1,000 assessed value, Road Bond over the last 10 year period.

The county-wide local gas tax and vehicle registration fee rates, coupled with the current statewide rates, appear to be minimal when compared to other states and jurisdictions. Each measure generates significant revenue, both for the County and cities, and should be relatively stable over the 20-year lifetime of the TSP.

Currently, many of the cities and unincorporated areas of Malheur County have a number of local and county-wide programs funded through property taxes. The introduction of a new county-wide road bond might receive significant opposition within the next few years, but could be well received towards later years in the TSP time frame. To generate the remaining revenue needs within the 20-year TSP, a county-wide road bond levied at $0.55 per $1,000 assessed value over the last 10 years is needed.

### Table 8-7
**Estimated Revenue from Additional Funding Sources**

<table>
<thead>
<tr>
<th>Funding Source and Rate</th>
<th>ADDITIONAL REVENUE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Annual</td>
</tr>
<tr>
<td>County-Wide Local Gas Tax [1]</td>
<td></td>
</tr>
<tr>
<td>$0.01 per gallon</td>
<td>$298,960</td>
</tr>
<tr>
<td>$0.02 per gallon</td>
<td>$597,921</td>
</tr>
<tr>
<td>County-Wide Vehicle Registration Fee [1]</td>
<td></td>
</tr>
<tr>
<td>$10 per year</td>
<td>$370,400</td>
</tr>
<tr>
<td>$20 per year</td>
<td>$740,800</td>
</tr>
<tr>
<td>County-Wide Road Bond</td>
<td></td>
</tr>
<tr>
<td>$0.25 per $1,000 assessed value</td>
<td>$272,672</td>
</tr>
<tr>
<td>$0.30 per $1,000 assessed value</td>
<td>$327,206</td>
</tr>
<tr>
<td>$0.35 per $1,000 assessed value</td>
<td>$381,740</td>
</tr>
<tr>
<td>$0.40 per $1,000 assessed value</td>
<td>$436,275</td>
</tr>
</tbody>
</table>

The Malheur County TSP Financial Plan, summarized previously in Table 8-1, includes the proposed local revenue sources utilizing the recommended local gas tax, vehicle registration fee and road bond funding measures. As only one scenario among many, these financing measures together provide the level of local funding to pay for needed transportation system improvements in rural Malheur County. They also raise significant revenues for transportation system improvements within each of the municipalities.

The diversification of residential, commercial/industrial and agricultural activities in Malheur County makes it difficult to translate the real, added cost of new transportation funding measures. The valuation of homes and industry vary greatly across the County, as do the current property tax levels. For the purposes of illustrating the impact of these new funding measures a simplified summary is provided based on a typical1 household (dwelling) in Malheur County. Table 8-9 summarizes the added expenses for a “typical” dwelling to pay for needed transportation system improvements in the unincorporated areas of Malheur County through these measures. Beginning in 1998, each typical dwelling would pay $42.22 per year in added local gas tax and vehicle registration fees. Beginning in 2008, the 10-year Road Bond would add $66.00 in local property tax to the local gas tax and vehicle registration fees, totaling $108.22 in annual expense to the typical dwelling.

---

1 Single-family dwelling assessed at $120,000, with 2 automobiles accumulating 20,000 miles per year at 18 miles per gallon.
Table 8-9
Added Cost of New Transportation Funding Measures

<table>
<thead>
<tr>
<th>New, County-Wide Transportation Revenue Measures</th>
<th>Added Annual Expense (1997 dollars) for Typical Dwelling</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>In 1998</td>
</tr>
<tr>
<td>20-Year Local Gas Tax ($0.01/gal)</td>
<td>$22.22</td>
</tr>
<tr>
<td>20-Year Local Vehicle Registration Fee ($10/year)</td>
<td>$20.00</td>
</tr>
<tr>
<td>10-Year² Road Bond ($0.55 per $1,000 assessed value)</td>
<td>$66.00</td>
</tr>
<tr>
<td>TOTAL</td>
<td>$42.22</td>
</tr>
</tbody>
</table>

Additional evaluation of the economic impact of any new tax and bonding measures, particularly a local gasoline tax should be completed before a public vote and eventual implementation (assuming voter approval). Furthermore, the introduction of new local funding measures will require significant public support. Those measures adopted by the County will require definition of local programs to administer the fee and/or tax collection programs.

*Malheur County should continue to explore state and federal funding opportunities to meet its long-term transportation needs.* State funding is available for funding bike lane modifications, with a state requirement that one percent of the State Highway Fund be spent for the development of pedestrian and bikeways. Federal ISTEA programs include the Surface Transportation Program that provides funds for any road not classified as a local or rural minor collector. The Transportation Enhancement Program provides funds for enhancing pedestrian and bicycle facilities, landscaping and other scenic beautification, and improvements to scenic or historic sites. This program may be a source of funds for projects that include adding bicycle lanes, sidewalks and off-road pathways. The Highway Enhancement Program provides funds for safety improvement projects on public roads. All of these programs are coordinated through the ODOT Region 5 staff and must be included in the STIP.