# 4.2 Transportation

# 4.2.1 Introduction

The transportation system in West Anchorage includes aircraft, automobiles, trucks, trains, buses, bicycles, and walking. An effective transportation system must accommodate each mode in proportion to its existing and projected level of use. The variety and quality of transportation modes was identified as a community value during the public outreach portion of the West Anchorage District Plan (WADP). Certainly, the efficiency and convenience of the system as well as the interconnectivity of travel modes are central to user satisfaction and important aspects to retain and improve on.

The road network is a key component of the Anchorage transportation infrastructure. Connectivity, maintenance, congestion, and the location of truck routes are important issues to local residents. Traffic levels in West Anchorage are at acceptable levels with peak inter-



section congestion occurring on Minnesota Drive at Northern Lights Boulevard, Spenard, and Tudor Road intersections. Because



(Left) Pedestrians and bikers can only cross 3-ways at the Northern Lights and Minnesota intersection. (Right) This causes jaywalking at busy intersection with high collision rates.

much of West Anchorage is already developed, the potential for increased traffic volumes would come mainly from development of vacant areas within the airport, full build-out of the Sand Lake gravel pits, and infill along Spenard Road and Jewel Lake Road where higher residential densities are encouraged on the *WADP* land use map.

West Anchorage residents place high value on the availability of bicycle and walking pathways for recreation, while non-motorized transportation represents only 9% of total commuting trips.<sup>2</sup> Public transportation and non-motorized transportation are increasing in popularity and importance and may offer a partial solution to some issues involving the surface road network. Transit is credited with reduced costs to MOA and the State for reduced congestion, reduced traffic accidents, reduced pollution.<sup>3</sup> Winter conditions present unique challenges to non-motorized transportation and present a source of frustration for all residents because of varying expectations for maintenance (e.g., bus stops buried in snow, icy pathways covered by snow piles).

The railroad is also an important component of the transportation network, from both a commercial freight and tourism perspective, with its own unique set of opportunities and issues. There has been interest voiced by West Anchorage residents in commuter rail as a new modal choice in the long term. At-grade crossings, vibration and noise, and impact to neighborhoods are focal issues related to railroad operations.

TSAIA and associated general aviation facilities are a central facility for Anchorage and Alaskan residents in general. Due to its prominence in West Anchorage, air transportation is addressed separately in Section 4.3.

AMATS, 2007. "Status of the System"

<sup>&</sup>lt;sup>2</sup> The 2002 Anchorage Household Travel Survey cited in the *LRTP* estimated the total percent of weekdays trips for the following modes: Walking (6%), school buses (2%), public transit (1%), and bicycle (1%)

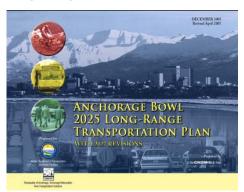
<sup>&</sup>lt;sup>3</sup> Institute of Social and Economic Research, 2006. "The Economic Benefits of Public Transportation in Anchorage"

Anchorage has made substantial improvements to its transportation network in recent years, as well as achieving better coordination of maintenance activities with the State. Planning documents outlined below, provide goals and implementation priorities for transportation improvements. The primary constraint to addressing many transportation deficiencies is funding. The WADP concludes that other than some new segment recommendations, implementation of the functional plans currently in place will adequately address the long-range transportation needs of the area for both motorized (automobiles and trucks) and non-motorized travel modes.

# 4.2.2 Functional Plans and Programs

Functional plans play a key role in the planning fabric of the Municipality. These are typically bowl-wide, single focus plans that apply public funds to a particular planning topic (parks, trails, streets, etc.). They are typically prepared with substantial public outreach and reflect broad community input. Following are descriptions of the key functional plans that relate to transportation issues in West Anchorage.

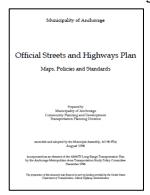
# Long-Range Transportation Plan



The Anchorage Metropolitan Area Transportation Solutions (AMATS) Anchorage Bowl 2025 Long-Range Transportation Plan with 2027 Revisions (LRTP) recommends transportation facilities and services that ensure mobility and accessibility throughout the community. The LRTP is used to identify current and future system deficiencies that need improvement to meet MOA traffic needs for the next 20 years. The AMATS planning and decision-making bodies review and revise the long-range transportation plan every four years. The 2012 revision is called the 2035 Metropolitan Transportation Plan (MTP).

The *LRTP* meets the federal long-range transportation planning requirements the MOA needs to apply for federal transportation funding. The *LRTP* recommended system improvements are funded through the Statewide Transportation Improvement Program (federally funded) and Capital Improvements Program (MOA funding from bond proceeds for road and drainage improvements).

#### Official Streets and Highways Plan



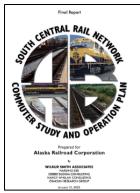
The Official Streets and Highways Plan (OS&HP) identifies the functional street classifications and minimum right-of-way widths required to convey traffic volumes when Anchorage sees new development. The OS&HP identifies (by ordinance) the locations, classifications, and minimum right-of-way requirements of the street and highway system needed to meet LRTP goals over a 25-year planning period. The current OS&HP was approved in 2005 and an update is currently underway.

#### People Mover Route Restructure Plan



The 2009 People Mover Route Restructure Plan Update (Blueprint) is a five-year implementation plan for MOA's People Mover bus system to achieve appropriate service and performance standards. It contains a transit needs-assessment, a bus route analysis/service evaluation, and peer analysis (comparison to cities of similar population and service area). The majority of West Anchorage is served by Routes 7/7A and 36 that span between the airport, downtown Transit Center and Providence Hospital to the east. Large portions of West Anchorage have limited bus service.

# ARRC South Central Rail Network Community Study and Operation Plan



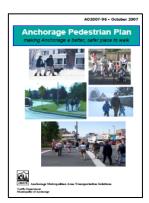
The 2002 ARRC South Central Rail Network Commuter Study and Operation Plan describes scenarios to provide commuter service between the Matanuska-Susitna Borough (Mat-Su), Anchorage, and Girdwood. The Commuter Study describes potential station locations, including one at the Dimond Center and one in Spenard near 36<sup>th</sup> Avenue and Lois Drive that may require land outside the existing ROW, as well as equipment (rolling stock). A Wasilla-only commuter service would be a first phase of the project before service is extended to West Anchorage.

Mat-Su and MOA *LRTPs* recommend the creation of a Regional Transit Authority (RTA) to oversee the creation of a commuter rail system. An

RTA would be multi-jurisdictional sponsoring agency that could provide the framework to authorize contracts, accept contributions, grants or loans, incur obligations and issue bonds, and acquire, manage and convey real property under its mission. Enabling legislation (Senate Bill 152) was introduced in the Alaska 2010 session but did not pass. As of August 2010 MOA hired a contractor to develop the RTA concept. ARRC describes that the *Commuter Study* will be updated with greater detail when MOA and Mat-Su establish and fund an RTA. This study would contain a potential operating schedule, recommendations for equipment, equipment maintenance plan, safety plan and regulatory requirements, ticketing and fare collection, customer service modifications, station locations, station designs, capital costs, financial evaluation and transit integration.

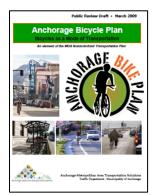
# Non-Motorized Transportation Plan (Pedestrian, Bicycle, Trails)

The Non-Motorized Transportation Plan is a series of three plans designed to integrate the needs of pedestrians, commuting bicyclists, and recreational trail users under the umbrella of the *LRTP*.



#### Anchorage Pedestrian Plan

The 2007 Anchorage Pedestrian Plan is a 20-year framework for improvements to enhance the pedestrian environment (make walkways and intersections safer) and increase opportunities to choose to walk as a mode of transportation (to connect residential areas to schools, parks, and neighborhood shopping). The 2007 Anchorage Pedestrian Plan describes that more compact development encourages increased walking trips. The lowest rate of non-motorized travel in West Anchorage is the Sand Lake area due to its low housing density, lack of mixed land uses, and lack of an established sidewalk/multi-use trail system.

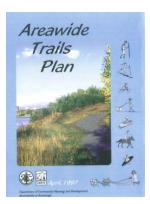


# Anchorage Bicycle Plan

The 2009 Anchorage Bicycle Plan is the second of three non-motorized plans. It has a 20-year outlook to increase the amount and quality of bicycle facilities and increase the use of bicycles for transportation throughout Anchorage. The Bicycle Plan identifies existing conditions and issues, describes bicycle facility design appropriate for Anchorage, and recommends projects based on a bicycle compatibility index in addition to other policy action items.

Some recommended projects are already scheduled as part of roadway improvements in the *LRTP*. For instance, improvements to

Jewel Lake and Raspberry Roads will include accommodation for bicycles. A "core" bicycle network is described in the *Bicycle Plan* "to create integrated bicycle route systems to promote safer and more convenient bicycle commuter travel throughout Anchorage."



#### Areawide Trails Plan

The Areawide Trails Plan adopted in 1997 is the last non-motorized plan to be revised. It contains an inventory of all trails and their current condition, areawide issues, funding, user attitudes, design, maintenance, and implementation. It establishes the foundation, policies, and recommendations for all trail improvements throughout the MOA to 2027. Trail projects including the ARRC ROW multi-use trail and the southern extension of the Tony Knowles Coastal Trail are both high priorities in the list of new trail projects because they represent links or connections to other trails and solve a safety concern, among other criteria.

# Snow Storage and Removal Plan

The *Snow Removal Plan* has not been updated since 2003. It should be updated in order to ensure that snow storage and removal does not impact non-motorized modes of transportation.

#### Safe Routes to School Program



The Safe Routes to School Program is a cooperative program between MOA Traffic and the Anchorage School District (ASD). MOA Traffic reviews school zones every summer to ensure all signs, crosswalks, and markings are in good condition. A committee reviews deficiencies in signage, lights, guards, and traffic assessments to determine what improvements would work best. Crossing guards at school sites are paid for by ASD, but all other roadway improvements are funded through local, state, and federal transportation funds and tracked in the *LRTP* or short-term capital improvement project lists. When school sites cause traffic issues (e.g., Sand Lake Elementary School backs up traffic on Jewel Lake Road), the MOA and ASD work

together to share costs to redesign intersections and resolve internal school circulation patterns.

## 4.2.3 Discussion and Recommendations

# Transportation Objective #1

Focus public transportation service expansions and investment in areas of highest demand.

Public transportation in West Anchorage is provided primarily by the "People Mover" public bus system. Bus routes are focused along a central core that extends along Spenard Road and Jewel Lake Road serving higher density housing, commercial retail, hotel, and entertainment areas. These are some of the most traveled bus routes in Anchorage. Secondary loops extend out from the central core to serve portions of Turnagain, Spenard and east Sand Lake. There is currently no bus service to west Sand Lake, an area with low residential densities and minimal user demand. ARRC built a spur line to provide passenger service from its Ship Creek depot to the airport; however, it does not serve as a public transit service at this time. The *Commuter Study* discusses a possible station in the Spenard area if a south-central Alaska commuter rail system were built.

Issues raised by the public include: the lack of bus service to residential areas outside of the limited bus routes; urgency for increased bus frequency to accommodate work/family schedules; and a desire for improved bus shelter facilities.









(Top) People Mover Route 7 on Spenard Road is one of the busiest in Anchorage, yet many of the stops northeast of Minnesota lack amenities. Bus stops in the Spenard hotel district (bottom left, near Spenard Road and Wisconsin Street) and this stop (bottom right) across from Carrs/Safeway on Northern Lights have benches, lighting, trash containers, and shelter.

#### Bus Service

After consideration of the public transportation issues above, the *WADP* concludes that implementing the existing *Blueprint Restructure Plan*, described in Section 4.2.2, is the most effective mechanism for accomplishing improved bus service. Because the *Blueprint* is a bowl-wide plan, this section highlights only those aspects that are especially relevant to West Anchorage along with any suggested modifications or improvements, if appropriate.

Only new actions or modifications outside the current functional plan are identified as implementation actions in Chapter 5.

The Blueprint recommends extending hours of operation service, increasing bus frequency (15-minute headways during the week and 30-minute headways on weekends), and improving bus stop shelters for Routes 3, 7, 9, and 36 serving portions of West Anchorage. In particular, the Blueprint recommends improvements focus on Route 7/7A because of high user demand and the 24-hour employee work schedules at the airport. New route service, including the recommendation for circulators going to the Klatt, Southport, and Sand Lake areas would require a larger operating budget. Ultimately, the level of public financing (budget) will dictate the level of service that People Mover can provide.

Table 4.2-1 West Anchorage - Key People Mover Blueprint Recommendations				
Recommendation	Description	Importance		
Locations for Service	Continue and/or enhance bus service to the West Anchorage area of Southwest Anchorage, west of Jewel Lake Road; TSAIA and/or employment centers surrounding it; circular service from the Dimond Center area to Jewel Lake Road.	Expanded hours of operation and increased bus frequency are of greater importance to West Anchorage than new routes.  Improvements to bus shelters would also improve rider safety, comfort, neighborhood aesthetics, and morale.		
Route Improve- ments	Improved LOS to bus Route 7 and 36 by decreasing headways (increasing frequency of service), and extending the hours of operation.	Increase bus frequency on routes of highest demand. Funding to increase bus frequency on routes citywide will increase bus ridership.		
Hub Connections	Plan for trunk lines to connect with major transfer hubs for public transit.	The long-range concept for People Mover is to consist of a multi-hub system to speed transfers and compete with automobiles. West Anchorage should accommodate future integration with Midtown Employment Center hub.		
Design Roads for Transit	Continue use of pull-out design for buses on State and MOA roads where transit facility design criteria are met.	Pull-outs cause issues for buses to return to traffic flow; however, pull-outs are preferable for pedestrian and driver safety.		

MOA should continue to support development of the public transportation system by implementing recommendations identified in the *Blueprint* for West Anchorage and adopting the *WADP* land use designations that would increase densities and enhance commercial uses along major transportation corridors.

Transportation planners should consider street typologies in road improvement projects, as they would result in including bus stop locations, bus pull-outs, and connectivity to other modes of transit. Transit facilities are being upgraded by MOA to meet minimum comfort and safety standards as well as meet ADA standards.

#### Commuter Rail Service

The Anchorage Railroad Corporation (ARRC) has long-range plans to invest in infrastructure to create passenger service between Anchorage and nearby communities. The economic viability of a commuter rail project from Mat-Su to Girdwood is not clear at this time, but residents are interested in locating a commuter rail station at Spenard Road between McRae Road and Woodland Drive. The existing Airport rail station has value primarily to TSAIA users.

MOA should continue its active role in the formation of the RTA and ARRC planning processes. Linkages to other modes of public transportation (especially bus service) are critical to achieve a viable multimodal system that will attract committed riders.

# Transportation Objective #2

Expand or complete trail connections that link residential areas and key destinations such as businesses, schools, and employment centers.

The WADP concludes that MOA should implement measures identified in the three components of the Non-Motorized Transportation Plan in order to attain year-round access to an efficient network of non-motorized transportation facilities. Implementation of existing functional plans is the most effective mechanism for achieving key linkages. Because the Non-Motorized Plan is bowl-wide, this section highlights only those aspects that are especially relevant to West Anchorage. Only new actions or modifications outside the current functional plan are identified as implementation actions in Chapter 5 and shown in Exhibit 4-3 Pedestrian Recommendations.

# Non-motorized Transportation (Pedestrian, Bicycle, Trails)

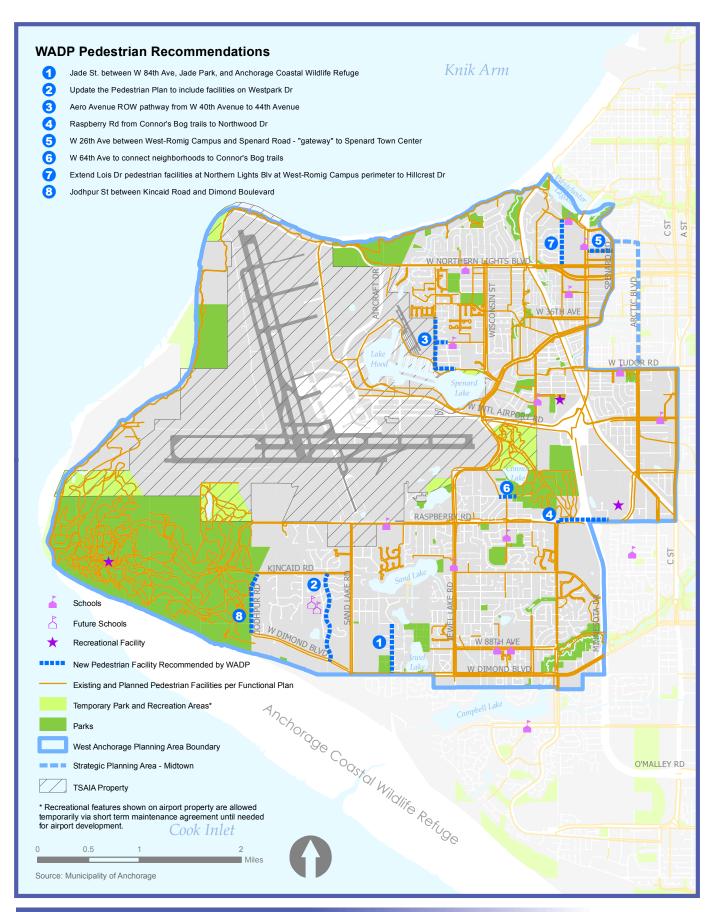
The WADP supports the recommendations of the Non-Motorized Plan because investment in alternative means of transportation (such as bicycle, pedestrian and public transit facilities) reduces automobile dependency and traffic volumes. As part of the review process for State transportation projects, MOA ensures that non-motorized elements are identified and incorporated at the funding and design stages. Numerous connections recommended for the WADP that would amend the non-motorized plans are specified in Chapter 5 Table 5-1.

Between drafts of non-motorized plans, revisions best occur during detailed planning efforts for parks, schools, or large developments. For example, the 2010 Master Plan for the West Anchorage High School and Romig Middle School provides a great opportunity to look at connections from adjacent residential areas to the campus and for student/teacher connections to the Spenard Town Center.

# Pedestrian Facilities

Complete sidewalk networks are not found in the majority of West Anchorage neighborhoods. Impediments to pedestrian facilities include snow storage, utility poles, trash containers, and mailboxes. Sand Lake has the lowest rate of non-motorized travel due to its low housing density, lack of mixed land uses, and lack of established sidewalk/multi-use trail system.

A complete list of priority projects to connect walkways and sidewalks, as well as requisite lighting and safe road crossings needed, are found in the Appendix of the *Anchorage Pedestrian Plan*.



# Bicycle Commuting

West Anchorage contains components of the "core" bicycle network and other key links in the bicycle network that the public desires (Exhibit 2-10). The following road segments in West Anchorage need bikeway construction on existing road corridors and appropriate signage and striping.

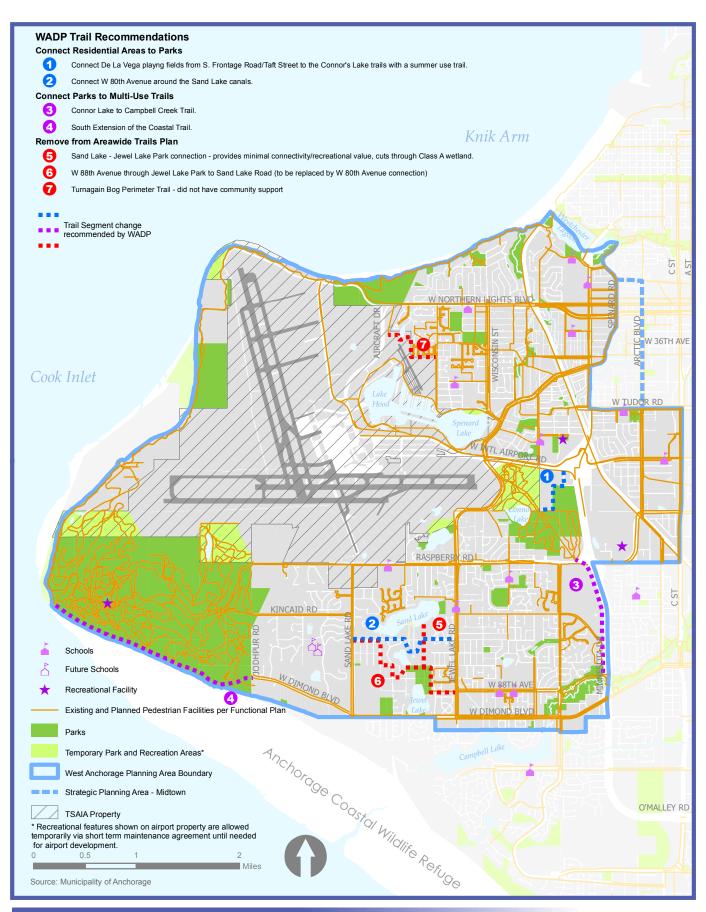
In addition to "core" routes, "non-core" segments were also identified in West Anchorage as being important to local residents. These can be found in Table 5-1.

Table 4.2-2 West Anchorage - Key Bicycle Plan Improvements			
Segment	Need		
East-West Core Routes			
Raspberry Road	Bicycle lane the entire length, including a new road segment connecting Raspberry to West Dowling through Rovenna Street		
Northern Lights/Benson Boulevard couplet	Separated path		
North-South Core Routes			
C Street (north)	Bicycle lane		
Jewel Lake Road (West Dimond to Inter- national Airport Road)	Bicycle lane		
Northwood Drive (Raspberry Road to West Dimond Boulevard)	Bicycle lane		
Victor Road (connection to Northwood Drive)	New road segment with bicycle lane and separated path		
Wisconsin Street	Bicycle lane		
Non-Core Routes			
Aero Road extension to West 44 <sup>th</sup> Avenue	New multi-use pathway segment to connect Lake Hood Elementary with neighborhood; use of boardwalks in places if wetlands exist		
Fish Creek Trail (subset of the ARRC ROW Cross-town Trail from Potter Marsh to Fish Creek/Tony Knowles Coastal Trail)	Extend from Northern Lights Boulevard to the Tony Knowles Coastal Trail		
Raspberry Road (to West 68 <sup>th</sup> Avenue)	new road segment with bicycle lane the entire length (with new road segment outside <i>WADP</i>		
Sand Lake Road (West Dimond Boulevard to Raspberry Road)	Bicycle lane		
Spenard Road (north of Wisconsin)	Bicycle lane Minnesota Drive to Benson Boulevard; Shoulder from Benson to Hillcrest Drive		
West 35 <sup>th</sup> Avenue	Bicycle lane		
West Dimond Boulevard (Kincaid Park/Jodphur Road to Minnesota)	Complete road reconstruction with pedestrian amenities		
West International Airport Road (between Northwood Drive and Spenard Road)	Bicycle lane/separated path		

#### Recreational Trails

A number of revisions to the 1997 *Trails Plan* are recommended in Table 5-1 (T-5) and shown in Exhibit 4-4. They include four trail additions and three trail deletions. Several long-term concepts for West Anchorage, not formalized in the *WADP*, that should be assessed during the *Trails Plan* revision include:

- The future connection between the South Extension of the Tony Knowles Coastal Trail through Kincaid Park (within the *WADP* planning area) to outside the planning area.
- How and whether to connect Sand Lake and Jewel Lake with a trail.
- How and whether to connect Lake Hood/Spenard Lake and the airport's General Aviation area to the Turnagain residential community from Aircraft Drive or Lakeshore Drive.
- Connections between Sand Lake Road and Jodphur Road now that more build-out has occurred.



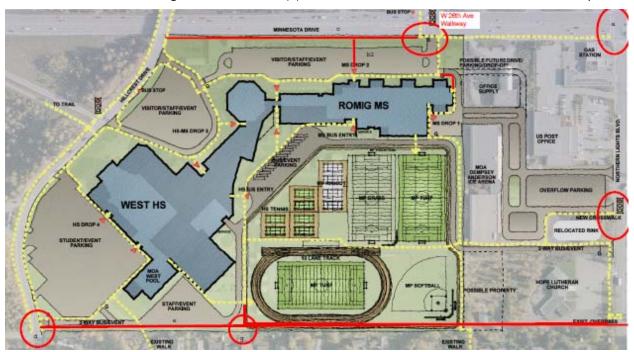
# West-Romig Master Plan

As stated in Transportation Objective #1, area-specific plans provide the opportunity to identify and implement key connections. The 2010 West-Romig Master Plan complements the land uses described in the WADP by providing pedestrian and bicycle connections north-south through the campus to residential neighborhoods and east-west to the Spenard town center. When the West-Romig Master Plan is implemented, the WADP recommends consideration of the following east-west pedestrian connections:

- Maintain and add fence breaks on the western boundary of the campus.
- Create a walkway around the entire building that connects to West 26th Avenue.
- Support the improved pedestrian experience on West 26th Avenue as a gateway to the Spenard town center.

# North-south pedestrian/bike connections:

- Support the informal trail along the western boundary of the campus connecting Hillcrest to West Northern Lights Boulevard.
- Preserve the walkway on the western side of Minnesota from West Northern Lights Boulevard to the Hillcrest Drive overpass.
- Support a mid-block crossing at Northern Lights Boulevard that complements the Carrs/Safeway redesign and a connection to Lois Drive. (Lois Drive is described as a future "Bicycle Avenue" according to the Bicycle Plan. It is not shown in the pedestrian circulation figure below but appears as recommendation #7 in Exhibit 4-3.)



Pedestrian Circulation figure from the 2010 West-Romig Master Plan; WADP areas of interest shown in red.

Another long-term concept for the West-Romig area that was recommended by the master plan committee involves rebuilding the section of Minnesota Drive that parallels the campus as a grade-separated, "cut and cover" roadway. This would eliminate at least two high-risk pedestrian intersections, enhance local traffic flow, and improve connection between community facilities on the west side of Minnesota and the town center land uses on north Spenard.



A family bikes on West 26<sup>th</sup> Avenue, a predominantly residential street that leads to the West-Romig entrance and a vibrant end of the Spenard town center.

# Transportation Objective #3

Plan for and develop an efficient road network that accommodates current and future traffic appropriately, including the safe movement of passenger vehicles, trucks, freight movement, bicycles, and pedestrians.

The WADP recognizes that existing functional plans guide the appropriate roadway improvements that are compatible with adjacent land uses. Only modifications to current functional plans are identified in Chapter 5. Key connections between West Anchorage residential areas, businesses, employment centers, and education facilities consistent with the LRTP and the Non-motorized Transportation Plan can be found in Tables 4.2-3 and 4.2-4.

# Roadway Capacity

The road system is the most visible and commonly used transportation network in Anchorage. For better or worse, most residents and businesses will continue to be highly dependent upon automobile and truck transportation to conduct their daily activities. Inefficient or unconnected road systems create traffic congestion, which in turn results in more accidents, higher maintenance costs, and increased vehicle emissions. Therefore, maintaining an efficient road system with good road design that moves traffic without excessive delay is important socially, economically, and environmentally.

As the population density of West Anchorage increases, so will demand on roadways and transportation facilities. To keep pace with this growth, road improvement projects will be needed in order to maintain efficient traffic flow. Since road improvements stem from *LRTP* recommendations, accurate assumptions, and updated priorities are important. The next review should include consideration of *WADP* transportation recommendations.

When the AMATS *LRTP* is updated, the traffic model would be rerun based on the final *WADP* land uses (LUPM Exhibit 4-1a) to ensure that road classifications match land uses. The traffic model should also include land use inputs from the current TSAIA Airport Land Use/Layout Plan. This would ensure that roads classified and designated to carry airport bound commercial traffic are properly designed to accommodate future airport growth.

From the list of *LRTP* projects that fall within West Anchorage, the *WADP* concludes that the improvements in Table 4.2-3 are particularly significant to achieve needed capacity upgrades, accommodation of non-motorized facilities, and safety issues.

Table 4.2-3 West Anchorage - Key Long-Range Transportation Plan Improvements		
Improvement	Benefit/Rationale	
Spenard Road rehabilitation (Minnesota Drive to Benson Boulevard)	Potential to enhance business activity, public transportation service, pedestrian amenities, and safety. Higher residential densities planned. Current and past focus of public discussion regarding road design and improvement funding. Possible couplet at 36 <sup>th</sup> Avenue would increase efficiency at the Minnesota Drive intersection.	
Jewel Lake Road Improvements (Raspberry Road to West Dimond Boulevard)	Relatively high-density corridor with public transportation potential. Lack of pedestrian improvements and multiple driveway access points raise safety issues as traffic volumes increase.	
Northwood Street (extension to Victor Road)	Would allow pedestrian and bicycle access to Dimond High School and the Campbell Creek Trail from both sides of West Dimond Boulevard. Significant north-south commuter connection that would relieve some congestion.	

# Street Typologies

The 2025 *LRTP* introduced the concept of street typologies to foster a more balanced street function that considers adjacent land uses and the needs of all users –pedestrians, bicyclists, transit users, and motorists. For instance, a road designed to carry the same volume of traffic should look different and accommodate different features as it moves through a wetland natural open space versus when it moves through a commercial area.

The following are some examples of typology assignments that would provide additional clarification to a street's *OS&HP* functional classification that would help achieve goals of the *Non-Motorized Transportation Plan*:

- Wisconsin Street OS&HP classification is "neighborhood collector" (class IC). Existing road width will accommodate the Bicycle Plan "bike network" recommendation for 5-footwide travel way adjacent to the vehicular travel lane. The typology should be "residential street" so that the design solution contains separated pedestrian pathways to accommodate pedestrian and bicycle-orientation over automobile mobility.
- West 35<sup>th</sup> Avenue is recommended for a bicycle lane in the *Bicycle Plan*, but it is in a commercial corridor so the typology should be "mixed-use street" with sidewalks. Features like sidewalks and landscaped medians can help pedestrians navigate the typically congested commercial corridor.
- West 26<sup>th</sup> Avenue between Minnesota Drive and Spenard Road is a residential corridor with several large parking lots. It could become a major gateway corridor between the West-Romig campus and the Spenard town center and should be considered a "mixed-use street" typology that also balances land access with walking and bicycling.

## Safe Intersections

Intersections in West Anchorage with the highest collision rates from the 2008 Annual Traffic Report are listed in Table 4.2-4. These intersections occur in areas with high pedestrian and bicycle use related to commercial business or schools and where intersections have restricted sight distance. The Pedestrian Plan recommends MOA run a "public awareness campaign" highlighting the need to stop at crosswalks to avoid crashes during right turns on red lights. The WADP recommends a further step to eliminate the "right on red" driving policy within

town centers. However, this would be a citywide policy beyond the scope of this plan. The *WADP* agrees with a continued focus on public awareness campaigns ("rules of the road") for safety education purposes that support the success of multiple modes in town centers.

Table 4.2-4 West Anchorage – High Risk Intersections		
Intersection	Characteristic	
Northern Lights & Minnesota	3-way crossing prevents adequate pedestrian/bicycle crossings and causes jaywalking	
Spenard Road & 27 <sup>th</sup> Avenue	Highest number of crashes (particularly dangerous "angle" type) on the northern portion of Spenard Road after Northern Lights/Spenard and Benson/Spenard	
Spenard Road & Northern Lights	High accident rate; rehabilitation of intersection schedule for Spenard Road reconstruction project	
Spenard Road & Benson	Received rehabilitation in 2009 due to high collision rates causes injury or death; still rates high in accidents	
Arlene and West 88 <sup>th</sup> Avenue	Some minor injuries and bike collisions with no real patterns	
W. Dimond & Sand Lake Road	Under review for safety improvements	
W. Dimond & Jewel Lake Road	Under construction for safety improvements	

Safety is a primary focus for ARRC operations. ARRC strives to minimize at-grade crossings when financially feasible. The WADP recommends MOA cooperate with ARRC and ADOT&PF to minimize safety concerns at at-grade crossings, and collaborate with a Context Sensitive Solutions/Context Sensitive Design (CSS/CSD) process when funding is found to separate crossings in the future. Road projects should address conclusions of the ARRC Grade Separation Feasibility Analysis to determine design consistencies for future at-grade crossings in the study area and also account for costs and impacts to land use and residential areas. Active community and business participation in the public process associated with major intersection redesign would help alleviate concerns over construction and design to produce solutions that enhance the land uses and achieve adequate safety and traffic flow. Table 4.2-5 provides a list of at-grade crossings in West Anchorage.

	Table 4.2-5
	West Anchorage - At-grade Railroad Crossings
-	International Airport Road and Spenard Road
•	Spenard Road between Lois and Woodland Drives
•	36th Avenue between Lois Drive and Kirby Place
•	International Airport Road and Northwood Drive
•	Tudor Road between Lois and Harding Drives
-	Arctic Boulevard near Rovenna Street
-	C Street near Raspberry Road

# On-Airport Traffic

Increased traffic associated with the growth of the airport will have an impact on the roads and neighborhoods adjacent to the airport. Preparation of an "Airport Street Master Plan" would help to prepare for capacity issues that may arise on West Northern Lights Boulevard

and Raspberry Road and preserve multi-modal access through the airport property. At least three prior traffic studies have been done in the airport area, a 2000 ADOT&PF Wetland Development Traffic Assessment, a 2002 Transportation Demand Management Plan and a 2009 South Airpark Traffic impact Analysis. These should be referenced in future airport traffic plans, which should address commuter traffic, small commercial truck traffic and west airpark needs.

Table 4.2-6 contains a list of items the *WADP* recommends be addressed in an airport street master plan.

# Table 4.2-6 West Anchorage – Items to Address in an Airport Street Master Plan

- Continued restriction of trucks on West Northern Lights Boulevard
- Maintain adequate capacity on Raspberry Road
- Maintain bicycle access on Postmark Drive
- Reconfigure the Sand Lake Road and Raspberry Road intersection after South Airpark build-out

# AMATS and Freight Movement

AMATS Policy Committee directs the preparation of transportation plans with input from committees. For instance, the Freight Advisory Committee of AMATS meets quarterly to ensure that freight interests are considered in AMATS policies and MOA projects. They can keep transportation planners abreast of trends in trucking, such as truck traffic volumes and truck lengths. Problems within the identified/approved trucking routes can be communicated on an on-going basis and identified in the updated *LRTP* and Freight Mobility Study to assist with management of freight traffic. They work to protect established truck routes and maintain functional integrity for efficient freight movement while minimizing conflicts between passenger vehicles, bicycles, and pedestrians. This group continues to meet to resolve issues including:

- Intersection redesign to alleviate restrictions on truck turning movements, particularly for double-trailers.
- Efficient freight movement through an optimal network of truck routes.
- Appropriate use of road architecture like curbs and medians.

## Transportation Objective #4:

Develop roads and other transportation facilities that support and enhance surrounding land uses.

A recurring concern voiced by local residents is the need to harmonize major road projects with existing neighborhoods, and minimize construction impacts on small businesses. When a project is proposed that upgrades an existing road or railroad corridor, it brings with it increased traffic volumes, new traffic patterns, noise, and other changes that can alter neighborhood character.

The WADP concludes that adoption of the LUPM and continued use of the Context Sensitive Strategy for the planning, design, and construction of transportation projects will support and enhance land use. This will require a strong engagement of municipal and state transportation planners and engineers to help set the *context* of municipal- and state-owned roads so that the road design meets the goals of the WADP.

# Context Sensitive Solutions/Context Sensitive Design

The MOA adopted a "Context Sensitive Strategy for Transportation Projects" policy in 2008. "Context sensitive solutions" or "context sensitive design" (CSS/CSD) is a collaborative, interdisciplinary approach that involves all stakeholders to develop a transportation facility that fits its physical setting and preserves scenic, aesthetic, historic, and environmental resources, while maintaining safety and mobility. CSS is an approach that considers the total context within which a transportation improvement project will exist. CSS/CSD is applied during the planning, design, construction, and evaluation of transportation facilities.

MOA is in the process of applying CSS/CSD processes consistently for road improvement projects which will support and enhance adjacent land uses. CSS/CSD should continue to be utilized to reduce conflicts and result in mutually acceptable transportation improvements.

After project planning, CSD/CSS can also minimize the construction impacts of road renovation projects on local businesses by:

- Informing the public before the ground is touched.
- Phasing project construction to maintain ongoing business access.
- Requiring a temporary business access plan in all road improvement plans and bid documents.
- Applying monetary incentives and penalties to achieve timely project completion including funding for public service announcements to help mitigate impacts to businesses.

For federally funded projects, the State (ADOT&PF) uses a public involvement process mandated by the National Environmental Policy Act (NEPA) instead of CSS/CSD. There is also a concern that, in the past State projects did not always incorporate design elements from MOA plans. The Municipality and the State should develop a review process for funding and maintaining elements of the road design that enhance adjacent land use. This would better ensure proposed road projects reflect public and commercial interests (e.g., the inclusion of non-motorized elements, landscaping, and maintenance agreements).

## Railroad Compatibility

The ARRC initiated a 2007 double-track study for a corridor from the railyards to the airport spur. This study should provide basic information on social, environmental and land use impacts to the area. While rail operations and the ARRC's proposed double-track rail capacity expansion project largely occur on lands owned by the railroad and within the framework of zoning regulations, there are impacts to adjacent neighborhoods. The Municipality should continue to work with the ARRC as a major stakeholder in the public process to evaluate alternatives to decrease visual, noise, and vibration impacts to neighborhoods. Active community participation in project planning and design will assist to identify and mitigate residents' concerns. The Federal Transit Authority's Environmental Assessment describing potential impacts to the proposed double-track are not public at the time of writing the WADP.

# Transportation Objective #5:

Ensure that roads and sidewalks are properly repaired and regularly maintained, including efficient seasonal snow removal and street cleaning.

Public comment during the WADP included issues about how snow and dust cleared from streets blocks walkways and sidewalks. There was also concern that the construction of new pedestrian and bicycle facilities would increase maintenance costs in an already-strapped budget. There was public frustration voiced about design errors that placed utilities within sidewalks or landscaping that hindered plow equipment.

Maintenance is critical to a functioning road and walkway network. Surface repairs (holes and cracks), as well as seasonal snow removal and street cleaning are important elements of road maintenance; these responsibilities are shared between MOA and ADOT&PF. As a rule of thumb, MOA owns and maintains local roads while the State owns and maintains busier streets classified from collectors to expressways. (An important exception is Spenard Road that is owned and maintained by the MOA.) A map of road ownership and maintenance responsibility is shown in Exhibit 2-8.

Walkway safety can be accommodated through proper design and maintenance. Design is prescribed by engineering manuals and the incorporation of CSS/CSD. Therefore, the *WADP* does not recommend new policies specific to West Anchorage; rather it encourages adequate funding of the transportation goals described in *Anchorage 2020* and the *WADP* as implemented through the *LRTP* and annual MOA work plans.

# Maintenance Constraints

In this discussion, it is important to recognize that the MOA's ability to deliver maintenance service is constrained by available funding. Consequently, the frequency and degree of maintenance is proportional to the property taxes that local residents are willing to accept. Local funding is considered inadequate for necessary road maintenance needs as well as the eventual replacement of all local roads. State funding from ADOT&PF is only available for state roads.

Effective maintenance can also be hindered by road design that does not match equipment specifications. For example, the location of signals, signs, and utility poles can hamper snow removal equipment and/or result in costly public repairs. When roads and sidewalks are adjacent, snow from roadways is frequently plowed directly onto sidewalks, hindering the maintenance of the pedestrian facilities. Street design standards and ROW dedication requirements should continue to be reviewed to ensure that snow storage can be accommodated between the road and sidewalk/walkway (if relevant) and that the placement of street signage and other above ground equipment allows sufficient room to operate snow plows.

MOA should seek grants and funding for additional sand removal and dust abatement equipment and staff, as well as for additional snow removal equipment and staff, in order to meet goals outlined in the *Pedestrian Plan*.

#### Informational Tools



ADOT&PF sponsors <u>www.alaskanavigator.org</u> in addition to print ads for residents to avoid and track road construction progress.

The inability to clearly determine who is responsible to maintain a given street is a source of frustration to local residents. Tools to help alleviate maintenance frustration include the Pothole Hotline, Snow Removal Hotline, and the "Navigator" tool.

A similar focus is recommended for communication of road maintenance responsibilities (MOA or State), schedules, priorities, and future projects in order to direct

complaints efficiently and reduce public frustration. A coordinated effort to communicate transportation projects would counter the complaint that current communication techniques appear to be accessible to a limited audience.

# Snow Storage and Removal

Snow removal and storage is a citywide function managed through a combination of temporary and permanent roadside storage, parking lot storage, and MOA snow dump sites. The Connors Lake snow storage site (the only one in West Anchorage) is located on TSAIA land and is leased to the MOA. The conclusion of a recent snow dump study was that this site needs to be acquired by the MOA in order to implement the necessary permanent environmental controls for runoff. Another permanent snow storage and melting location needs to be identified in West Anchorage.



Connors Bog snow storage site for West Anchorage