

Yakima Bicycle Master Plan

DRAFT PLAN

September 11, 2015



Prepared by: **Toole Design Group**



N.B. This a review draft. The final draft will be transferred into a graphically-compelling layout with complete photographs, captions, and tables.

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CHAPTER 1 – INTRODUCTION AND EXISTING CONDITIONS

INTRODUCTION

With its beautiful natural setting, central Pacific Northwest location, and low cost of living, Yakima offers a high quality of life for its 90,000 plus residents. Many families and seniors call Yakima home, which is a critical factor in the City's efforts to provide safer and more convenient transportation choices throughout Yakima. The City has recognized that safe bicycling facilities for all ages and abilities provide many benefits that contribute to Yakima's high quality of life. Benefits include reduced air pollution, increased tourism, improved health, and reduced transportation costs. In addition to institutional support, community support for active transportation exists in Yakima, as exemplified by private efforts such as the Yakima Greenway Foundation, the growing local momentum around Complete Streets design and policy through the Yakima Health District and Yakima Valley Conference of Governments, and advocacy groups like Yakima Bikes and Walks.

PURPOSE AND PROCESS

The intent of Yakima Bicycle Master Plan (Plan) project is to develop a bicycle network plan that, when implemented, will improve bicycle transportation throughout the City of Yakima. The Plan will guide planning, development, and management of existing and future bicycle connections within the City of Yakima. The focus of the Plan is to provide a coordinated vision for accommodating and encouraging bicycling as a viable transportation mode so that Yakima residents of all ages and abilities may safely, comfortably, and conveniently bike through the City for both recreation and utilitarian trips such as shopping, commuting to work and school, and accessing transit.

The Plan builds upon previous City of Yakima initiatives, including the 1995 Bicycle Master Plan, the Yakima Greenway Master Plan, and numerous on- and off-road bicycle investments made to date. The Plan identifies challenges, opportunities, and recommended strategies for developing and maintaining a community-wide bicycle network. The Plan will position Yakima to make more strategic and cost-effective investments in its bicycle network, receive funding from a broader range of sources, and continue to provide a high quality of life.

The Yakima Bicycle Master Plan establishes a vision of bicycling for the future and identifies practical steps needed to implement projects and programs that support bicycling. With this Plan, the City aims to determine the most logical method of creating a connected network of bicycle facilities that serve the broad spectrum of individuals that bicycle in Yakima.

The Yakima Bicycle Master Plan will be contained within the Comprehensive Plan and Transportation Master Plan. These plans are required by the Washington State Growth Management Act (GMA).

The City's Departments of Engineering, Public Works, Community Development and planning, oversaw the development of the Master Plan with input from the following groups:

- City Council Built Environment Committee
- Yakima BMP Project Advisory Committee (PAC)
- Yakima community (residents, business owners, bicyclists, students and others).

During the planning process, the City of Yakima sought to:

- Gather community input on existing conditions, barriers to bicycling in Yakima, and priorities for improvement
- Build on the existing and planned bicycle facilities and bicycle-friendly trails
- Develop a Citywide bicycle network that includes arterial and neighborhood routes
- Prioritize improvements to the bicycle network and develop a plan for implementation
- Develop policy and program recommendations in the areas of education, encouragement, enforcement, and evaluation
- Gain community support by soliciting input from a wide range of stakeholders.

TIMELINE

This Plan was developed in three phases:

1. **Data Collection** (February-July 2015): The data collection phase included gathering public input at a public open house, meeting with City staff, the Built Environment Committee of the City Council, the Project Advisory Committee, and reviewing previous plans for bicycle facility recommendations. It also included extensive field analysis of Yakima's existing transportation network to determine locations where bicycle facilities could be integrated into the existing street network.
2. **Draft Plan** (May-August 2015): Upon completion of the data collection, a draft Plan was developed for public review. The Plan goals, objectives, actions, priorities and performance measures reflect community preferences identified through the public process.
3. **Final Draft and Plan Adoption** (September 2015-January 2016): The Plan will be voted on by the Yakima City Council in early 2016.

2015												2016
FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	
Data collection												
		Online Survey and Public Input Mapping										
				Public Open House					Draft Plan for Review			
			Plan Development									
							Develop Final Master Plan					

A PLAN FOR ALL TYPES OF BICYCLISTS

The 2012 AASHTO Guide for the Development of Bicycle Facilities discusses the ways in which to classify different types of bicycle riders, including comfort level, physical ability, and trip purpose. The AASHTO Guide classifies people willing to ride into two primary groups: experienced and confident, and casual and less confident. It is the latter group that makes up the majority of potential bicyclists: those who ride frequently for multiple purposes; those who enjoy bicycling occasionally but may only ride on paths or low-traffic streets in favorable conditions; those who ride for recreation, perhaps with children; and those for whom the bicycle is a necessary mode of transportation. In order for this group to regularly choose bicycling when making mode choices, a physical network of visible, convenient and well-designed bicycle facilities is needed.

VISION AND GOALS

The Plan vision and goals provide a framework for the Plan document, including recommendations for programs, policies, project prioritization, and implementation.

VISION

The vision of the Yakima Bicycle Plan is to identify a transportation system for bicyclists of all ages and abilities that promotes safe and accessible commuting and recreational opportunities between parks, schools, the Yakima Greenway, employment and commercial centers, and other points of interest. Through public education initiatives, the Plan encourages safe relationships and interactions between people who bicycle, walk, and drive motor vehicles.

PLAN GOALS

The Yakima Bicycle Master Plan goals and objectives provide the framework for the Plan's policy and project recommendations, and implementation strategies. The goals and objectives were developed through a multi-step process that involved City staff, the Built Environment Committee of the City Council, the Project Advisory Committee (PAC), and the general public through an on-line survey and open house

Early conversations with City and Council staff about what they hoped to achieve with the Plan revealed five major areas of interest and concern: safety and comfort, connectivity, cost-efficiency, increased mobility options, and education and encouragement. These topics were then presented to the PAC. Through discussions and interactive exercises the team created a list of seven core goals and objectives.

The refined goals and objectives were presented at an open house as part of a ranking activity. Attendees were given three dots and asked to place the dots on the goals and objectives board to identify their top priorities. The resulting ranked list (below) is a reflection of this input along with feedback from the PAC, City staff, and City Council members.

1. **Connectivity** – Create a connected network of on- and off-street bicycle facilities that link destinations, transit, and neighborhoods.
2. **Safety**– Create a bicycle network that is safe and comfortable for bicyclists of all ages and abilities.
3. **Education**– Educate both motorists and bicyclists about the rights and responsibilities of all road users in order to increase understanding and foster safe interactions. Provide city staff with information about best practices for bicycles in planning, design, and construction.
4. **Maintenance of bike facilities**– Maintain existing infrastructure, while installing new bicycle facilities.
5. **Cost efficiency**– Identify funding sources, policy changes, and other mechanisms for developing partnerships that are cost effective.
6. **Wayfinding** – Provide easily accessible information (e.g., signage, maps), on how to use the bicycle network system.
7. **Increased mobility options** – Provide the ability to take trips by multiple modes and establish connections between modes.

BENEFITS OF BICYCLING

Presently, a number of key trends are converging and resulting in a ground swell of interest in promoting bicycling as a viable transportation mode. Many cities are facing challenges in terms of economic development, repairing and maintaining infrastructure, addressing local and global environmental issues, and distributing basic services fairly. In addition, households are feeling the pressure of increasing fuel costs. There is great public interest in pursuing development and

transportation solutions that are more sustainable—meaning less costly to maintain over time, less polluting, and more equitable. The bicycle is a key component of sustainable transportation systems. These trends, as well as growing public demand for more transportation choices and opportunities for integrating walking and biking into daily routines, point to the need for implementing this Master Plan.

Cities across the country are embracing the bicycle as a viable transportation mode and a means to achieving multiple objectives, including economic development, maximizing transportation investments, improving public health, addressing transportation equity, and reducing environmental impacts.

ECONOMIC DEVELOPMENT

In many industries, the competition for workers is measured on a global scale, and people are choosing employers not just based on salary and traditional benefits, but on external criteria such as lifestyle and quality of life. Many employers are recognizing that their ability to recruit top employees depends significantly on local culture and amenities. Cities that are making investments to become more walkable and bikeable are seeing dividends in the form of attracting new residents and employers.

According to the League of American Bicyclists, a motor vehicle is the second-highest household expense, after housing itself. The American Automobile Association estimates that Americans spend on average \$8,485 each year to own and operate a car. This number increases each year as gas prices, maintenance costs, and insurance costs continually increase. It is estimated that about \$7,000 of this leaves the local economy (through fuel purchase, insurance, etc.) while about \$1,400 remains (through taxes, maintenance, registration, etc.). Providing transportation choices can give households the option of owning fewer cars, thus freeing up more household money that can be spent in the local economy.

Investing in bicycle and pedestrian infrastructure is a key strategy for revitalizing neighborhoods by improving access to businesses, making streets more attractive to a broader range of users, improving neighborhood livability by increasing social interaction and perceptions of personal safety, as well as reducing vehicle congestion.

Many regions and states have found that bicycle tourism supports local economic development due to spending by travelers as well as bicycle related businesses. With its scenic location near Central Washington wine and hop country, Yakima has the potential to foster economic development through bicycle tourism. Recent research shows that people bicycling support local businesses, often spending more per trip than people driving.

IMAGE: BIKE TOURISTS

MAXIMIZING TRANSPORTATION INVESTMENTS

Dollar for dollar, bicycling is by far one of the cheapest transportation modes to support. Often bicycle facilities utilize existing roadway space, and only require relatively low-cost pavement markings and/or signage. Additionally, bicycles cause far less wear and tear on roadways than motor vehicles.

The City of Yakima has already made substantial investments in its transportation infrastructure. Implementation of on-street bicycle facilities is a key strategy for maximizing the return of this investment. By increasing the percentage of miles traveled by bicycle, Yakima can improve the efficiency of its existing roadway system, and forego costly congestion management projects. A walking or bicycling trip may end at a destination such as work or shopping, or it can be part of a longer journey that involves transit. Pairing bicycle facility improvements with transit gives people more transportation choices and expands the reach of the transit system. Targeting the provision of safe and convenient bicycle facilities such as lanes, trails, and parking will increase the service radius of a transit stop or station, and will provide options where transit does not run frequently.

HEALTH

The Centers for Disease Control and Prevention recommends 150 minutes of moderate-intensity aerobic activity every week, which is equivalent to 10 minutes of brisk walking, 3 times a day, 5 days a week. Providing opportunities for people to integrate walking or biking into their daily routines can help them more easily meet these guidelines and stay healthy and fit.

According to a recent Centers for Disease Control information, the rates of obesity among children and adolescents age 2 to 19 remains a serious problem. Recent studies show the prevalence of childhood obesity at about 17 percent.

Given that many elementary and middle schools in Yakima are located on low traffic collector and local streets, there is tremendous opportunity for increasing the number of children able to integrate physical activity into their daily routines by walking or biking to school through the installation of relatively low-cost safety improvements.

ENVIRONMENTAL

One-quarter of all trips taken in the United States are within a mile, or about a 20-minute walk. Half of all trips taken are within three miles, or a 20-minute bike ride. Yet for the vast majority—78 percent—of these shortest trips, people are using their cars. Replacing short-distance car trips with bicycling and walking trips can contribute to the reduction of harmful emissions.

EQUITY

Providing the community viable and affordable transportation choices that include transit, bicycling and walking is a key component of an equitable transportation system. In Yakima, the poverty rate was 21.1 percent, compared to 14.1 percent in the state as a whole. Nationally, research shows that people from disadvantaged neighborhoods are more likely to bike for transportation. Bicycling can also provide a link to public transit, which many depend on to reach critical destinations, including work, shopping, and health services.

EXISTING FACILITIES

The Plan builds and expands upon Yakima's existing bicycle facility network. Yakima currently has approximately 5 miles of bike lanes; 14 miles of shared-use paths (trails); signed bike routes that follow W Chestnut Ave, S 37th Ave, W Lincoln Ave, and W Martin Luther King, Jr. Blvd; and close to ten miles of shared lane markings on arterial streets (see Appendix B).

The Yakima Bicycle Master Plan is predicated on the creation of a network of dedicated bicycle facilities that provide safe connected routes through the City for riders of all abilities. In this spirit, the Plan recommends the use of shared lane markings sparingly, in accordance with the Manual on Uniform Traffic Control Devices (MUTCD) and National Association NACTO guidelines. In addition, the plan recommends conversion of many existing signed bike routes and roadways with shared lane markings to dedicated bicycle facilities. Existing bicycle lanes and trails are incorporated into the Plan, with proposed facilities completing gaps in the network.

SHARED LANE MARKINGS

National guidance on the use of shared lane markings has evolved in recent years. Shared use markings, as defined in MUTCD and NACTO, are not considered facility types, since they do not designate dedicated space for bicyclists. However, they can be important tools in a complete bicycle network, providing wayfinding and bicycle route definition as well as lane positioning cues for bicyclists on shared roadways. FHWA has documented studies on the value of shared lanes markings, which demonstrate that the markings increase the distance between bicyclists and parked cars, increase the distance between motorists and cyclists, and reduce the number of bicyclists riding the wrong way on roads and riding on sidewalks. While shared lane markings provide value to the subset of bicycle riders that are comfortable sharing space with motor vehicles, they do not provide a comfortable facility for the majority of riders.

Because national guidance on the use of shared lane markings is evolving, the Plan recommends only a few miles of shared lane markings, and instead focuses primarily on creating lower stress facilities such as bicycle boulevards.

SIGNED BIKE ROUTES AND WAYFINDING SIGNS

Signed bike routes and bicycle wayfinding signs, while not bicycle facilities per se, are another important tool for the development of a bicycle network, especially in support of transportation trips by bicycle. Wayfinding information can be used to provide navigation; information about distance and time to destinations; and to mark bike routes, connections to shared use paths, and bicycle boulevards. For example, wayfinding signs should be installed to bolster the effectiveness and use of the bicycle boulevards as proposed in this plan (see bicycle network plan map). The MUTCD provides guidance about signs standards, placement, and installation of wayfinding signs.

BICYCLE LANES

In the downtown area, there are bike lanes on W Lincoln Ave, W MLK Jr. Boulevard, S 3rd Street, and S 6th Street. There are also a few segments of bike lanes on the east end of town, on Tieton Drive, W Nob Hill Boulevard, and W Washington Avenue. These bike lanes, once connected as recommended in this Plan, will be important components in the city-wide comprehensive bicycle network.

TRAILS

The Powerhouse Trail and the Yakima Valley Greenway Trail are recreational and commuting trails. The Yakima Valley Greenway Trail is approximately 10 miles long and provides access to several parks, fishing lakes, playgrounds, and natural areas. The Powerhouse Trail is an in-city trail that connects to schools, city parks, and residential areas.

IMAGE: 6TH AVE BIKE LANE

REVIEW OF POLICIES AND PLANS

This section provides a review of plans and policies related to bicycling and transportation in the Yakima Valley. To maintain focus on the most relevant plans, only plans adopted after 2005 were reviewed. The purpose of this review is to summarize the plans already in place and to discover already identified opportunities and challenges concerning bicycle usage in the Yakima area. Plans reviewed are listed in Table 1.1 below.

Table 1.1: Reviewed Plans and Policies

Plan	Jurisdiction	Year
YVCOG Metropolitan and Regional Transportation Improvement Programs for 2015-2018	Yakima Valley Conference of Governments	2014
Yakima County Trails Plan (2014)	Yakima County	2014
Yakima Valley Regional Transportation Plan	Yakima Valley Conference of Governments	2012
City of Yakima Parks and Recreation Comprehensive Plan	City	2012
Yakima Urban Area Comprehensive and Transportation Plan 2025, 2012 Addendum	City	2012
Yakima Urban Area Comprehensive Plan 2025	City	2006
Yakima Urban Area Transportation Plan Update, 2025	City	2006
Pedestrian and Bicycle Advisory Committee	City	n/a
Yakima Revenue Development Area	City	n/a

YAKIMA VALLEY CONFERENCE OF GOVERNMENTS “METROPOLITAN AND REGIONAL TRANSPORTATION IMPROVEMENT PROGRAMS FOR 2015-2018”

This plan covers improvement projects from 2015-2018. The bicycle plan will not be implemented until most of these projects are complete. The City of Yakima should coordinate with the Yakima Valley Conference of Governments to include bicycle improvements in future transportation improvement programs.

YAKIMA COUNTY TRAILS PLAN (2014)

The Yakima County Trails Plan (Trails Plan) stresses the community, economic, and health benefits of trails and greenways. A survey found that the highest priorities for residents were for more bike lanes on county roads and trail connectors with other communities. The Trails Plan focuses on routes in unincorporated areas of Yakima County and recognizes that non-motorized travel should not be seen as strictly recreational. Several greenway corridors already exist in the Valley, including the Yakima Greenway, the Cowiche Canyon Conservancy, the Sunnyside/Grandview Pathway and the County Line Pathway.

The Trails Plan describes in detail existing trails, and lists proposed trails, including condition, length, and type of use allowed. Forty-nine miles of trails are currently in use, with 153 miles proposed. Motorist awareness, local initiatives, and law enforcement are considered important parts of the Trails Plan.

YAKIMA VALLEY REGIONAL TRANSPORTATION PLAN

The goal of the Regional Transportation Plan (RTP) is to develop and maintain a regional multimodal transportation system that provides for the safe and efficient movement of people and goods, supports the economic growth of the region, and is compatible with land use plans and the environment. The Regional Transportation Plan is focused on preservation, including maintenance of existing facilities. The first chapter stresses agency coordination and public involvement. Policies in the Regional Transportation Plan support the development of a bicycle network along with the need to routinely include pedestrian and bicycle accommodations as a part of capital and maintenance projects.

- Policy 6.8: Monitor and expand on Commute Trip Reduction (CTR) programs for affected employers and voluntary worksites. CTR work sites are served by a well-developed network of bicycle facilities. With the exception of five of the worksites (Yakima Valley Farmers Clinic, Department of Ecology, City of Moxee, Alexandria Moulding and Yakima Valley Hospital), the sites directly connect to a bicycle network route.
- Policy 6.9: Improve systems for pedestrian and bicycle travel as part of capital roadway projects and maintenance programs.

The Plan has two 2010-2035 prioritized projects that are related to bicycling:

- Construct pedestrian/bicycle trail on railbanked Naches Branch line (Naches Spur Rail to Trail-Locus Lane to Low Road)
- Union Gap- East Washington Avenue Extension from South 18th St to Rudkin Road: new construction, 3 lanes, with sidewalk and bike lane.

Appendix C of the RTP lists existing transportation facilities. The RTP notes that that over 99% of arterial roadways have a v/c (volume/capacity ratio) of less than 0.70 (70% capacity), meaning that there is underutilized capacity on the roadways that could be reallocated to improve efficient movement of people and safety for all users.

YAKIMA URBAN AREA COMPREHENSIVE AND TRANSPORTATION PLAN 2025, 2012 ADDENDUM

The 2012 Addendum to the Yakima Urban Area Comprehensive Plan listed the following projects with bicycle components as a priority in Yakima.

- Construction of a new three-lane urban interior north-south frontage road (curb, gutter, sidewalks, bike lanes and street lighting) from Fair Avenue along I-82 to O Street.
- Study and evaluate ongoing interface issues regarding safety and operation of the “G” Street BNSF spur line. Specific items of study will assess bike, pedestrian and vehicular traffic; as well as freight transshipment; and economic impacts that continuing operation of the rail may have on adjacent neighborhoods of the City of Yakima.

- Pathway improvements to the I-82 under crossings into the Greenway, including providing a safe route from the Yakima Redevelopment Area (YRDA) to Downtown, as well as an east-west connection through the YRDA. Pathway improvements include trails and bike routes as identified on maps V-1 and V-2 in the transportation section of the transportation plan.
- Provide a safe route from the Greenway through to the downtown that does not require crossing over interstate exits and on-ramps.

CITY OF YAKIMA 2012-2017 PARKS AND RECREATION COMPREHENSIVE PLAN (2012)

Bicycling is included as a form of recreation in the City of Yakima Parks and Recreation Comprehensive Plan (RCP). The RCP suggests that safe bicycle and pedestrian access to parks be considered when siting future parks. One of the policies is to use existing irrigation canals and Yakima Valley Transportation corridors for pathways. The William O. Douglas Trail is an important regional facility, and the Parks Plan recommends establishing connectivity with the trail portion that passes through Yakima.

YAKIMA URBAN AREA COMPREHENSIVE PLAN 2025 (ADOPTED DECEMBER 2006)

The Yakima Urban Area Comprehensive Plan 2025 was adopted in 2006 and recognizes the need to develop the bicycle network. The comprehensive plan strives to develop local streets that encourage neighborhood safety and livability, realizing that shorter block lengths and connectivity to the existing street network contribute to the overall safety and livability of the street. The plan notes that three lane roads (two travel lanes and one center two-way left turn lane) provide safety benefits for all users. The plan states that three lane configurations are effective for roads with a future design volume of up to 17,000 ADT (average daily traffic).

The Urban Area Comprehensive Plan describes the existing bicycle facilities in Yakima, which include bicycle lanes, marked shared lanes, and signed bicycle routes. Three goals, listed below, are directly related to improving the existing bicycle network.

- Goal 6.7: Create a street network that encourages safe bicycle connections and routes
 - 6.7.2: Assign high priority to improvements that address safety or hazardous conditions, provide access to activity centers, provide linkages to transit and school facilities and complete planned facilities/trails
 - 6.7.6: Encourage conversion of 4-lane streets to 3-lane streets with bicycle facilities on Minor or Collector Arterial streets where appropriate
- Goal 6.8: Consider bicycle needs at street intersections
- Goal 6.9: Promote bicycle use for recreation and economic development benefit
 - 6.9.2: Promote and support special events that encourage bicycling and safety
 - 6.9.3: Work with local agencies and private organizations to promote and support hosting bicycle races and events in the Yakima Valley

Goal 6.7.6 is especially relevant to the Bicycle Master Plan. Several recommendations include restriping four lane roads to three lane roads to provide space for bicycle facilities.

YAKIMA URBAN AREA TRANSPORTATION PLAN UPDATE, 2025 (DECEMBER, 2006)

The Yakima Urban Area Transportation Plan Update states that “Multimodal facilities need to be included in all future capacity and system projects completed within the city.”

The Yakima Urban Area Transportation Plan includes a chapter for bicycles where three goals are identified: Create a street network that encourages safe bicycle connections and routes; consider bicycle needs at street intersections; and promote bicycle use for recreation and economic development benefit.

The Plan provides an overview of existing bicycle facilities in Yakima, along with municipal code rules, transit access, and a record of bicycle collisions between 1998 and 2004. Other policies relevant to the Yakima Bicycle Master Plan include policies on the arterial and collector street system, signalization at intersections, freight transport, and public transit.

YAKIMA COMPREHENSIVE PLAN 2040

The Bicycle Master Plan will be incorporated as a modal plan within the Transportation Systems Plan (TSP) and the Transportation Element (TE) of the Comprehensive Plan; these projects will be completed in 2017.

The TSP and TE will incorporate key elements of the Bicycle Master Plan, including bicycle system map, the list of prioritized projects, and the guidance for bicycle facility roadway design standards specific to bicycles. There may be refinements to the bicycle network plan to ensure consistency.

PEDESTRIAN AND BICYCLE ADVISORY COMMITTEE

The committee was created in 1994 to provide counsel in the creation of a Yakima Bicycle/Pedestrian Master Plan and to seek consensus among staff, committee members, affected citizens, local neighborhoods, and other interested groups on bicycle/pedestrian projects and implementation. The committee was formed to review and adopt preliminary and final plans for creating and financing specific bicycle/pedestrian projects, keep the public informed about existing and proposed bicycle/pedestrian projects, and encourage citizen participation in the planning and implementation process.

YAKIMA REVENUE DEVELOPMENT AREA

A new development is planned on the northeast side of Yakima. According to a Yakima City Council briefing on November 26, 2013, new streets and a new interchange ramp for I-82 is planned between Yakima Avenue and US 12. The new Cascade Mill area is intended to provide a regional commercial center for the Yakima Valley Region, specifically large-lot commercial and industrial sites with easy interstate access. The development of this area provides an opportunity to link the Greenway with downtown. While the intent may be to serve regional customers arriving via automobile, the proximity to downtown and the Greenway provides an excellent opportunity for bicycle access.

COMPLETE STREETS

Yakima Valley Conference of Governments (YVCOG) has been advocating a Complete Streets approach when planning and designing streets. YVCOG staff have been working with local jurisdictions such as Union Gap, Mabton, and Sunnyside to adopt their own ordinances. The City, along with the YVCOG and the Yakima Health District, hosted a Complete Streets event in May 2015 during the master plan process called Voices for Our Streets. The City of Yakima is working with YVCOG to develop a Complete Streets network policy that will allow all modes to safely and efficiently access all parts of the city. A complete streets network policy will likely be adopted in 2016, and included in the 2040 Transportation Plan.

CHALLENGES

Yakima's current land use is somewhat dispersed, with large lot commercial and industrial areas. Truck movement is vital to Yakima's economy, and due to the dispersed nature of industrial sites, warehouses, and freeways, most arterials will need to maintain access for trucks. The Yakima Greenway is on the opposite side of I-82 and SR-12, which presents challenges to connecting the Greenway to the rest of the bicycle network. Another challenge is the rail line that divides the City, running north/south west of I-82, it interrupts the grid and limits opportunities for on- and off-street connections. Railroad and freeway crossings should not be neglected as they are vital to the usability of the entire system.

Arterial crossings are one of the main challenges echoed by members of the public and the bicycle advisory board. Several residential streets that continue north-south or east-west through town provide a low stress place to ride a bike, but are interrupted by very difficult crossings, particularly at 16th and 40th Avenues.

Finally, the existing maintenance budget does not currently include adequate resources to maintain an expanded bicycle network, which is an important element of implementation.

OPPORTUNITIES

The residential areas in Yakima have been built in a traditional grid. This combined with the fact that many areas of the city are relatively flat, means that there are many street options for bicycling.

As noted in the Yakima Valley Regional Transportation Plan, many of Yakima's roads are currently operating under capacity. Yakima recognizes the benefits of "road diets," which are the conversion of four lane roads to three lane roads (see Goal 6.7.6 of the Yakima Urban Area Comprehensive Plan). These conversions provide safety benefits for all modes, reducing motor vehicle crashes while providing roadway space for bicycle facilities such as bike lanes or buffered bike lanes. While truck access must be considered, there are many examples around the country of bicycle facilities and freight facilities existing on the same roadway. There is an opportunity for the Yakima Bicycle Plan to follow best practices related to reducing bicycle and truck conflicts.

The Yakima Valley Regional Transportation Plan states that bicycle and pedestrian facilities should be improved as a part of capital projects and maintenance (Policy 6.9), and the Yakima Urban Area Transportation Plan establishes a policy to include multimodal facilities in capacity and system projects in Yakima. Additionally, Yakima's Municipal Code requires bicycle lanes and sidewalks to be provided along all new or reconstructed arterial and collector arterial streets, where feasible (12.06.040). Thus, there is an opportunity to use existing policies to include bicycle facilities in all new construction, including the planned Cascade Mills development.

Yakima has an active advocacy group, Yakima Bikes and Walks, which can be used as a resource for improving bicycling in Yakima. This group has already helped obtain and implement a grant to install bicycle racks in downtown Yakima in coordination with local businesses. In order to expand the accessibility of bike parking in Yakima, there is an opportunity to institute a requirement for installing short or long term bicycle parking for new development (in the Yakima Municipal Code). This type of program would also support Yakima Valley's commute trip reduction goals and promote economic development.

Street maintenance is a priority for Yakima. As part of the transportation network, re-striping and sweeping of bicycle facilities and replacement of bicycle network signs should be included in the maintenance budget.

The Yakima County Trails Plan affirms the need to provide on-street facilities and trail connectors that link the regional greenway systems to neighboring communities and to Yakima's business districts. The trail network has the potential to provide inter- and intra-city travel for utilitarian and recreation trips for local residents as well as tourists. A well-established bicycle network would contribute to the overall economic success of Yakima, allowing residents to spend less money on transportation and contributing to the tourist economy by drawing in bicycle tourists.

CHAPTER 2 – PUBLIC AND STAKEHOLDER ENGAGEMENT

INTRODUCTION

The public involvement and stakeholder engagement process for the Bicycle Master Plan (Plan) solicited input at multiple levels: from City Staff; the Built Environment Committee (BEC) of the City Council; a specially-convened Project Advisory Committee (PAC); and the general public. Information and feedback from each of these groups helped steer the project goals and Plan development. The process also sought to understand bicycle commuting needs as well as development of educational efforts geared toward improving driver behavior and encouraging bicycle travel throughout the City.

Events and social media were also used to communicate with the public about ongoing Plan development. An online map and survey allowed the public to provide specific input on network recommendations, individual bicycling behaviors, and bicycle infrastructure.

BUILT ENVIRONMENT COMMITTEE

The project team gathered input from the Built Environment Committee of the City Council three times over the course of the project; in April, May, and September.

Some of the hopes and concerns the committee members brought up during the meetings included:

- Desire for a well-connected bicycle network
- Desire for a family friendly bike community, prioritizing connections to schools and providing protected bikes lanes where possible
- Concern about overlap between bicycle network and freight routes
- Interest in and discussion about particular routes in the bicycle network: the role of N. 1st Street, Chestnut Street and the intersections with N. 16th and 40th Avenues.

Members of the public provided valuable insights at the BEC meetings voicing their concerns and hopes for the project. One particularly important exchange led to an effort to provide information and solicit input at the Cinco de Mayo Cultural Fiesta held in early May and put on by Hispanic Chamber of Commerce/Camarade Comercio Hispana.

PROJECT ADVISORY COMMITTEE

A project advisory committee (PAC) of approximately a dozen members was assembled by City staff. The PAC members were selected to represent a broad range of bicycle interests and included representatives from the following groups:

- City Community Development, Planning, Public Works, and Engineering Departments
- Yakima Bike and Walks
- Mt. Adams Cycling Club

- YVCOG
- Local bike shops
- Yakima Greenway
- Yakima Transit
- City of Yakima Planning, Public Works, and Police Departments.

The PAC met three times over the course of the project, in April, June, and September of 2015. The PAC provided valuable input to the project regarding the project vision and goals, education and outreach ideas, network planning, and priority projects.

OPEN HOUSE

Yakima Valley Conference of Governments has been advocating a Complete Streets approach in the planning and design of roadways. YVCOG staff have been working with local jurisdictions including Union Gap, Mabton, and Sunnyside to adopt their own Complete Streets ordinances. The City, along with the YVCOG and the Yakima Health District, hosted a combined Complete Streets/Bicycle Master Plan open house event on May 21, 2015. The event, *Voices for Our Streets*, was held at the Yakima Convention Center.

Two speakers spoke about designing streets for all users. Speakers included Professor Marc Schlossberg, a professor of City and Regional Planning at the University of Oregon and co-author of *Rethinking Streets: An Evidence Based Guide to 25 Complete Street Transformations*. Professor Schlossberg discussed Complete Streets principles and case studies from his book. Peter Lagerwey, of Toole Design Group, a nationally-known expert on non-motorized projects and a Complete Streets trainer, in his talk titled, “Implementing Complete Streets in Your Community—Steps and Stories,” outlined practical steps communities can take to execute a Complete Streets policy.

IMAGE: OPEN HOUSE

Before and after the lectures, local agency representatives were stationed at information tables and displays, providing an opportunity for community members to gain information and ask questions about local and regional transportation plans and services.

The Bicycle Master Plan project team had the following boards on display:

- Project overview
- Project goals, including an interactive board where participants ranked their priorities
- Project schedule
- Bicycle facility types
- Maps where participants could note challenges and concerns for biking in Yakima.

IMAGE: MAPS

The event was attended by nearly 60 people. Between the lively discussion during the question answer period, the comment forms, and the informal discussions, the team received detailed input about where people would like to bike in Yakima and the challenges that need to be addressed. One theme that came up repeatedly was a desire for more protected bike facilities.

OTHER EVENTS + DRAFT PLAN OUTREACH (TBD)

The City hosted an event in mid-May called *Feet in the Street*. The event included many activities geared toward different age groups and bicycling abilities and presented an opportunity for City staff to provide community members with project information and publicize links to the Plan online survey and map.

SURVEY AND CROWDSOURCED MAP

To capture a broad spectrum of attitudes and interests about bicycling in Yakima, the project team developed an online survey and crowdsourcing map. Links to these input tools were provided on the City website and publicized at events and through interested individuals and groups like Yakima Bikes and Walks.

The survey assessed interest and attitudes toward bicycling and bicycling facilities, as well as opinions on potential changes to the street network required to accommodate bicycle facilities.

The map allowed people to identify locations where bicycling barriers or opportunities exist, routes that people commonly ride or would like to ride, or add a comment to any feature. All suggestions and comments were reviewed by the project team and were used to inform the development of the bicycle network plan and facility, policy and program recommendations.

Results from the survey and map are featured in Appendix D.

CHAPTER 3 – BICYCLE NETWORK RECOMMENDATIONS

INTRODUCTION

The Bicycle Master Plan recommends a city-wide, connected bicycle network that provides opportunities for inexperienced and experienced bicyclists of all ages and abilities. It reflects extensive stakeholder input, the latest guidelines in facility planning and design, and field analysis of all recommended facilities. The recommended bicycle network includes 60 miles of on-street bicycle improvements ranging from shared streets to protected bike lanes. It also recommends approximately 4 miles of new trail connections that link key parts of the network. Table 2.1 provides a summary of miles for each type of recommended bicycle facility. Appendix A provides more information on designing and maintaining the bicycle network.

Table 2.1 Summary of Recommended Bicycle Network: One-way mileage.

New On-Street Facilities	Total Recommended Miles
Bike lanes	24.9
Buffered Bike Lanes	10.6
Shared lane markings	3.9
Climbing Lane	1.3
Bicycle boulevard	24.1
Protected Bike Lane	0.7
Trail Connections	3.7
Paved Shoulder	0.6
TOTAL	66.0

The following factors were considered in the development of the recommended bicycle network. These reflect input received from the public, city staff, review of existing plans, and recognized best practices.

- One mile or less spacing of bike facilities
- Review and consideration of existing facilities

- Routes that complete or connect to existing bicycle facilities
- Routes that connect schools (supporting Safe Routes to School efforts) and other community facilities such as recreation centers, parks, and libraries
- Routes that connect to major trails
- Roadways that have existing excess capacity (e.g. peak-hour traffic volumes are significantly below what the roadway can accommodate)
- Roadways that provide parallel routes to arterials with high traffic volumes
- Routes that connect to commercial and retail destinations
- Routes that will attract the “casual and less confident” rider.

FACILITY DEFINITIONS

SHARED LANE MARKINGS



Shared-lane markings are not technically considered a bicycle facility, since all travel lanes where bicycles are not prohibited are shared lanes. However, shared-lane markings are an important tool that can assist bicyclists and motorists by indicating appropriate bicycle positioning on a roadway, increasing safety and visibility.

BICYCLE LANE



Marked space along a length of roadway designated for use by bicyclists.

BICYCLE CLIMBING LANE

On a sloped roadway where there is not sufficient space to provide bicycle lanes on both sides of the street, a bicycle lane on the up-hill provides space for slow climbing bicycles, with shared lane markings on the downhill.



BUFFERED BICYCLE LANE

A bike lane with additional buffer space between the bike lane and the auto lane or parked cars. Used on high-volume or high-speed roads, or roadways with high parking turnover.



CONTRA FLOW BICYCLE LANE

Bicycle lane separated by a painted yellow centerline marking on a street with one-way motor vehicle traffic, to allow contra-flow bicycle traffic.

IMAGE

BICYCLE BOULEVARD

A low-volume and low-speed street or series of streets that have been optimized for bicycle travel while discouraging or calming through automobile travel. Local access is maintained.

A bicycle boulevard incorporates several design elements to accommodate bicyclists. These may include, but are not limited to:

- Stop signs on side streets to allow free flow of bicyclists
- Traffic circles to slow motor vehicles

- Wayfinding signs for bicyclists
- Shared lane markings where appropriate for wayfinding
- Crossing Improvements at major streets
- Traffic diverters for motor vehicles designed so bicyclists may pass through

Every street is different and will require varying levels of treatment. For this type of facility to be effective, crossing treatments at major arterials are essential.

IMAGE: CONTRAFLOW

PROTECTED BIKE LANE (ALSO CALLED CYCLE TRACK)

A portion of a right-of-way which has been designated by curbs, planting strips, flex posts, parked cars, or other physical barrier for the exclusive use of bicyclists. Protected bike lanes are typically one-way, but may be two-way under special circumstances. Protected bike lanes can operate at sidewalk level or street level.

IMAGE: ONE WAY PBL SIDEWALK

IMAGE: ONE WAY PBL STREET LEVEL

SIDEPATH

A shared-use pathway that is physically separated from motorized vehicular traffic by an open space or barrier, and is either within the highway right-of-way or within an independent right-of-way. As shared-use paths, sidepaths may also be used by pedestrians, skaters, wheelchair users, joggers and other non-motorized users.

IMAGE:SIDEPATH

SHARED-USE TRAIL

A pathway (paved or soft surface) not adjacent to a roadway that accommodates pedestrians and bicycles, dog walkers, joggers, etc.



WAYFINDING SIGNS AND PAVEMENT MARKINGS

Signs and pavement markings that help bicyclists find important destinations and routes within the bicycle facility network.

IMAGE: WAYFINDING

GREEN BIKE LANE

Part of a bike lane that demarcates a conflict zone or an area where motor vehicles may be merging across the bicycle lane. Used as a spot treatment, colored bike facilities like green bike lanes provide proven safety benefits through increased visibility and awareness of bicyclists.

IMAGE: GREEN BIKE LANE

BICYCLE DETECTION AT INTERSECTIONS



A pavement marking symbol that indicates the appropriate position for a bicycle to trigger a traffic signal.

BIKE PARKING

Bicycle racks should be designed so that they:

- Support the bicycle at two points above its center of gravity
- Accommodate high security U-shaped bike locks
- Accommodate locks securing the frame and one or both wheels
- Provide adequate distance (minimum 36") between racks so that bicycles do not interfere with each other
- Do not contain protruding elements or sharp edges
- Do not bend wheels or damage other bicycle parts
- Do not require the user to lift the bicycle off the ground



BICYCLE NETWORK RECOMMENDATIONS

EXISTING FACILITIES

Yakima has approximately 5 miles of bike lanes currently installed that are noted on the network maps in Appendix B. There are several signed bike routes and shared-lane markings throughout the city. Signed bike routes are not considered a roadway facility type, and while they may add value to the network, they are not covered in this Plan. Guidance from the MUTCD, AASHTO, and NACTO on shared-

lane markings has changed since Yakima installed markings on city roadways. The existing shared-lane markings were therefore not considered as part of the network.

DEVELOPMENT OF STUDY NETWORK

Streets considered for potential bicycle facilities included streets with existing facilities (bicycle lanes, signed bicycle routes or shared-lane markings), arterials with excess capacity (based on traffic counts provided by the City of Yakima), trail network connections, streets that provide critical access across barriers such as the railroad tracks and freeways, and continuous residential streets.

FIELD WORK

The consultant team completed a field review of the entire existing and potential bicycle network, as outlined in the study network. Lane configuration and width were measured and topography was observed for each of the roads in the draft study network. At some locations, width could not be measured because of safety concerns related to traffic volume or speeds. In these cases, fairly accurate (within a foot or two) measurements were taken from Google Earth. Using the data from the field, public input, and traffic counts provided by the City, the draft network was developed.

RECOMMENDED NETWORK MAP

Upon completion of the field work, a draft network was developed and then refined to better reflect Plan goals and objectives, public input gathered at the open house and through the on-line map, best practices for improving safety, and links for improving connectivity of all recommended facilities. The result is a cost-effective network that creates a safe way to travel around the entire city by bicycle, access schools, businesses and neighborhoods. The recommended network map is included in Appendix B.

PROJECT PRIORITIZATION

PRIORITIZED NETWORK DEVELOPMENT PROCESS

As a first step to providing a safe, connected network of bicycle facilities through Yakima, a “skeleton” network was identified that connects the existing facilities and provides connections through downtown and to the Greenway. The following set of criteria was used to select the projects included in the priority network.

1. **Value in network and connectivity:** The projects selected provide a spine for the future network, filling critical network gaps and linking to existing facilities, the Greenway, and downtown.

2. **Ease of implementation:** Projects were generally selected that would not require additional right-of-way acquisition or major modification to existing roadways. Funding strategies are addressed in Chapter 5.
3. **Public input:** Projects that were often mentioned on the online map and in the open house were considered for inclusion in the priority network.

The priority network map is included in Appendix C. The numbered labels on the map correspond with the project numbers below (project numbers do not reflect priority rankings).

LIST OF SHORT TERM, PRIORITIZED PROJECTS

1. Chestnut Street Bicycle Boulevard and Walnut Street Bike Lanes

Chestnut is already a signed and well-used east-west bicycling route. The project team heard many times that Chestnut is a good route, but that crossing arterials is difficult. Crossing improvements are needed at S. 16th Avenue and S. 40th Avenue. These streets are heavily trafficked motor vehicle routes, and careful study is needed to create a safe crossing. Crossings improvements at these intersections will require further study in the Transportation System Plan in order to determine the best recommendation. Diverters are recommended at S. 48th Street and S. 12th Avenue.

2. 32nd Avenue Bicycle Boulevard

N. 32nd Avenue has the advantage of signals at major arterial crossings. Additional signage, speed humps, and diverters would make this road an excellent bicycle boulevard. Current motor vehicle volumes are approximately 4,000 ADT at the section with the highest volume. At Englewood Avenue, where the proposed route jogs west to N. 34th Avenue, a two-way protected bike lane could be added by removing the right turn lane from Englewood to N. 34th. The bike boulevard would then continue on N. 34th, where a stoplight is proposed at Fruitvale Blvd. This route connects Chestnut Street, the Powerhouse Trail, and River Road.

3. Greenway Connections

The Yakima Greenway Trail has a few existing gaps that, if completed, would make this facility more continuous, accessible and usable.

Chesterly Park to Greenway Connector

The Powerhouse Canal Trail runs through Chesterly Park, where it currently ends. The trail should be extended to join with the Greenway trail along N. 40th Avenue by either widening the existing sidewalk or constructing a new trail parallel to the sidewalk. Because land uses do not suggest pedestrians or bicyclists may be present, driveway crossings would require special

attention and signage. Signage is also recommended to direct bicyclists and pedestrians to the Greenway. An on-street solution is not recommended since motor vehicle speeds and volumes along N. 40th Avenue are high.

N. 16th Avenue Connector

Currently, N. 16th Avenue provides a connection to the Yakima Greenway Trail on the SR 12 overpass. However, N. 16th Avenue only has a southbound bike lane and no northbound bike lane. The road is wide enough to add a two-way protected bike lane on the west side of N. 16th Avenue. Motor vehicle lanes could be shifted east on the bridge to accommodate the protected bike lane. Freeway exit ramp crossings must be very well marked. The City/WSDOT should consider adding refuge islands at freeway exit ramp crossings. Temporary refuge islands can be created with paint and bollards at a lower cost than concrete islands.

IMAGE: GREEN PAINT AT CROSSINGS

Yakima Avenue and Nob Hill Overpasses

Yakima Avenue and Nob Hill Boulevard provide two of the three connections from downtown Yakima across I-82 to the Yakima Greenway Trail. Both have wide sidewalks that serve as bike paths across I-82, and both need significant improvements. Curb bulbs are recommended to shorten crossing distances and slow vehicles making turns on and off the interstate ramps. Trail crossing signs at crosswalks would alert motorists to the presence of bicyclists and pedestrians. The sidewalk on Nob Hill Blvd should be widened and improved for bicycle travel west to S. 18th Street to connect the proposed north/south bike lanes on S. 18th Street with the overpass and Greenway. On Yakima Avenue, there is an opportunity for the south sidewalk to connect to the Greenway through a vacant parcel after the S. 18th Street overpass.



4. I Street Bike Lanes

I Street connects to downtown over the railroad tracks and is an important link in the bicycle network, as well as the overall transportation network. Bike lanes are recommended, but this street will need further study as part of the Transportation System Plan.

5. 3rd Street Bike Lanes

N. 3rd Street already has bike lanes from Walnut Street to Race Street, and is a good north-south connector. Buffered bike lanes are recommended from I Street to E Street, and new bike lanes from E street to Walnut Street and Race Street to Pacific Avenue.

6. Lincoln Avenue and MLK Jr. Boulevard Buffered Bike Lanes

Lincoln Avenue and Martin Luther King Jr. Boulevard are important downtown connectors, providing bicycle links under the railroad tracks. Existing bike lanes and shared-lane markings are recommended for an upgrade to buffered bike lanes, providing a more comfortable experience for bicyclists. The Transportation System Plan should study removing a travel lane or parking lane to provide for buffered bike lanes. Flexposts should be added to the buffer to create protected bike lanes on the railroad underpasses.

7. Fair and Pacific Avenue Bike Lanes

S. Fair Avenue and Pacific Avenue provide a connection through the southeast portion of downtown and connect to the proposed path over I-82 on E Nob Hill Boulevard. Bike lanes could be installed by narrowing lanes and restricting parking on one side of the road on Pacific Avenue from S. 3rd Street to S. Fair Avenue, and narrowing lanes or removing the center turn lane on Pacific Avenue/ S. 18th Street from S. Fair Avenue to E Nob Hill Boulevard. Bike lanes could be installed on Fair Avenue by implementing a road diet from E Nob Hill Boulevard to Pacific Avenue, and by removing the center turn lane from Pacific Avenue to the junction with E Lincoln Avenue and E Martin Luther King Jr Boulevard.

8. Fifth Avenue Bike Lanes and Bike Boulevard

Fifth Avenue is a good candidate for bike lanes through the west part of downtown. Bike lanes are recommended, buffered bike lanes where there is room. 5th Avenue changes from an arterial to a local street at Tieton Drive, where the bike route continues as a bike boulevard. Crossing treatments are recommended at W Nob Hill and W Mead Avenues.

9. Maple Street Bike Boulevard

Maple St, Beech Street, and Chalmers Street provide a low-traffic connection to Sarg Hubbard Park and the Greenway. Crossing improvements are needed at S. 6th Street. To avoid a difficult crossing of N 1st Street, the bike boulevard will terminate at S 3rd Street and connect with existing bike lanes on S 3rd Street and proposed bike lanes on Walnut Street.

10. Powerhouse Canal Pathway connections

The Powerhouse Canal Pathway has a major gap along Lincoln Avenue between 24th Avenue and 20th Avenue. This gap should be completed with a shared-use trail. Possible strategies include removing one lane of traffic or widening the sidewalks. Bike lanes and a road diet are second tier recommendation for Lincoln Avenue, which may influence location of the trail but should

not be used as a substitute for a full trail connection. Along with this project, a crossing of Lincoln Avenue at N 24th Avenue should be further studied to provide additional connections to the trail.

More intuitive connections are needed where the Powerhouse Canal Pathway offsets at N. 20th Avenue and N. 16th Avenue. A bike boulevard treatment on Willow Street and bike lanes on N. 6th Avenue complete the connection to the rest of the network.

CHAPTER 4 – PROGRAM RECOMMENDATIONS

INTRODUCTION

Infrastructure is only part of the solution to making a city more bicycle-friendly. Efforts must also be made to address non-infrastructure elements such as unsafe behaviors of all roadway users, the development of safe bicycling skills, and general awareness of bicyclists on the roadway.

The Project Advisory Committee (PAC) held a robust discussion on the “Five E’s” with a particular focus on education, which resulted in a set of three key messages that the City and its partners can use to effectively target their programmatic efforts as they move forward with implementation of the Yakima Bicycle Master Plan. Prioritization of these three messages, below, were determined to be the most important education related issue for Yakima.

1. *Share the Road.* Encourage people who drive to respect bicyclists’ right to use the roadway; and increase awareness of bicyclists as vulnerable users of the roadways who need safe and comfortable places to ride.
2. *Bicycling is an economical and attractive travel choice.* Bicycling is a flexible and economic way to travel that can increase Yakima residents’ trip range and reduce roadway congestion. Developing a well-connected bicycle network will make Yakima an appealing place to visit, and may attract prospective businesses.
3. *Bicycling is a healthy activity that benefits the whole community.* Bicycling is an excellent way for children and adults to meet the recommended physical activity targets to maintain good health (see Chapter 1, Benefits of Bicycling). According to the Centers for Disease Control, “Creating or modifying environments to make it easier for people to walk or bike is a strategy that not only helps increase physical activity, but can make our communities better places to live.”

This rest of this section documents recommendations developed by the PAC and the project team to leverage existing programs undertaken by the City of Yakima, partnering agencies, and volunteer organizations as well as recommendations for additional programs that can help the City communicate these key messages.

THE 5 E'S, from the League of American Bicyclists

Education: Giving people of all ages and abilities the skills and confidence to ride

Encouragement: Creating a strong bike culture that welcomes and celebrates bicycling

Enforcement: Ensuring safe roads for all users.

Evaluation & Planning: Planning for bicycling as a safe and viable transportation option

Engineering: Creating safe and convenient places to ride and park.

It is worth emphasizing the important role that volunteers and advocates will play in improving conditions for bicyclists in Yakima. The City can set the course via policies and infrastructure improvements, but the actual conditions can only be impacted by the actions of all citizens both in daily conduct and organized group actions. Fortunately, there are groups, clubs and individuals dedicated to improving bicycling conditions in Yakima. A number of agencies and organizations could potentially play an active role in encouragement and education efforts, including but not limited to the Yakima Conference of Governments, Yakima Police Department, Washington Department of Transportation, Yakima Health District, Washington Bikes, Yakima Greenway Foundation, Yakima Parks and Recreation, Yakima Bikes and Walks, and bike shops. The combined efforts of the City and its partners will help to establish and sustain a bike culture.

EDUCATION

The ranking exercise conducted at project the open house identified education as a key component to the success of the plan. A safe transportation system begins with an understanding of the rights and responsibilities of all residents that use the City's streets, sidewalks, and trails. Education is required to address issues such as wrong-way riding, how bicycles and cars can safely share the road, the importance of looking both ways, and compliance with stopping regulations. This information needs to reach as many residents as possible and it needs to be provided in both English and Spanish. Below is a discussion of programs and other efforts focused on educating the public about bicycling safety, some of which the City of Yakima and its partners are already offering or pursuing.

SAFE ROUTES TO SCHOOL (SRTS)

Safe Routes to School (SRTS) programs involving parents, schools, community leaders and local, state, and federal governments work to improve the health and well-being of children by enabling and encouraging them to walk and bicycle to school.

Many of Yakima's public schools are located on collector streets and accessibility via walking and biking would be greatly improved with implementation of the recommended bicycle network. Many schools in Yakima provide walk route maps for the students, safe bicycling routes, along with safety information, could be included with such materials. The City of Yakima has received funding for SRTS projects from WSDOT in the past, and the City should continue to apply for funding.

Bicycle and pedestrian safety skills will benefit the children throughout their lives. According to the National Center for Safe Routes to School, it is more likely for children today to be driven to school and activities than their parents were, resulting in fewer opportunities to practice safe biking and walking skills. Ensuring consistent, certified instruction for all children of Yakima will help to improve safety for the City's next generations. The National Highway Traffic Safety Administration (NHTSA) offers many materials about bicycle and pedestrian safety, including curriculum materials, and resources in Spanish. The school district could also develop a Bike to School Day--a good opportunity to provide bicycle education materials and training.

EDUCATING LAW ENFORCEMENT OFFICERS ABOUT BICYCLES

It is important for all law enforcement officers to fully grasp the rights and responsibilities of all roadway users. Educating law enforcement officers about the laws applying to bicycles, as well as the operational characteristics of bicycles can help officers better understand what behaviors they should be targeting from an enforcement point of view. A police bike patrol unit is an excellent way for officers to engage in the community and experience the challenges faced by bicyclists. Yakima police should continue to operate their bike patrol in the summer.

IMAGE: YAKIMA BIKE PATROL

POLICE EDUCATION SEMINARS & RODEOS

Police officers or staff have shown support by assisting with bicycle rodeos, and could continue to provide bicycle safety education such as seminars and bicycle rodeos. Rodeos begin with the instructor providing an explanation of bicycle skill expectations for students. Various stations are set up to give students the opportunity to practice a variety of specific bike handling skills for operating a bike safely and legally on the street. Bicycle rodeos are provided during the school day, and at events upon request. Health fairs and safety events, such as the Feet in the Street event, also provide opportunities to promote safe cycling clinics for children, families and adults.

CITY WEBSITE

The City's website is very helpful and functions as a clearinghouse for several important transportation-related resources. The City should consider utilizing the web site to distribute educational information in a focused, centralized transportation and recreation section oriented toward bike (and pedestrian) safety in English and Spanish. The City could expand and maintain an online reference that provides easy access to bicycle laws, safety tips, maps of the bicycle network, and links to programs that encourage people to bike more often. Ideally, this information should be presented all in one place on the City's website, or if this is not desired, then links to relevant pages, i.e. 'Planning', or 'Parks and Recreation' should be compiled and provided in one place. Other ideas to consider:

ADD A CALENDAR SHOWING BICYCLE EVENTS

Posting bicycle events on a monthly calendar would help people become more aware about upcoming events. The City could partner with agencies and interest groups that have bicycling events, such as Yakima Bikes and Walks, and publicize information about the events on the City's website, Facebook page, and distribute through email notices. All postings and event information should be available in a format that is accessible and easy to read.

USE YAK BACK TO REPORT PROBLEMS WITH BICYCLE INFRASTRUCTURE

The City's Yak Back site can be used as a way for citizens to report issues with bicycle infrastructure.

CROSS-POST BICYCLE-RELATED VOLUNTEER OPPORTUNITIES, ACTIVITIES, AND PROGRAM

The City's Parks and Recreation, Planning, and Public Works departments and YVCOG all have projects or programs that either address bicycling directly or have complementary objectives. Cross posting the efforts of other City agencies and departments will make for a more convenient experience for the web user, and will promote cooperation and joint development across City departments.

DEVELOP A COMPREHENSIVE SAFETY EDUCATION PROGRAM

As resources become available, the City, in partnership with other organizations such as YVCOG, the Health District, and private industry, e.g. healthcare, could develop a comprehensive safety education program. The tone should be cooperative, emphasizing that all modes need to be aware and respectful of each other on roads and trails. Below are additional activities that should be marketed under the umbrella of an energized and comprehensive program.

CREATE AND & DISTRIBUTE EDUCATIONAL AND PROMOTIONAL MATERIALS

Educational and promotional materials such as maps, bumper stickers, billboards, website content, flyers, etc., with a unified theme and message can be very effective in raising awareness about bicycle safety driving motor vehicles with care. Materials could be made available in both English and Spanish.

PROMOTE AND SUPPORT ADULT BICYCLE SAFETY CLASSES

Many adults are unaware of how to properly fit and wear a helmet, signal turns to vehicular traffic and are unfamiliar with other safe road riding skills. The City could promote adult bicycle fun rides, clinics and engage volunteers that are certified bicycle instructors (by the League of American Bicyclists) to organize and conduct the clinics and rides. Clinics and rides could be posted on the bicycle calendar of events. The City bicycle web page can also provide links to those groups that provide publicly accessible clinics, rides and workshops.

Additionally, the City could provide classroom space for bicycle safety workshops. Groups and clubs regularly offer clinics and workshops but have difficulty finding spaces that can provide both classroom space and areas to practice maneuvers. The City and County buildings may have

meeting rooms and parking lots that can be used for instruction. These spaces are usually unused during weekend and evening hours. Providing these spaces for free would increase the frequency that clinics and workshops are offered.

ENCOURAGEMENT

Yakima is fortunate to have an enthusiastic cycling community. The City has several cycling groups that promote bicycling in and around the city and organize group rides. While many of the groups are oriented to recreational riding, their members' presence on the roads and paths increases awareness of all cyclists.

BIKE TO WORK DAY

The purpose of Bike to Work Day is to encourage people to try substituting a bicycle for their car for one day, with the hope that the experience will inspire more regular bicycle commuting. The City could partner with YVCOG, the Health District, and other organizations to host bike to work events in Yakima. The City could promote greater participation by encouraging its employees to bike to work, as well as holding bike commuter "lunch-and-learn" workshops. Another idea to increase participation is to partner with bicycle shops and other organizations to have a mobile unit to provide free bike tune-ups. The City could also partner with health related organizations, bicycle groups, and local restaurants to provide a breakfast station and prizes for participants. The City could seek partners to promote this event, and should explore other strategies for increasing the number of participants.

CREATE A BICYCLE FACILITIES MAP

A bicycle facility map can be an effective tool for encouraging novice bicyclists to ride more often because it helps them understand key connections for getting to their destination. The map should be available in both print and digital formats (downloadable PDF and mobile device format), in English and Spanish. The map should provide detailed bicycle facilities information (on-street routes and off-street trails), and could potentially include safety tips and bikes on buses information. It could also include a summary of laws and regulations applying to bicyclists.

BICYCLES AND TRANSIT

Public transit can be an attractive solution for extending bicycle trips. Secure bicycle parking facilities should be provided at the transit center and potentially other transit stops. Additionally, the entire fleet of Yakima Transit buses are equipped with bicycle racks which allow individuals to take their bicycles with them as they travel on the bus. The bus attached bicycle racks can be used at no additional cost.

IMAGE: BIKE_BUS

INCENTIVE PROGRAMS

Employer incentive programs are excellent tools to promote commute trips by bicycling and walking. Such programs benefit both the employees as well as the employers—who have to supply fewer parking places for their employees and have healthier employees. Incentives can take a variety of forms, from vouchers to payroll credits and gift cards. Employees earn them by meeting a target number of weekly or monthly commute trips by bike.

PAC members suggested incentive programs for school children based on existing programs, such as: the Yakima Transit program that allows kids free admittance to the public pool with a bus transfer; the Kiddin’ Around on the Yakima Greenway activity program; and the Mileage Club through Clary Motors, which rewards kids who achieve perfect school attendance. Such programs could be adapted to promote bike trips by kids. (e.g. - admittance to the public pool with a bicycle helmet; rewards for bike to school mileage or trips; organized recreational rides for kids, and similar programs).

PARTNERING

Entities and interest groups outside the City can contribute to the success of the Master Plan. Below is a list of organizations that the City should collaborate with to encourage bicycling. Several of these groups participated in the Master Plan process.

[Yakima Valley Conference of Governments](#) and the [Yakima Health District](#) have been involved Complete Street policy and planning, and administer grants and programs related to promoting bicycling and walking. YCCOG promotes biking to work and provides information on their website.

[Yakima Greenway Foundation](#) “works to conserve, enhance and maintain the Yakima Greenway as a continuing living resource.” The Greenway is an important part of the Bicycle Network, and the City should continue to partner with the Foundation to ensure high quality connections between the Greenway path and the City streets. Programmatically, there are opportunities for partnership and promotions such as the Kiddin’ Around on the Yakima Greenway, which could add bicycling to their activities for kids.

[Yakima Walks and Bikes](#) is an advocacy group that is focused on creating a bicycle and pedestrian friendly environment in Yakima, and the surrounding communities.

[Mount Adams Cycling Club](#) is a membership-based, recreation-focused group that conducts regular rides in and around Yakima.

Yakima has multiple bicycle shops through which education and encouragement information could be disseminated. Shops may also be potential sponsors of events like Bike to Work Day or community rides.

Other potential partners include major employers and other schools of higher education including Pacific NW University of Health Sciences, Perry Technical Institute, and Yakima Valley Community College.

CHAMBER OF COMMERCE/LATINO CHAMBER OF COMMERCE

Bicycle trips often involve shopping or restaurant/café visits. The chambers could promote and capitalize on the patronage bicyclists to local businesses around Yakima by installing more bicycle parking and supporting special events such as bike to work day.

GROUP RIDES

Whether for recreation or commuting purposes, riding in groups gives novice cyclists confidence to ride both on and off-road, and introduces new and convenient routes for everyday rides. The rides can cover vast areas and provide tours of the City, or they can help people identify comfortable and convenient routes to work. The best rides are those that start and end in the same location but explore new routes and destinations, giving people a new awareness of the bicycle network. Group rides have the added benefit of creating a strong bicycle presence on the roads. Yakima Walks and Bikes, Mount Adams Cycling Club, and area bicycle shops have all been active in promoting bicycle group rides.

Students can also benefit from group rides. The Safe Routes to School movement encourages young cyclists to bike to school in groups with adult chaperones. These rides increase the students' confidence in their bicycling skills and establish healthy habits for life. Bicycle trains have been especially effective for high-school aged students, providing a cheaper alternative to driving.

While the actual rides may be led by volunteers from local bicycling organizations, the City can provide resources and materials on planned group rides by including information about the events on the City's website, and in email distributions. The City can also link to other groups that produce how-to materials for organizing group rides or bicycle trains to school.

EVENTS

The events the City and YVCOG conducted during the Plan development, Feet in the Street and Voices for our Streets, were examples of opportunities for the City to promote bicycling, provide education, and deliver key messages around safety, fun, active living. The City should continue to seek out and take advantage of these opportunities. Establishing these or similar events as annual affairs would help maintain momentum by leveraging existing relationship with volunteer groups and support Yakima's growing bike culture.

ENFORCEMENT

POLICE ON BIKES

An effective way to engage bicyclists and model safe bicycling maneuvers is to put police officers on bicycles. Police on bicycles also tend to have a more thorough understanding of the rights and responsibilities of all users if they receive specialized training on bicycle safety skills and laws. An added benefit to using bicycles instead of cars is that officers on bicycles travel at slower speeds and are more engaged with their surroundings.

PROGRESSIVE/EDUCATIONAL TICKETING

Through the public process, community members indicate that many drivers appear to be unaware of bicycle safety legislation. While it is everyone's responsibility to be educated on current laws, it is more effective to educate drivers and bicyclists before issuing citations. With progressive ticketing, officers offer educational materials, and then warnings before issuing citations and fines. Offering this grace period allows drivers time to adjust to new laws. This approach can also be applied to bicycle enforcement.

SUPPORT DISTRACTED DRIVING CAMPAIGNS

Drivers that are not fully paying attention to the road and other vehicles create unsafe conditions for all modes. Bicyclists are especially vulnerable as they are often hidden in driver's blind spots. Washington has a hand-free law, but distracted driving messages are still important as it remains a threat to all roadway users.

Schools can also participate by conducting pledges for parents promising that they will not use their cell phones while driving, especially in school zones. The City could also consider adopting an ordinance that allows police to issue fines specifically to individuals caught using hands-on cell phone devices while driving in school zones.

PARKING ENFORCEMENT

Motor vehicles are not allowed to park or load/unload in bicycle lanes. Proper enforcement and ticketing must be employed to prevent people from blocking the bike lanes.

CROSSWALK ENFORCEMENT

For Yakima’s network of bicycle boulevards to work correctly, motorists must yield to greenway users at arterial crossings. Targeted enforcement of motorists failing to yield may produce beneficial results. Some cities have also tried positive enforcement, where they reward motorists for proper yielding behaviors. This type of enforcement usually generates additional education and encouragement if it is picked up by local media outlets or social media.

EVALUATION

Performance measures should be used to track implementation of Plan goals as well as project development. The first year’s goal is for the Plan to be adopted by the City of Yakima.

Thereafter, the City will integrate the Bicycle Master Plan with the annual Transportation Improvement Program (TIP). Project recommendations should be related to the implementation strategies and performance measures in the Plan.

Since the Bicycle Master Plan is based on current concepts, it should be thoroughly reviewed every ten years for content and updates, consistent with the State-mandated Growth Management Act Comprehensive Plan update cycle.

Example Plan performance measures are included in the following table:

Performance Measure	Performance Target	Baseline Measurement	Data Collection Frequency
Adopt the Bicycle Master Plan and incorporate into Yakima Transportation Plan and Comprehensive Plan	2016	N/A	N/A
Reduce bicycle crashes	Reduce bicycle crashes by 50% by 2025	2015 rate	Annually
Miles of recommended on-street bicycle network complete	Annually install a minimum of 5 miles of the adopted bicycle network plan (bike lanes, bicycle boulevards etc.). Complete recommended network by 2025.	2015	Annually
Number of bicycle parking racks installed	Install a minimum of 5 bicycle racks per year.	To be counted in 2016	Annually
Number of trail access points connected by on-street bicycle facilities	Complete one trail access point connection per year	Number of new trail access points identified in the bicycle network plan	Annually
Institute a bike count program, using the National Bicycle and Pedestrian Documentation Project methodologies and volunteers to conduct count	Establish program in 2016, begin annual counts	2016 counts	Annually
Increase bicycle ridership	Number of bicyclists counted at locations through the City	Increase number of bicyclists at count locations by 2% per year	Annually
Adopt a Complete Streets Network Policy (routine accommodation of bicycle facilities in capital and maintenance transportation projects)	2016	N/A	N/A

ENGINEERING

Engineering is a critical element of the Plan. A well-engineered bike facility invites proper behavior by all road users, reduces conflicts, and encourages bicycling. A full Design and Maintenance Guide is included in Appendix A. Several national publications, including the AASHTO Guide for the Design of Bicycle Facilities, the NACTO Urban Bikeway Design Guide, and the FHWA Separated Bike Lane Planning and Design Guide, should be consulted for additional guidance.

CHAPTER 5 – IMPLEMENTATION

INTRODUCTION

This chapter describes practical and feasible strategies for implementing the Yakima Bicycle Master Plan (Plan). In order for bicycling to become an attractive mode of transportation that is accessible to Yakima residents, it is essential to institute practices to ensure the proper construction and maintenance of the physical network and to provide programs for the encouragement of bicycle use. It will also be important to establish complementary laws and regulations and to expand the planning and support functions of the City to ensure this work can be accomplished. This chapter provides a framework for plan implementation and addresses funding opportunities.

INVESTMENT – PLANNING LEVEL COST ESTIMATE

The level of investment that will be required to implement this Plan is modest in comparison to other transportation facilities. The planning level cost estimate to implement the on-street elements of the 64 mile network is just over five and a half million dollars (estimate for 3.25 miles of off-road trail requires additional engineering analysis and is not included in the estimate). The bicycle network includes approximately 32 miles of bicycle lanes (conventional, buffered, and climbing lanes) 4 miles of shared lane markings, 24 miles of bicycle boulevards, and 0.6 miles of protected bike lanes. Table 5.1 outlines the costs per facility type for the full bicycle network. It is important to note that the cost of bicycle boulevards takes into account traffic calming and intersection improvements.

Table 5.1: Proposed Facility Costs By Type

	Total Recommended Miles	Network Costs
New On-Street Facilities		
Bike lanes*	24.0	\$1,037,508
Buffered Bike Lanes*	10.6	\$884,985
Shared lane markings	3.9	\$35,505
Climbing Lane*	1.3	\$78,208
Bicycle boulevard**	24.1	\$3,937,112
Protected Bike Lane	0.7	\$121,684
Trail Connections	3.7	TBD
Paved Shoulder	0.6	\$48,563
TOTAL	66.0	\$5,962,801

* Cost calculation assumes no on-street parking lane stripe. Costs will be slightly higher where there is a striped parking lane.

**Costs assume one pedestrian signal for every two miles of bicycle boulevard. Depending on further study, this level of signalization may not be needed, and may bring costs down. Some proposed bicycle boulevards already have several signals in place, such as S 10th Avenue and N 32nd Avenue.

IMPLEMENTATION STRATEGIES

The City should identify annual funding for Plan implementation, as well as routine and unexpected maintenance. Funding will come from a variety of sources, including local, regional, state, and federal sources. This section provides recommendations for activities to achieve implementation of the recommended network.

Strategy 1: Continue to accommodate bicycle facilities during roadway construction, reconstruction, and overlays when possible.

Overlays provide an excellent opportunity to improve bikeway conditions when executed appropriately. Special caution should be taken to ensure that no seam is left in the roadway space designated for bicyclists (or in areas where bicyclists are expected to ride in the case of shared roads). In addition to ensuring an even and well-marked surface for cyclists, overlays are a practical occasion to consider widening the roadway, especially in areas with planned paved shoulders. Pavement overlays present the opportunity to:

- Create bike lanes and other bicycle facilities
- Install signal sensors that can detect the presence of bicycles
- Consider bigger projects such as channelization changes.

Many of the facilities within the recommended network will be implemented as part of larger roadway projects, including the development of bicycle facilities when new streets are constructed or when existing streets are scheduled for resurfacing. When planning new developments, connecting non-arterial roads is key to continuing to develop the bicycle boulevard network. If cul-de-sacs and dead ends continue to be used by developers, through bicycle and pedestrian connections should be required. Implementation or improvement of bicycle facilities should be considered during all major roadway, and where appropriate, utility projects in an effort to reduce costs.

Strategy 2: Identify funding for programs and facility improvements in support of the bicycle network.

Dedicated funds are needed for supporting elements such as education programs, wayfinding, and expansion of the City's bicycle rack installation and bicycle count program. A portion of the Public Works budget will need to be reallocated to these efforts.

Strategy 3: Pursue a variety of mechanisms for funding infrastructure projects.

Bicycling infrastructure attracts users of all ages and abilities and offers a high return on investment. Most bicycle improvements are low cost when compared to new street construction projects. At the same time, such improvements offer numerous benefits, from optimizing the roadway's ability to move people and goods to providing low cost transportation choices for households. Perhaps most importantly, bicycle facilities contribute to community livability, which helps to attract and retain residents and employers.

The majority of the recommended bicycle network will be implemented by routinely incorporating bicycle facilities when streets are initially constructed, resurfaced, or substantially reconstructed. Other methods for funding and implementing recommended improvements may include:

- Where private developers are required to make street frontage improvements, bicycle facilities should be included where recommended in the Plan.
- Local, regional, state, and federal grant funds for transportation and non-transportation programs (such as environmental or health programs).
- Dedicated local funding sources, such as transportation benefit district funds specifically allocated for non-motorized transportation infrastructure.

Partnerships with agencies, organizations, and private interests such as Yakima Transit, Yakima School District, Yakima Chamber of Commerce, Yakima Greenway Foundation, Visitors and Conventions Bureau, local colleges and universities (Yakima Valley Community College), the Downtown Association of Yakima, Yakima County, private companies, developers, and others will be needed throughout the implementation of this Plan. Partners may support plan implementation in a number of ways such as providing direct financial support, dedicating rights-of-way, contributing mitigation or transportation impact fees, pursuing grant opportunities, sponsoring events, conducting media and public education campaigns, etc.

Strategy 4: Incorporate funding for maintenance of bicycle facilities into the annual maintenance budget.

Dedicated funds are needed to cover periodic, annual and long term maintenance of the existing and future bicycle network. Maintenance activities may include replacing pavement markings, fixing potholes, filling concrete joints, changing out drain grates, replacing and repairing signs, etc. A portion of the Public Works budget should be allocated to bicycle facility maintenance.

Strategy 5: Pursue grant funding.

In addition to making internal budget adjustments in order to maximize investments, the City should continue to pursue a robust mixture of outside funding including other local, regional, state, and federal sources. Obtaining outside funding can be challenging due to increasing competition for limited amounts of transportation grant funds. However, being the largest urban area within Yakima County, Yakima is in a good position to receive funding from outside grant funding sources.

Good data is critical to winning grants. Yakima should consider conducting bicycle counts. The National Bike and Pedestrian Documentation project provides guidance for implementing a count program. Good crash data and tracking safety issues can help the City pursue WSDOT funding, much of which is safety-focused.

Strategy 6: Establish a grant match reserve fund (or similar system) in order to take full advantage of state and federal grants.

State and federal grants typically require between 13.5% and 20% of the total project cost to be provided from local funding sources and grant applications with higher local funds are far more competitive than applications that provide the minimum local funds. Local transportation funding can include dollars derived from the local Street Fund, Real Estate Excise Taxes (REET), special sales taxes, and funding contributions from other agencies. In addition, grant funding agencies look very favorably on projects that include mitigation funds derived from private development, such as transportation impact fees.

Strategy 7: Institutionalize the Yakima Bicycle Master Plan into plans and policies of the City.

Integrating Plan recommendations into existing City policies, plans and procedures is essential to ensure the Plan is implemented in a cost efficient way. Routine consideration of bicycle facilities in the City's project planning and review process will help to ensure they are incorporated into projects where recommended by this Plan. Bicycle Master Plan recommendations will be integrated into the Transportation and Comprehensive Plans, which will be updated in the near future.

Strategy 8: Enhance transportation policies that facilitate Complete Street design.

Implementation of bicycle facilities will be most efficient if they continue to be integrated into a comprehensive vision of multimodal transportation improvements. This can be further achieved through adopting a Complete Streets policy. It will be important to consider the wider transportation network when determining how and where bike facilities can be accommodated through Complete Streets implementation.

FUNDING SOURCES AND OPPORTUNITIES

The Yakima Bicycle Master Plan lays the groundwork for the planning, prioritization, funding, and installation of bicycle facilities as well as programs that will require a comprehensive funding strategy. Future funding should be a combination of federal, state, regional, and local monies. The following sections outline funding opportunities that the City of Yakima should consider for resources toward Plan implementation. Additional local funds could be sought through public-private partnerships which may also be instrumental in implementing certain segments of the network.

FEDERAL FUNDING OPPORTUNITIES

Federal funding available for bicycle related projects is in a state of flux until a new federal transportation bill is updated. The Federal Transportation Bill passed in 2012—known as *Moving Ahead for People in the 21st Century* (MAP-21)—restructured and redefined eligibility for federal funding of bicycle and pedestrian projects. With the advent of MAP-21, there is more local control of transportation dollars related to walking and biking, as 50% of funds are allocated to the discretion of

Metropolitan Planning Organizations (MPO). Another trend in the new transportation legislation is less funding specifically ear-marked for programs such as Safe Route to School. As an interim measure, congress has passed legislation authorizing continued funding of MAP-21. As new federal transportation legislation is adopted, the City of Yakima should work closely with YVCOG to monitor and take advantage of the new funding opportunities.

TRANSPORTATION ALTERNATIVES PROGRAM (TAP)

MAP-21 combines previous programs: Recreational Trails, Safe Routes to School and Transportation Enhancements into one: the Transportation Alternatives Program (TAP). TAP funds are split 50/50 between a competitive state grant program and statewide distribution according to population.

Washington State allocates Transportation Alternatives Program (TAP) funds for projects including pedestrian and bicycle facilities. Fifty percent of annual TAP funding includes \$1.8 million set aside for recreational trails and \$2.4 million set aside for Safe Routes to School. The remaining TAP funds are distributed to MPOs and Regional Transportation Planning Organizations. These organizations are responsible for prioritizing and selecting projects. In the 2014 fiscal year, the YVCOG had a total of \$283,287 in Transportation Alternative Program funds to allocate among all jurisdictions in Yakima County.

SURFACE TRANSPORTATION PROGRAM (STP)

The Surface Transportation Program (STP) provides flexible funding that can be used by local jurisdictions or states for roadway, bridge and transit projects. Because Yakima falls within the jurisdiction of an MPO, the funds are distributed through the YVCOG for prioritizing and selecting projects. Bicycle infrastructure and programming such as maps, educational materials etc. may be supported using these funds.

HIGHWAY SAFETY IMPROVEMENT PROGRAM (HSIP)

This program funds safety related projects that aim to reduce serious traffic injuries and deaths. Bicycle safety projects are eligible for this funding on all roadway types including state highways and residential streets. Eligible improvement projects include bike facilities, intersections, pedestrian crossings, etc. A percentage of this funding (\$1.2 million annually) is set aside for Safe Routes to School projects.

The State of Washington administers these federal funds and has distributed HSIP into four invitation-only competitive grants: City Safety Program, County Safety Program, Quick Response Safety Program and the City/County Corridor Safety Program. All of these grants can be used to fund engineering, enforcement, education and encouragement improvements. Like the Traffic Safety Grants, the highway and local program grants are directed by the state Strategic Highway Safety Plan called Target Zero. More information can be found at: <http://www.wsdot.wa.gov/LocalPrograms/Traffic/FedSafety.htm>

FEDERAL TRANSIT PROGRAM

These federal funds can be used for establishing bicycle and pedestrian access to mass transit, including parking and storage.

Funding for the improvement of mobility for seniors and people with disabilities is expanded under MAP-21. The 'New Freedom' activities have been revised into Section 5310 revenue stream. All Section 5310 projects must be initiated from locally developed, coordinated public transit-human services transportation plans. Additionally there are potential multimodal projects that may be eligible for this funding that would improve bicycle access, especially for older adults and people with mobility limitations.

STATE AND REGIONAL FUNDING

The Yakima Valley Conference of Governments (YVCOG) is the Metropolitan Planning Organization/ Regional Transportation Planning Organization (RTPO) serving Yakima and other cities within Yakima County. It distributes both state and federal funds through a variety of programs. Federal transportation dollars are allocated throughout the region and the YVCOG Transportation Improvement Program (TIP) includes projects that are important to the region and included in local plans.

Of the \$25 million allocated to the Transportation Alternatives fund for Washington State, approximately \$13 million was allocated by population to state MPOs, with the YVCOG region receiving approximately \$280,000. The YVCOG's regional TIP documents the distribution of state and federal funds for projects that include bicycle facilities.

SAFE ROUTES TO SCHOOLS (SRTS)

Safe Routes to School funding comes to the state from the Highway Safety Improvement Program and Transportation Alternatives Program. It is available to local governments through a competitive grant program and via a data-driven approach to identify the top infrastructure priorities based on Washington's Strategic Highway Safety Plan. The goal of SRTS funding is to increase the number of children walking and biking to school and to decrease the number of collisions involving children on foot or bike. WSDOT distributes these funds on a state-wide basis.

TRAFFIC SAFETY GRANTS

The Washington Traffic Safety Commission (WTSC) offers annual state grants to projects that help reach "Target Zero" goals of reducing roadway injury and fatalities. The grants range from \$5,000 to \$150,000.

PEDESTRIAN AND BICYCLE SAFETY GRANTS

These competitive grants are offered by the State through gas taxes to address areas with high collision and injury rates for pedestrians and bicyclists

WSDOT BIENNIUM BUDGET

Washington State Department of Transportation (WSDOT) has a biennium budget approved by the State legislature every two years. In the 2015 legislative session, a new 16-year transportation revenue package called “Connecting Washington” was passed. The revenue package includes \$9.7 billion for state and local road projects and \$1.3 billion for non-highway projects, including bike paths. The City should track the distribution of these funds and vigorously pursue them as they become available.

WASHINGTON STATE TRANSPORTATION IMPROVEMENT BOARD (TIB)

The Washington State Transportation Improvement Board (TIB) funds high priority transportation projects in communities throughout Washington to enhance the movement of people, goods, and services. TIB is an independent state agency, created by the Washington State legislature, which distributes and manages street construction and maintenance grants to 320 cities and urban counties throughout Washington State. Funding for TIB's grant programs comes from revenue generated by three cents of the statewide gas tax.

STREET OVERLAY AND RECONSTRUCTION FUND

The Street Overlay and Reconstruction Fund consists of \$2 million annually for “enhancement in quality and value of City street infrastructure” per 2014 City Charter amendment. Where applicable, capital projects that involve roadway resurfacing or paving should incorporate bicycle improvements.

YAKIMA REAL ESTATE EXCISE TAX (REET)/PUBLIC WORKS TRUST

Comprised of 1/4 of 1% of the total real estate revenue within city limits for a given year, REET funding can be used for limited types of transportation projects. Availability of these funds may fluctuate, as they did during the recession, in a given year.

LOCAL IMPROVEMENT DISTRICTS (LID)

Local Improvement Districts (LID) are established areas where local property owners, through self-imposed taxation, fund local improvements within the district. LIDs have been used in Yakima to fund roadway improvements. Yakima City Council or local property owners may establish an LID for bicycle related improvements as long as the majority of business or property owners within the district agree to the property tax increase. Properties adjacent to the improvement must pay a portion of the overall cost of the improvement project until the full cost of the improvement is paid.

YAKIMA DOWNTOWN BUSINESS IMPROVEMENT DISTRICT

The Central Business District Capital Improvement Fund has been used for downtown planning, as well as transportation design and construction, including parking facilities (“for the benefit of the area”), maintenance, and security. The CBD Fund may be useful for bicycle facilities and amenities such as bicycle parking.

OTHER AGENCIES, CORPORATE FUNDING, AND PRIVATE FOUNDATIONS

There is a broad range of private funding available for bicycle related improvements. Bicycle projects can be supported by funding aimed at a variety of areas including economic development, community health and fitness, transportation, transit mobility and access, and public infrastructure. Creative use of private grants can bolster public funds to implement the Yakima Bicycle Master Plan, keeping in mind that grants are not a reliable or consistent source of revenue. The following organizations provide grants of different sizes for bicycle infrastructure and programmatic activities.

PEOPLE FOR BIKES

The Green Lane Project provides funding for the implementation of innovative, low-stress bicycle facilities such as protected bike lanes. The Community Grants Program offers small amounts of funding for bicycle related projects to leverage federal funds and promote bicycling at the local level. Local governments and non-profits are eligible to apply.

ROBERT WOOD JOHNSON FOUNDATION

The Robert Wood Johnson Foundation is dedicated to improve “health and health care of all Americans,” including public education, prevention, communications activities, and investing in vulnerable populations. Municipalities are eligible for these funds and many bicycle and pedestrian related projects may be eligible.

ORAM FUND FOR THE ENVIRONMENT AND URBAN LIFE

This fund supports programs that impact sustainable urban development and environmental quality. Funding is available for public transportation, bicycling and walking, education, and transportation planning. Projects are prioritized over programming needs.

YAKIMA GREENWAY FOUNDATION

The Yakima Greenway Foundation is a private, non-profit land trust. The Foundation has a network of supporters and volunteers that may be vital partners to increasing bicycle access to the Greenway trail.

YAKIMA HEALTH DISTRICT

Local health organizations are beginning to realize that an active lifestyle leads to increased overall health. Funding to support active lifestyles in the form of a robust bicycle network may be available.

APPENDICES

- A. DESIGN AND MAINTENANCE GUIDE
- B. NETWORK MAPS
- C. PRIORITY NETWORK MAPS
- D. FULL SURVEY AND CROWDSOURCED MAP RESULTS
- E. OPEN HOUSE BOARDS