

Wausau MPO Bicycle and Pedestrian Plan

Cities of Wausau, Schofield, and Mosinee; Villages of Weston, Rothschild, and Kronenwetter; Towns of Texas, Maine, Stettin, Wausau, Rib Mountain, Weston, Mosinee, and Bergen | Marathon County, Wisconsin

20-Year Planning and Implementation Guide

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Schreiber | Anderson Associates, Inc.



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Table of Contents

Chapter 1: Executive Summary

Introduction	1-1
Existing Conditions	1-1
Recommendations and Implementation.....	1-2
Funding.....	1-3

Chapter 2: Introduction

Why is this plan important?.....	2-1
How was this plan developed?.....	2-3

Chapter 3: Planning Process

Bicycle/Pedestrian Committee Meetings.....	3-1
Stakeholder Interviews.....	3-1
Public Information Meetings	3-2

Chapter 4: Current Conditions and Inventory

Assessment of Bicycle and Pedestrian Friendliness.....	4-1
Bridge Access	4-1
Street and Highway System.....	4-2
Bicycle and Pedestrian System	4-2
Transit Interface	4-3
Community and User Characteristics.....	4-4
Socioeconomic Data.....	4-4
Travel to Work.....	4-6
Land Use.....	4-6
Inventory and Assessment of Existing Facilities.....	4-7
Biking Audit.....	4-7
Walking Conditions.....	4-10
Gaps Analysis	4-13
Bicycle and Pedestrian Statutes and Ordinances.....	4-14
Existing Plans	4-15

Chapter 5: Goals and Objectives

Goals and Objectives.....	5-1
Goals and Objectives (Logic Model)	5-3

Chapter 6: Best Facility Practices

Preferred Transportation Origins and Destinations.....	6-1
Alternatives for Improved Bicycle and Pedestrian Facilities.....	6-1
Bicycle Facilities	6-1
Pedestrian Facilities	6-6
Impacts of Bicycle and Pedestrian Facilities Alternatives.....	6-7

Chapter 7: Safety Analysis

Crash Statistics	7-1
Bicycle Crashes and Countermeasures.....	7-3
Pedestrian Crashes and Countermeasures.....	7-4
Five E's	7-5
Education.....	7-5
Encouragement	7-8
Enforcement.....	7-9
Engineering.....	7-10
Evaluation.....	7-11

Chapter 8: Recommendations and Implementation

General Pedestrian and Bicycle Programmatic Recommendations	8-1
Education, Encouragement, & Outreach	8-1
Enforcement	8-3
Facility Maintenance.....	8-4
Policies	8-6
General Pedestrian and Bicycle Facility Recommendations.....	8-7
Signage.....	8-7
Railroad Right-of-Way Trails.....	8-8
Pedestrian Facility Improvements	8-10
Bicycle Facility Improvements	8-12
Costs for Developing and Maintaining Facilities	8-12
Funding Opportunities.....	8-14
Implementation Plan	8-17
Implementation Table (Table 8.3; follows Implementation Plan)	8.3.1

Appendices

Appendix A: Stakeholder Interviews

Appendix B: Sidewalk Inventories and Bike/Ped System Gaps Analysis

Appendix C: Bicycle Crash Locations

Appendix D: Recommended Bicycle Route Maps

Appendix E: Rails-with-Trails and Rails-to-Trails

Appendix F: Project Sheets for Select Facilities

EXECUTIVE SUMMARY

1.1 Introduction

The Wausau Metropolitan Planning Organization (MPO) has prepared this 20-year Bicycle and Pedestrian Plan to develop sound strategies for improving bicycle and pedestrian transportation throughout the Wausau area for users of varying abilities. The planning area includes the following municipalities: the cities of Wausau, Schofield, and Mosinee, the villages of Weston, Rothschild, and Kronenwetter; and the towns of Texas, Maine, Stettin, Wausau, Rib Mountain, Weston, Mosinee, and Bergen.

The MPO received a discretionary funding grant from the Wisconsin Department of Transportation (WisDOT) to develop this plan for the Wausau area. It has been established to meet the increased needs of bicyclists and pedestrians for commuting, recreation, and other purposes. It is meant to help guide local, area, and state efforts to improve existing conditions and develop new facilities and programs to improve the quality of life for all citizens of the Wausau area.

Oversight on this project has been provided by the Bike/Ped Committee, a sub-committee to the Technical Advisory Committee of the Wausau MPO. The Committee was responsible for providing direction and review of plan components through a series of committee meetings. The process also included a two Public Information Meetings, a stakeholder interview process, and a public hearing.

1.2 Existing Conditions

The Wausau area consists primarily of a grid pattern street system that is altered by the area's waterways and lakes. As a result, bridges are a major concession for bicycle and pedestrian travel. There are eight bridges that cross the Wisconsin River, which divides the County between east and west. Seven of these bridges are located within the planning area, and three are in the City of Wausau.

The Wausau urbanized area is connected to the surrounding rural areas by a system of State and County highways. Interstate (I)-39/ United State Highway (US) 51 provides the primary north-south route through the County. Travel east to west is primarily accommodated through STH 29 which is a mixed freeway/expressway facility that runs west to Eau Claire and east to Green Bay. Bicycle and pedestrian travel are prohibited on US 51 and the freeway portion of STH 29. The County Highway (CTH) system is a primary linkage between rural communities within the planning area and the Wausau urbanized area.

Census 2000 indicates 73 percent of workers who reside within the planning area also work within the planning area. Connections between places of residence (such as V. of Weston) to place of employment (such as C. of Wausau) are integral to increasing mode share. Often, bicycle commuters who reside in rural areas use county highways to access the urban transportation network. Providing safe and adequate facilities along these "urban escape routes" creates opportunities for commuters who want to bike to work the opportunity to do so. Similarly, connections to area trails, such as the Mountain Bay Trail, can increase comfort levels for bicyclists of all abilities.

Transportation systems and land use patterns have a well-documented reciprocal relationship. As communities have grown, the demands for transportation system improvements have also grown. However, these transportation improvements have also

provided more convenient access to undeveloped land farther out, thus spurring further growth. More than any other transportation system, it has been the road network and the prevalence of the automobile that has impacted land use patterns over the past half-century.

Notable land use patterns or issues for Marathon County include:

- Rivers divide the urbanized area between east and west and to a lesser extent from north to south
- Development is often not contiguous; in general, municipalities have their distinct areas of both residential and commercial development. In many cases, water, or undeveloped land separates communities from their neighboring community.
- Development as it exists today directly corresponds to the freeway system.

Walking is often overlooked and undervalued as a transportation mode. Yet, in the Wausau planning area, 2.3 percent of commuters reported regularly walking to work. Pedestrian commuting percentages are even higher within the City of Wausau's older neighborhoods near downtown. These percentages do not include other pedestrian activity, such as walking trips to school, to shopping, or for recreation. Many of these pedestrians are children and seniors who require special consideration regarding facility design. Pedestrians include persons using wheelchairs or mobility devices.

Requirements for pedestrian facilities within the Wausau planning area vary by municipality. Municipalities within the urbanized area generally do not require sidewalks in residential areas. The Village of Rothschild is an exception, requiring sidewalks within new residential developments. The Village of Weston requires sidewalks in new developments and the City of Wausau addresses the issue of sidewalks with developers on a case by case basis.

Areas where there are gaps in the bicycle and pedestrian system include any place there is a lack of biking or walking facilities, maintenance issues, or areas where bike paths and major routes should connect to other routes, residential or employment areas. Noteworthy gaps included the difficulty of bicycle travel on Grand Avenue, the importance of connections between Rib Mountain State Park and Nine Mile Recreation Area, and some urban segments including parts of Sherman Street, S. 28th Avenue, and Stewart Avenue.

A general comment from the Bike/Ped Committee about these gaps includes the usability of these areas on a year-round basis. The quick and effective removal of snow can be an issue when not done with respect to crosswalk locations or curb lanes. In some cases, snow is stored near crosswalks or on planting strips after removal from a road surface and not cleared for effective bike or pedestrian travel.

1.3 Recommendations and Implementation

Recommendations were developed using an inventory and analysis of existing facilities, ordinances, and plans, as well as suggestions from the Bicycle Federation of Wisconsin and the Wausau MPO's Bike/Ped Committee. Recommendations include bicycle and pedestrian programs, facility improvements, route configuration, and implementation strategies. A timetable for expansion of the bicycle and pedestrian network was also developed.

Education, encouragement, and outreach programs were designed to foster a safe bicycling and walking environment and increase the prevalence and enjoyment of walking and bicycling. Successful encouragement and outreach efforts largely rest on a foundation of extensive and effective educational programs. Education programs include identifying safe routes for bicyclists and pedestrians, teaching bicycling techniques, disseminating

information regarding regulations that govern bicyclists and pedestrians, and instructing bicyclists and pedestrians how to handle potentially dangerous situations. Encouragement activities are valuable because they enable or promote biking and walking through incentives (such as rewards) or provisions (such as shower facilities). Outreach activities are among the easiest and least cost intensive initiatives that advance bicyclist and pedestrian safety.

Consistent enforcement of traffic laws also plays an important role in advancing bicyclist and pedestrian safety. Likewise, maintenance procedures are important for all types of transportation facilities. Poorly maintained facilities can increase the County's liability by being unsafe or unsuitable for use. Periodic and consistent removal of debris and resurfacing/patching of deteriorated pavement are important procedures for ensuring that users are provided with safe and reliable transportation facilities. Bicycles, especially, are more sensitive than motor vehicles to roadway irregularities such as potholes and loose gravel.

While useful to encourage and sustain bicycling, operational programs and policies are futile without adequate bicycle facilities. Too often, bicycle facility planning is synonymous with planning separate bikeways. Separate bike lanes and bike/pedestrian paths, though, are the most costly of all facility improvements. Because of their direct costs and the amount of public right-of-way needed to accommodate these systems, separate bikeways seldom form a complete bicycle and pedestrian system. As a result, it is more efficient to make use of established transportation right-of-ways. Signing, shared roadways, bicycle parking, a strong education system and policy improvements are perhaps the best and most cost effective means of improving conditions for bicycling and walking.

Signing “Bike Routes” allows the communities who post these signs to better prioritize bicycle improvements on local roadways and to direct potential bicyclists to the preferred routes within the community. The route signs are good for users inside the community because they give local residents the ability to negotiate the local street pattern using established routes. Visitors from outside can also enter the community using recommended routes that they know link up with other connections or destinations. These routes also increase the likelihood that motorists will encounter bicyclists along the route which may heighten driver attentiveness and bicyclist camaraderie.

As important as bicycle facilities are for increasing mobility, it is also critical to maintain a comprehensive vision for creating a walkable Wausau area, which includes trails, parks, and roadways. Pedestrian planning as it applies to municipal governments is best done at the local level. Rather than recommend a myriad of specific facility improvements within municipalities, this MPO plan sets policy priorities and offers guidance and tools to municipal governments to help them promote walking and pedestrian safety while identifying key locations to extend the bicycle network.

I.4 Funding

Marathon County and member communities of the Wausau MPO should appropriate annual funds for bicycle and pedestrian improvements just as they do for other roadway projects. In addition, bicycle and pedestrian projects may be eligible for state or federal funding. Pedestrian improvements that benefit public health and safety should be funded through the general fund, supplemented by available state and federal grants, rather than through assessment.

Federal transportation enhancement programs, most recently reauthorized as SAFETEA-LU, have helped fund many bicycle and pedestrian transportation activities throughout the United States. Similarly, Wisconsin has approved the funding of many community projects including Transportation Enhancement (TE) funds for larger infrastructure programs. Off-street paths may have overlapping recreational and transportation value. For these bicycle improvements, the Wisconsin Department of Natural Resources' Stewardship Program may also be an appropriate source of funding.

Alternate funding strategies through private interests should also be considered. Local private interests will benefit from an improved system that offers transportation choices and attracts tourists to the area. Private agencies that share the MPO's vision for an integrated bicycle system may be willing to invest in development or maintenance of facilities. These private partnerships should be explored to provide better bicycle and pedestrian facilities.

2

INTRODUCTION

The Wausau Metropolitan Planning Organization (MPO) has prepared this 20-year Comprehensive Bicycle and Pedestrian Plan to develop sound strategies for improving bicycle and pedestrian transportation throughout the Wausau area for users of varying abilities. The planning area includes the metro area and includes the following municipalities: the cities of Wausau, Schofield, and Mosinee, the villages of Weston, Rothschild, and Kronenwetter; and the towns of Texas, Maine, Stettin, Wausau, Rib Mountain, Weston, Mosinee, and Bergen.

The MPO received a discretionary funding grant from the Wisconsin Department of Transportation (WisDOT) to develop this plan for the Wausau area. It has been established to meet the increased needs of bicyclists and pedestrians for commuting, recreation, and other purposes. It is meant to help guide local, metro area, and state efforts to improve existing conditions and develop new facilities and programs to improve the quality of life for all citizens of the Wausau area.

This document incorporates recommendations set forth in the *Wausau Metropolitan Area Long Range Transportation Plan – 2035* (2006) which only initially addressed the existing service of bicycle and pedestrian activity. This plan has also been informed by past multimodal studies including the *Bicycle & Pedestrian Plan for the Non-Urbanized Area of Marathon County, WI* (1996).

The recommendations set forth in this plan will increase transportation safety for pedestrians, bicyclists and motorists. Infrastructure improvements such as sidewalks, marked crosswalks, designated bikeways, bike lanes, paved shoulders, multi-use path and traffic and informational signs are among the type of facilities recommended to improve conditions for the non-motoring public. Opportunities to educate bicyclists about safety and promote bicycling as a viable mode of transportation are also discussed. Additionally, recommendations to improve enforcement and education regarding traffic laws affecting bicyclists and walkers and to promote bicycling and walking as viable modes of transportation are also included.

2.1 Why is this Plan Important?

Before the 1900's, bicycling and walking were common modes of transportation in the United States. Transportation infrastructure and land use patterns reflected the need to accommodate these travel modes. Compact communities allowed people to walk to most destinations. Interestingly, early American urban roads were originally paved to help bicyclists reach their destinations. As the pace of the American lifestyle quickened and automobiles were made affordable to a larger portion of the population, bicycling and walking gradually dropped in priority as modes of transportation. Since the late 1940's, motor vehicles have been the dominant influence on transportation and land use patterns and subsequently, these land use patterns have changed behavior patterns. The convenience and flexibility of the automobile are easily recognized; however, automobiles are not the most efficient mode of travel for some types of trips. The benefits of alternative modes of travel such as bicycling and walking are particularly significant for short urban trips. The arguments for encouraging these modes of travel are both functional and philosophical:

- Bicycling and walking are two of the most cost efficient modes of transportation with regard to operation, development and maintenance of facilities.

- Bicycling and walking are two of the best forms of physical exercise and therefore can effectively enhance the health of the user.
- Bike and pedestrian facilities developed for transportation purposes can simultaneously enhance recreation and tourism opportunities.
- National, state and local units of government increasingly acknowledge the benefits of bicycling and walking beyond merely recreational values. Recognizing the efficiency of bicycling and walking for certain types of trips among the other modes of travel is the basis for multi-modal transportation planning.
- Bicycling and walking do not contribute to noise or air pollution and thus contribute to the health of the community. Off-road facilities developed for bicycling and walking can protect and enhance natural resources.
- Bicycling and walking promote social interaction of families and community members.

The premise of multi-modalism is simple: to create a transportation system that offers not only choices among travel modes for specific trips, but more importantly, presents these options so that they are viable choices that meet the needs of individuals and society as a whole.

As part of the federal initiative to encourage multi-modal transportation in general and bicycle transportation in particular, the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU) requires that long range planning of transportation systems include provisions for bicycling and walking. This legislation builds on the Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA) and the Transportation Equity Act for the 21st Century (TEA-21) to supply funds and a programmatic framework for investments in transportation infrastructure. SAFETEA-LU also provided funding for all fifty states to initiate a Safe Routes to School program to enable and encourage school children (K-8) to walk and bicycle to school.

In Wisconsin, bicycling and walking have been promoted through WisDOT's TransLinks 21 Plan. This transportation initiative is a comprehensive, twenty-five year transportation plan that was developed through two years of planning and public involvement. The TransLinks plan calls for bicycle and pedestrian provisions on state highway projects, inclusion in the Metropolitan Planning Organization's (MPO) plans and also recommends the development of a comprehensive State Bicycle Plan and Pedestrian Plan. While nearly eight million Americans enjoy bicycling and all are pedestrians, only 5.5% of all urban trips in the United States are by walking and 0.9% by bicycling. Safety, distance and traffic conditions are reasons often cited for the infrequent use of these travel modes. A 1990 Harris Poll suggests that twice as many people would walk or bicycle as a primary means of transportation if better facilities were available. In this fast-paced society, time and distance are perhaps the greatest impediments to non-motorized travel. Yet nearly 40% of trips made in the U.S. are less than two miles. Trips of this length are very easily accomplished by average bicyclists, and when compared to driving, require little additional time.

Walking and bicycling are underutilized modes of transportation in the Wausau area. While mean travel time to work in Marathon County was under 20 minutes in 2000, very few choose to commute by bicycle (0.2%) or by walking (2%). The relatively small number of walking and bicycling trips can be attributed to impediments such as traffic conditions, safety

concerns, transportation infrastructure and topography. This plan is designed to increase levels of bicycle use by making recommendations to remove these impediments, and to change the prevailing attitude that using an automobile is easier and more convenient than bicycling or walking.

2.2 How was the Plan Developed?

Development of this plan was administered by MPO staff with oversight from an ad hoc subcommittee (Bike/Ped. Committee) of the Technical Advisory Committee and prepared by Schreiber/Anderson Associates, Madison, Wisconsin. This advisory committee included representatives from various jurisdictions and reflected a broad cross-section of biking and walking interests. This group provided guidance to the consultant team and met regularly to review the work to date. There were also two public informational meetings held during the planning process.

The consultant wishes to acknowledge Marathon County Staff for their efforts, as well as the Bike/Ped. Committee, the Wausau MPO and the many citizens who contributed ideas and concepts to make this a compelling and actionable document.

3

PLANNING PROCESS

The planning process began with the formation of goals and objectives that were the basis for evaluating and guiding the overall plan. Plan goals were refined through the planning process to suit the local conditions as determined by an inventory and analysis of existing data. Inventories of conditions included historical data, field observations (conducted by traveling the planning area), research of local and county planning documents and meetings with the public and government agency staff. Planning and design criteria derived from Wisconsin Bicycle Planning Guidelines, Wisconsin Bicycle Facility Design Handbook, AASHTO Guidelines for Developing Bicycle Facilities, AASHTO Guidelines for the Planning, Design, and Operation Pedestrian Facilities, and The National Bicycling and Walking Study were used as general analysis criteria. Following the analysis of planning considerations, county staff, the advisory committee and the public reviewed the interim plan.

The following sections describe the public process and summarize the results of these efforts.

3.1 Bicycle/Pedestrian Committee Meetings

The genesis for the development of this plan begins with the formation of the Bike/Ped Committee. Membership includes advocates, municipal representatives, recreation groups, enforcement agencies, and members of the Technical Advisory Committee to the MPO. The Bike/Ped Committee was the direct oversight authority over creation of this plan and helped to shape its vision and recommendations. The Committee met approximately monthly to discuss progress and to plan implementation strategies. It is strongly recommended that this body remain intact after adoption of this plan to act as a clearinghouse and resource for the MPO and the municipality member to help grow bicycle and pedestrian mobility within the Wausau metro area.

3.2 Stakeholder Interviews

The public process used for the preparation of this plan includes multiple opportunities to gather stakeholder feedback. To ensure maximum coverage in communication, the Bike/Ped Committee invited a list of stakeholders to a series of interviews held over a one-day period on January 15, 2008. These interviews were used to advise the Committee and consultants about current attitudes toward walking and biking within the Wausau metro area. A full description of the process and results is available in Appendix A.

Stakeholder groups included individuals or representatives from the following groups:

- **Local Government/Business Community** (local governments, transit service, business organizations)
- **Law Enforcement/Education** (police departments, school districts, etc.)
- **Health Care/Special Needs** (health departments and coalitions, non-profit advocacy, etc.)
- **Local Foundations** (non-profit or benevolent enterprises)
- **Recreation** (clubs, friends groups, recreational equipment retailers, etc.)

Several general trends emerged from the interview process. These include:

- **Schools:** have special conditions related to biking and walking. These areas should be addressed on a case by case basis.
- **County Highways:** should include a wide paved and striped shoulder to the extent practicable in all areas.

- **Roads in Urbanized Areas:** should be striped for bicycle accommodations where existing outside travel lanes are wide enough.
- **Education:** is necessary for all transportation users. Motorists need to be more aware of bicycle and pedestrian rights, and walkers and bikers need to use the transportation system correctly and safely. Increased education about transportation issues and options also has potential to provide momentum for increased bicycle and pedestrian facility development. There is also a lot of advocacy occurring currently, though increased efforts are desired.
- **Funding:** is a universal concern. A diversified approach to funding education, encouragement and engineering projects is preferred and more money is required to affect change.

In conclusion, while the interview process offered a very limited sampling of stakeholders in the Wausau area, it appears there is some consensus about the current transportation system. Universally, there is a desire for better connectivity between on-street and off-street bicycle and pedestrian facilities. Often, this includes a more coordinated approach to route development across jurisdictional boundaries. In terms of good and bad, everyone seemed to like what was done on CTH “R” which contains both a sidepath and a wide striped curb lane. At the same time, most agreed that Grand Avenue is substandard for either bicycle or pedestrian travel due to high traffic volume, frequent driveway conflicts, and low setback of the sidewalk from the street. It is commonly thought that an increase in education and encouragement will enhance the demand for, and usership of biking and walking for transportation and for recreation.

Continuing to apply for and to utilize a variety of funding sources increases the availability of funds. It will take a champion, or group of champions united around a cohesive message, to change the mindset within the Wausau area about the use of walking and biking for regular transportation. This includes planning for bicycle and pedestrian facilities when new neighborhoods, schools, and commercial areas are being developed. Safe and direct transportation for walkers and bikers on a regional basis will require the efforts of all members of the Wausau MPO, adjacent and overlapping organizations, and other volunteers working in concert to increase mode share for biking and walking.

3.3 Public Information Meetings (PIM)

There were two public information meetings held during the planning process positioned to bookend the process. The first was an introductory Kick-Off meeting to outline the process and preliminary results; the second was an unveiling of the draft recommendations held as an Open House.

PIM #1: Kick-Off

This meeting was held November 1, 2007 at 212 River Drive in Wausau, WI. It was attended by approximately 60-75 people. The purpose of this “open house” was to display maps (bicycle audit, etc.), draft goals and objectives, and to allow participants to discuss their preferences about biking and walking in the Wausau area. The meeting provided an informal opportunity for community members to discuss issues and aspirations with members of the Bike/Ped Committee and the consultant. Comments and concerns were discussed with the Bike/Ped Committee at a regular meeting immediately following the open house. Some of the discussions included:

- New scheduled improvements (CTH X, pedestrian bridge in Weston, Sherman St)
- Preferred routes (east/west connections from urbanized area)
- Existing Plans (Rib Mountain, V. Weston, C. Wausau)

- Connections to Mountain-Bay Trail

PIM #2: Open House

On May 22, 2008, a public open house again drew a full house of 60-75 people. The open house was held in the same location as the initial kick-off public meeting. Community members surveyed poster-sized maps, which graphically outlined and organized the most current plan recommendations. The maps detailed existing and proposed on-street bicycle routes, existing and proposed off-street paths, and currently planned on-street and off-street bicycle routes. After the attendees reviewed the maps, the chair of the Bike/Ped Committee introduced the project, and SAA summarized the planning process, the purpose of the plan, and recommended strategies to enhance bicycling and walking in the metropolitan area. SAA and members of the sub-committee then fielded questions from the audience and an inspiring and uniformly positive discussion ensued regarding land use and transportation planning and strategies to make the metro area more bicycle and pedestrian friendly. The discussion solicited input from the experienced riders to elementary school-aged cyclists to elderly pedestrians. After the presentation and question and answer session, community members gathered around the maps and discussed and critiqued the recommended route maps.



4

CURRENT CONDITIONS and INVENTORY

Inventory and Analysis

The inventory and analysis of factors affecting bicycle and pedestrian transportation include an assessment of bicycle and pedestrian access, population and transportation patterns, existing bicycle and pedestrian facilities, destination identification, and a review of state and local ordinances and plans.

4.1 Assessment of Bicycle and Pedestrian Friendliness

4.1.1 Bridge Access

The Wausau area consists primarily of a grid pattern street system that is altered by the area's waterways and lakes. As a result, bridges are a major concession for bicycle and pedestrian travel. There are eight bridges that cross the Wisconsin River, which divides the County between east and west. Seven of these bridges are located within the planning area, and three are in the City of Wausau. Other area bridges link communities across other waterways including the Eau Claire and Rib rivers.

Major bridges along arterial and collector streets that have been assessed for active transportation include (from north to south):

- CTH WW (Brokaw) over Wisconsin River: provides 3-foot paved and striped shoulders for modest bicycle and pedestrian accommodation.
- E. Bridge Street over Wisconsin River: four traffic lanes no accommodation for bicycle travel.
- East Scott Street (1-way, downtown Wausau, Stewart Ave.) over Wisconsin River: good pedestrian facilities, poor bicycling conditions on roadway because there is not a wide outside travel lane or adequate shoulder.
- W. Washington Street (1-way, downtown Wausau, Stewart Ave.) over Wisconsin River: good pedestrian facilities, poor bicycling conditions on roadway because there is not an adequate shoulder.
- E. Thomas Street over Wisconsin River: bridges are striped for two travel lanes but appear wide enough to accommodate bicycles. There is a separated sidewalk on the north side of the bridge. Pedestrian access is good, bicyclists use either the on street travel lane or the separated sidewalk. Width on the sidewalk is less than preferred for use by pedestrians and bicyclists.
- McCleary Bridge (CTH N, 17th Ave.) over Big Rib River: bridge offers good pedestrian facilities. Extra wide travel lanes offer good bicycle accommodation (can likely accommodate five-foot striped bike lanes).
- I-39/US 51 over Big Rib River: no access to active transportation.
- Grand Avenue (Bus 51) over Eau Claire River: this bridge is adequate for bicycle or pedestrian crossing. Bicyclists face poor conditions once off the bridge however, traveling both north and south. This is due primarily to high traffic volume, traffic speed, and narrow travel lanes from curb to curb. There are also many driveway entrances along the corridor which may pose conflicts for motorists and cyclists.
- STH 29 over Wisconsin River: no access to active transportation
- STH 153 (Main Street, Mosinee) over Wisconsin River: these two bridges have 3-foot paved shoulders which make them adequate for biking or walking. A five-foot sidewalk is currently provided along the south side of the bridges. The two bridges are currently

being reconstructed to include wide striped shoulders and a 10-foot sidewalk on the south side.

Most of these bridges could be improved by striping shoulders and adding four to five-foot bike lanes where they can be accommodated. A bridge reconstruction policy that includes accommodation for bicycles, pedestrians, and motorists would also improve the multimodal capability through the Wausau MPO.

4.1.2 Street and Highway System Access

The Wausau urbanized area is connected to the surrounding rural areas by a system of State and County highways. Interstate (I)-39/ United State Highway (US) 51 provides the primary north-south route through the County. Travel east to west is primarily accommodated through STH 29 which is a mixed freeway/expressway facility that runs west to Eau Claire and east to Green Bay. Bicycle and pedestrian travel are prohibited on US 51 and STH 29. The County Highway (CTH) system is a primary linkage between rural communities within the planning area and the Wausau urbanized area.

4.1.3 Bicycle and Pedestrian System Access

This section includes a discussion on the importance of connectivity of transportation facilities, identifying origin/destination points, and understanding the function of bicycles and pedestrian facilities for both transportation and recreation.

Connectivity

The importance of connectivity cannot be understated. If a segment of road, trail, or sidewalk does not link a user's origin with their intended destination it may not be a viable transportation option for that trip. However, if linkages are available from this segment to other segments, facilities, or destinations, then the whole system is improved. For example, many bicycle commuters will use a series of on-road facilities (e.g. bike lanes), off-road facilities (shared use trails), and other connections (local paths to buildings or structures) during a typical trip. Ensuring these facilities are "connected" in some way increases the likelihood they will be considered for regular transportation.

Within Wausau's urbanized area there are a variety of trails, such as the River Edge Trail, that provide important linkages between commercial centers, recreation areas, and environmental resources, such as the Wisconsin River. Enhancing the usability of existing trails by increasing the number of connections to priority destinations is vital to creating a more bicycle and pedestrian friendly transportation system.

Intergovernmental linkages are just as important. Census 2000 indicates 73 percent of workers who reside within the planning area also work within the planning area. Connections between places of residence (such as V. of Weston) to place of employment (such as C. of Wausau) are integral to increasing mode share. Often, bicycle commuters who reside in rural areas use county highways to access the urban transportation network. Providing safe and adequate facilities along these "urban escape routes" creates opportunities for commuters who want to bike to work the opportunity to do so. Similarly, connections to area trails, such as the Mountain Bay Trail, can increase comfort levels for bicyclists of all abilities.

Transportation v. Recreation Function

In terms of federally funded transportation projects, there is a restriction in 23 U.S.C. 217(i) that a bicycle project must be principally for transportation, rather than recreation, purposes.

A facility serves a transportation purpose when it is used to get people from Point A to Point

B, and could likely substitute for motor vehicle trips. Recreation trips also may occur on the same facility.

A facility is a recreation facility when the primary purpose is to use the facility itself. For example, a backcountry hiking trail is a recreational facility because its intent is not transportation. Similarly, most mountain biking trails (e.g. Nine Mile Mountain Bike Trail) are recreation trails, not transportation facilities. A great majority of the trails, routes, and facilities in the Wausau area are recreation or tourism facilities that also serve a transportation function.

Origins and Destinations

Generally, motorized and non-motorized transportation users share similar origins and destinations - but use different modes to accomplish their goal of arriving at a destination safely and efficiently. Arterial and collector roads that effectively deliver many motorists also provide the most direct and continuous routes for many bicyclists. These systems, however, are not always designed to accommodate the special needs of the average bicyclist. When roadway conditions are unsuitable for bicyclists, infrastructure design treatments may be used to improve the roadway or an alternative corridor may be selected.

Potential use patterns are not always reflected by the existing transportation system, but can be estimated by locating trip generators (origins and destinations) and projecting areas of population growth and future land use patterns.

Generally speaking, people are less willing to commute to work by bicycling and walking if the travel time is more than 20 minutes. Directness of the route, physical condition of the bicyclist, number of stops and availability and proximity of parking facilities will affect how far one is able to cycle in 20 minutes. The average adult cyclist commonly travels 3 to 4 miles in 20 minutes.

From a bicyclist's standpoint, this 3-4 mile trip defines the service area of each destination and helps to define commuting use patterns. Recreational riders will ride much farther in a day - trips of 30 to 40 miles are not unusual and tours of 80 to 100 miles are offered regularly during the biking season in Wisconsin. Fitness riders and bike racers will travel 30 to 50 miles in a typical training ride.

At the regional level, other communities and major recreational destinations are the prime trip generators. Within the urban and suburban areas, these destinations also include local shopping, employment, government centers, schools, or park and recreation facilities.

4.1.4 Transit Interface

Metro Ride, formerly known as the Wausau Area Transit System (WATS), provides public transportation services in the Wausau area. Metro Ride is the only intra-city transit service available to the general public within the Metropolitan Planning Area (MPA). Metro Ride is owned by the City of Wausau and provides limited service to the villages of Rothschild and Weston, and the City of Schofield.

Most transit users access the bus system on foot and rely on pedestrian facilities. Inadequate pedestrian facilities not only make it more difficult to use the bus, they can also pose safety hazards to riders. Increasing the number of shelters or street furniture for pedestrians waiting for buses may improve comfort levels for transit users.

Transit users who access the bus system via bike must rely on the availability of an adequate location to lock their bike once arriving at the bus stop, or must bring their bicycle with them. Metro Ride has recently started retrofitting buses with front-end bicycle racks so users can transport their bicycles to their destination.

4.2 Community and User Characteristics

This section includes Census 2000 data related to walking and biking in the Wausau area. It should be noted that most of these data are derived from the “long-form” which was randomly distributed to 1 in 6 households and while this should not skew results, the time of enumeration may have an impact. The Census is recorded in March making conditions in north central Wisconsin less than ideal for biking and walking. These data should be used to establish a baseline of users in the planning area, to compare to other communities, and to reserve for evaluation against the next Census (2010).

4.2.1 Socioeconomic Data (2000)

This analysis is based on the information developed for the Wausau Area 2035 Long Range Transportation Plan (LRTP) adopted in July 2006.

Population

Approximately 83,600 people and 32,700 households live within the designated Metropolitan Planning Area. The area has continued to grow over the past couple decades, increasing in population by five percent between 1980 and 1990 and nine percent 1990 and 2000. Several communities report a continued growth in new housing starts, which suggests that the area has continued to grow in population since 2000. This anecdotal evidence is substantiated by July 2006 Annual Estimates of Housing Units for Counties developed by US Census. The estimates show Marathon County has increased from 50,360 units in 2000 to 55,987 in 2006 for an 11% increase.

Table 4-2-1a: MPO Municipal Populations 1980-2000

MPO Municipality	1980	1990	2000
C. Mosinee	3,015	3,820	1,063
C. Schofield	2,226	2,415	2,117
C. Wausau	32,426	37,060	38,426
T. Maine	2,163	2,206	2,407
T. Mosinee	1,464	1,638	2,146
T. Rib Mountain	5,344	5,605	7,556
T. Stettin	4,436	2,191	2,191
T. Texas	1,634	1,643	1,703
T. Wausau	2,215	2,133	2,214
T. Weston	11,342	11,450	514
V. Brokaw	298	224	107
V. Kronenwetter	5,012	4,850	5,369
V. Rothschild	3,338	3,310	4,970
V. Weston	-	-	12,079

Source: Census 2000

Households

In the Wausau area, the average household size in 2000 was 2.6 persons per household. However, average household size can vary significantly by neighborhood. Household size can also change over time. Over the last several decades, average household size has decreased dramatically, due to people having fewer children, people waiting longer to have children, more single-parent families, more older people living alone, and rising incomes which allow persons to afford to live alone.

Income

The following table demonstrates the median income generated by individual people, families, and households by MPO member municipality. Although median household income is higher in Marathon County overall than the state, it is slightly lower in median family income and per capita income. Differences between the municipalities listed vary widely.

Three income means are considered:

- ✓ The median divides the total frequency distribution into two equal parts: one-half of the cases fall below the median and one-half of the cases exceed the median.
- ✓ Median Household Income is the average income for a household, which includes all the people who occupy a housing unit as their usual place of residence.
- ✓ Median Family Income is the average income of a group of two or more people who reside together and who are related by birth, marriage, or adoption.
- ✓ Per Capita Income is an average obtained by dividing aggregate income by total population of an area.

Table 4-2-1b: MPO Municipal Income Estimates 2000

MPO Community	Median Household Income	Median Family Income	Per Capita Income
C. Mosinee	\$46,109	\$51,776	\$18,700
C. Schofield	\$38,158	\$50,850	\$20,287
C. Wausau	\$36,831	\$47,065	\$20,227
T. Maine	\$57,679	\$62,176	\$23,787
T. Mosinee	\$55,094	\$58,750	\$21,930
T. Rib Mountain	\$61,294	\$66,337	\$27,768
T. Stettin	\$60,221	\$64,803	\$26,269
T. Texas	\$51,830	\$57,024	\$18,852
T. Wausau	\$51,071	\$52,500	\$22,248
T. Weston	\$56,719	\$61,375	\$23,941
V. Brokaw	\$27,083	\$54,167	\$28,290
V. Kronenwetter*	\$55,718	\$60,324	\$23,395
V. Rothschild	\$50,543	\$58,149	\$22,236
V. Weston	\$46,063	\$52,398	\$20,148

County	\$45,165	\$52,632	\$20,703
State	\$43,791	\$52,911	\$21,271

*was a town in 1999

4.2.2 Travel to Work

Means of Travel

This table reflects how workers aged 16 years or older in Marathon County get to work on a daily basis compared to state and national figures for same. These data show that marginally more Marathon County workers drove alone (81%) in 2000 to get to work than did others in the state (80%) or nation (76%). Many of these trips (over 40%) took less than 15 minutes. A lower percentage of Marathon County workers walked or biked to work than in the state or nation.

Table 4-2-2a: Means of Travel to Work for Workers 16 Years or Older (2000)

2000 Bureau of Census Data	United States		Wisconsin		Marathon County	
	Number	Percent	Number	Percent	Number	Percent
Total Population 16 and over	128,279,228		2,690,704		65,680	
Drove Alone	97,102,050	75.7	2,138,832	79.5	53,251	81.1
Bicycled	488,497	0.4	11,635	0.4	171	0.3
Walked	3,758,982	2.9	100,301	3.7	1,734	2.6
Travel Time to Work (mode of travel not specified)						
Less than 10 Minutes	17,868,011	14.4	533,891	20.7	13200	20.2
10 to 14 Minutes	18,618,305	15	476,569	18.4	13309	20.1

Controlling for only communities located within the Wausau MPO planning area, Census data show slightly higher bicycle usage (0.34%) but lower pedestrian travel (2.2%) to work than Marathon County overall.

Journey to Work

These data represent County-to-County worker flows from the Census 2000 Journey to Work files. As indicated, a vast majority (87%) of residents who live in Marathon County also work in Marathon County. Of the remaining counties listed, Wood County has the highest percentage of workers with 6% (3,944). All other counties not listed showed fewer than 1% of residents.

Table 4-2-2b: Journey to Work from Marathon County to Place of Employment (2000)

Place of Employment	Number	Percent
Clark County	710	1%
Lincoln County	964	1%
Marathon County	57,000	87%
Portage County	968	1%
Wood County	3,944	6%

4.2.3 Land Use

The importance between land use and transportation should not be underestimated. Land use patterns and development decisions are often seen as controlled solely by market

forces, leaving public agencies to respond to the transportation demand created in their wake. However, public land use policies directly affect private land use decisions such as zoning regulations and minimum parking requirements. Therefore, land use policies need to be considered in relation to the impact of transportation just as transportation policies need to be considered in relation to land use.

Transportation systems and land use patterns have a well-documented reciprocal relationship. As communities have grown, the demands for transportation system improvements have also grown. However, these transportation improvements have also provided more convenient access to undeveloped land farther out, thus spurring further growth. More than any other transportation system, it has been the road network and the prevalence of the automobile that has impacted land use patterns over the past half-century.

Notable land use patterns or issues for Marathon County include:

- Rivers divide the urbanized area between east and west and to a lesser extent from north to south
- Development is often not contiguous; in general, municipalities have their distinct areas of both residential and commercial development. In many cases, water, or undeveloped land separates communities from their neighboring community.
- Development as it exists today directly corresponds to the freeway system.

In terms of density, most of the urban areas within the cities of Wausau, Schofield, Mosinee, and the Village of Rothschild, have population densities above 6 to 10 persons per acre. However, many blocks within the City of Wausau's older neighborhoods have densities between 11 to 15 persons per acre and several blocks with 16 to 30 persons per acre. The Village of Weston, the Village of Kronenwetter, and the Town of Rib Mountain have a few blocks with 5 to 10 persons per acre and larger areas with 2 to 5 persons per acre. Most of the planning areas outside the urban centers have densities less than two persons per acre.

4.3 Inventory and Assessment of Existing Facilities

4.3.1 Biking Audit

An analysis of the bicycling conditions within the Wausau planning area was performed by the Bicycle Federation of Wisconsin over several days in September and October 2007. The analysis included a review and confirmation of the conditions recorded by the Wisconsin Department of Transportation's Bicycling Conditions Map (Marathon County) 2004. The assessment was performed with special attention toward identifying key links, or "urban escape routes", between periphery towns and the urbanized area. Often, the conditions in these critical areas determines the usability of the entire route. Limitations include volume and type of traffic (cars, trucks), high speeds, and limited roadway space for accommodation (no paved roadway shoulders).

The main criteria used in determining conditions for cycling were traffic volume, traffic speed, and physical space on the roadway. It is more difficult to determine conditions when no shoulder is present and both cyclists and motor vehicles need to share a travel lane that is too narrow to fit both users side-by-side. If traffic volume is too high to allow cars to pass cyclists giving them at least three feet to the point of traffic flow being impeded, it is considered to be in "poor" condition for cycling. If there are no shoulders but cars can freely pass, conditions are considered "good".

Arterials and collectors were evaluated throughout the planning area. Local urban and town roads were thought to be bikeable unless otherwise identified. The listing below separates

observations into loose quadrants based on the regional highway network with STH 29 dividing north and south and I-39/USH51 separating east from west. There is also a “central” area defined generally as the City of Wausau. See Map AA.

Existing conditions for bicyclists (esp. arterials and collectors, local roads where identified):

- NW - North of STH 29/West of USH 51
 - CTH WW (east/west to USH 51): conditions are poor from CTH K to 32nd Ave. There is no paved shoulder and high speed traffic. From 32nd Ave traveling east under I-39 and over Wisconsin River has 3-foot paved shoulders. Given the steep change in elevation into the river valley, conditions are only moderate for cycling.
 - CTH U (east/west; terminates at NCTC campus): This is a poor road for cycling with high traffic speed and volume. The Bridge over I-39 is equally poor with only a 1-foot paved shoulder and no room for bicyclists.
 - CTH K (north/south; from CTH WW to USH 51): This highway would provide direct connection to downtown Wausau with improvements. Current conditions are poor for cycling.
 - Stewart Ave (east/west; from USH 51 underpass to west): Underpass is currently under construction, Bike/Ped Committee comments seem to indicate this is currently a poor facility. West of the underpass Stewart Ave is wide with a wide outside lane which turns into a paved shoulder. It is good for bicycling. From here, Stettin Drive is a good escape route with low traffic volume even though it does not have paved shoulders. (Note: The City of Wausau will have several major reconstruction projects along Stewart Avenue from 24th Ave. to 48th Ave. in the next few years. There is an opportunity to influence the design of these facilities to better accommodate pedestrian and bicycle travel.)
- SW - South of STH 29/West of USH 51
 - CTH NN (east/west): Segment is good with a paved shoulder east of Grouse Lane. West of Grouse Lane high speed and traffic volume with no paved shoulder makes for poor biking conditions.
 - CTH N (east/west): There is a shared-use trail from CTH KK/Bittersweet Road to CTH R/State Park Rd. Wide striped shoulders are provided from CTH KK/Bittersweet Rd. to Lily Ln. West of where the trail and paved shoulders both end, cycling conditions are poor. There is a bridge along this segment that is good with 4-foot paved shoulders.
 - CTH R (north/south): This route is good for bicycling south of Sherman St. Wide outside travel lanes (not striped) exist on both sides of CTH R from Jonquiel Ln. to CTH NN and from the Rib River bridge to Sherman Street. There is enough space on these travel lanes for striping paved shoulder and possibly bike lanes along the entire stretch of CTH R from CTH N to Sherman Street. CTH R/28th Ave. is an important local north-south route, west of USH 51, which connects Rib Mountain with the far west side of Wausau.
 - CTH KK (north/south): The segment from Burma Road north to CTH N contains wide paved shoulders and is good for cycling. South of Burma Road the lack of paved shoulders and high posted speeds make for poor cycling conditions.
 - CTH B (north/south): As this segment exits Mosinee to the northwest there are good conditions for cycling. In the urbanized area there are wide travel lanes with very little use of on-street parking, a paved shoulder exists as it exits the city limits. The bridges on STH 153 have 3-foot paved shoulders.
 - Old HWY 51 (north/south): The segment between I-39/Bus 51 interchange and STH 153 is adequate for cycling, but should be improved as it provides an important

- north-south bicycle route. It contains 2.5-foot paved shoulders but there is high traffic volume including big trucks at high speeds (posted 55).
- NE - North of STH 29/East of USH 51
 - CTH W (north/south): Segment from CTH WW south to Evergreen Road has moderate conditions for cycling; a paved shoulder exists in areas. South of Evergreen Road to STH 52 conditions improve to good with paved shoulders and reduced traffic speeds.
 - CTH WW: Segment of roadway through the Village of Brokaw is good with wide travel lanes, little use of on-street parking and low traffic speed. In 2008, Marathon County reconstructed the segment of CTH WW from CTH W to the railroad tracks north of East St. Reconstruction included wide paved shoulders.
 - STH 52 (east/west): Segment between CTH W and CTH X is moderate with on-street parking widths in the urban area. Conditions improve east of CTH X with wide shoulders in the rural area.
 - CTH X: (major north/south; from CTH JJ to STH 52): There are no shoulders and high traffic volume. This route provides the straightest route in a north/south direction east of Business 51. Current bicycling conditions are poor. There is one bridge which crosses the Eau Claire River that is structurally deficient according to WisDOT. The bridge is not compatible for cycling.
 - Ross Ave / Kersten Road (east/west): these provide a good “urban escape route” with low speed limits and traffic volumes. The roadway is wide and conditions for cycling are good.
 - Business 51 / Grand Ave (major north/south): This roadway is problematic for cyclists. Though pedestrian facilities exist, bicycle facilities are severely lacking on this primary north/south corridor. The Bridge is adequate for bicycle travel but conditions on both sides limit its use. Bicycles are required to use the sidewalk between Schofield city limits and Forest Street. Outside travel lanes in the roadway are only 12-feet wide (11 feet wide in the City of Wausau). There is a lot of traffic along this route and it is the primary north-south route between Schofield/Rothschild/Weston and Wausau.
 - CTH Z (east/west; from the urbanized area east to CTH X): Includes Franklin Street which is a direct route to the east from the urbanized area. The road is good for bicycling as it contains 5-foot shoulders.
 - CTH N (east/west; from urbanized area east to CTH X): This road is bad for cycling with narrow 1-foot paved shoulder and high speeds.
 - CTH J (north/south; from STH 52 to STH 29): This road exists primarily outside the urbanized area and bisects the Mountain Bay Trail in unincorporated Callon. Cycling conditions are poor.
 - CTH JJ (east/west; from USH 51 to CTH J): This road is bad for cycling with a 4-lane road and high speeds and traffic volumes.
 - S 12th St / Northwestern Ave (east/west): This is a good road for cycling – there are paved shoulders.
 - SE - South of STH 29/East of USH 51
 - CTH X (north/south): There is a shared-use trail along the southerly ROW on Weston Avenue from Birch Street to CTH X. Where these facilities exist north of Pine Road cycling is good, otherwise conditions are poor with no shoulder and high traffic speeds and volume. There are no on-street bicycling accommodations along the four-lane divided segment of CTH X in Weston, which was constructed recently. The four 12-foot travel lanes and a large center median were constructed with no extra space along the outside travel lane for on-street cycling.
 - CTH J (north/south): Segment located in non-urbanized area and although there is an STH 29 underpass cycling conditions are poor.

- STH 153 (east/west): Located between USH 51 and CTH J, this is a high speed corridor but has a wide outside travel lane. Conditions are moderate for cyclists all the way to Old HWY 51. There is an existing I-39 underpass.
- CTH XX (east/west; from CTH X to intersection of STH 51): Conditions are good for cycling with a wide outside lane to the north and 3-foot shoulders as the roadway runs to the east.
- S. Grand Ave (south of STH 29): Bad conditions for cycling exist due to heavy traffic and varying shoulder conditions.
- Weston Ave (east/west): West of Anderson Street this is a good road for cycling with low traffic volumes and speeds with a wide travel lane and little use of on-street parking. From Anderson to Birch this roadway is bad for cycling with no shoulder.
- Central - City of Wausau
 - 17th Avenue (north/south; from McCleary Bridge to W. Bridge St.): South 17th Ave. from Stewart Ave. to Sherman Street has no space along outside travel lanes for bicyclists. The segment from Sherman St. to McCleary Bridge has additional space; however, no shoulders or bicycle lanes are striped. Between Stewart and W. Bridge St. there is a long hill and curves. No bicycle accommodations are provided along this segment. 17th Ave serves as an important north-south route for bicyclists.
 - Sherman Street (east/west): This street provides wide outside travel lanes and paved shoulders under I-39. Sherman St. from 28th Ave. to 24th Ave. is scheduled to be reconstructed in 2008 to a four-lane facility as part of the 51/29 project. The City plans to reconstruct Sherman St. from 24th Ave. to 17th Ave. to a four-lane facility in 2009. Sherman St. is a key east-west route crossing under USH 51, so accommodations for pedestrian and bicyclists should be made.
 - Bridge Street (east/west): Conditions from east to west include the bridge and its approaches which are bad for cycling; however from 3rd Avenue to USH 51 conditions are moderate for biking with wide outside travel lanes and no on-street parking. The USH51 overpass is adequate for bikes with a wide outside travel lane.
 - 3rd Avenue (south): This one-way street running south has three lanes with limited on-street parking which makes for moderate cycling conditions.
 - 1st Avenue (north): This one-way street running north has varying lane conditions and limited on-street parking which makes for moderate cycling conditions.
 - 5th Street (south): This one-way street running south has three lanes with limited on-street parking which makes for moderate cycling conditions.
 - 6th Street (north): This one-way street running north has varying lane conditions and limited on-street parking which makes for moderate cycling conditions.
 - Thomas Street (east/west): Conditions for cycling are good along this street and the bridge, while only striped for two lanes, offers wide lanes with room for cyclists.
 - River Drive (north/south): This short segment provides a good linkage between Thomas Street and W. Washington Street. It has a wide travel lane and little used on-street parking.

4.3.2 Walking Conditions

Walking as Transportation

Walking is often overlooked and undervalued as a transportation mode. Yet, in the Wausau planning area, 2.3 percent of commuters reported regularly walking to work. Pedestrian commuting percentages are even higher within the City of Wausau's older neighborhoods near downtown. These percentages do not include other pedestrian activity, such as walking trips to school, to shopping, or for recreation. Many of these pedestrians are children and seniors who require special consideration regarding facility design. Pedestrians include persons using wheelchairs or mobility devices.

Everyone is a pedestrian at some point in his or her trip, whether it is walking to the parking lot, a bus stop, or to work from home. The most common pedestrian facilities people think of are sidewalks. Other facilities include pedestrian ramps, pedestrian islands (i.e. road medians), crosswalks and pedestrian signals. Where sidewalks are not available, roads and/or road shoulders provide the public right-of-way for pedestrians. However, what constitutes a “pedestrian-friendly” or “walkable” neighborhood or business district is much more than merely having the aforementioned facilities in place.

A walkable or pedestrian-friendly community is one that provides a comfortable and safe environment for pedestrians. Having sidewalks certainly is one part of the equation; however, other amenities such as street trees, pedestrian-scale lighting, street furniture and boulevard space separating vehicle traffic lanes from sidewalks are also important. In the Wausau area snow is another important consideration.

The quick and effective removal of snow on sidewalk and shared-use trail facilities has a major effect on the usability of those facilities. All sidewalks are required to be cleared within a certain timeframe from the snowfall (varies by community, many are 24 hours), however the maintenance of many of these facilities falls on the homeowner and work schedules, vacations, and the physical abilities of the resident can make for inconsistent snow removal. Shared-use facilities are maintained in selected areas as budgets dictate.

Another important element of walkable communities is having something to walk to. Destinations, such as commercial areas, parks, churches, and schools, need to be within walking distance and accessible if walking is going to be a serious transportation alternative. The scale and interest of buildings can add or detract from the pedestrian experience. Studies have also found that pedestrians like company and seeing other pedestrians increases one’s comfort level and sense of safety and security.

Requirements for pedestrian facilities within the Wausau planning area vary by municipality. Municipalities within the urbanized area generally do not require sidewalks in residential areas. The Village of Rothschild is an exception, requiring sidewalks within new residential developments. The Village of Weston requires sidewalks in new developments and pedestrian crosswalks, not less than 10-feet wide, may be required through the center of blocks more than 900 feet long where deemed essential to provide circulation or access to schools, playgrounds, or other community facilities. The City of Wausau addresses the issue of sidewalks with developers on a case by case basis. However, interest in creating walkable neighborhoods and downtown areas has been increasing. The Town of Rib Mountain passed a resolution requiring developers pay for any planned bicycle or pedestrian facilities as delineated on the Town of Rib Mountain Bicycle and Pedestrian Facilities Map.

Neighborhoods constructed prior to World War II generally included sidewalks. Post war era neighborhoods tended to be built without sidewalks. Retrofitting areas with sidewalks is often controversial given cost and funding issues (i.e. who should pay).

Sidewalk Inventory

The City of Wausau and the Village of Weston maintain relatively comprehensive GIS sidewalk inventories, which indicate where sidewalks exist and whether sidewalks are on one or both sides of the street. See Appendix B for maps.

Wausau's sidewalk inventory illustrates that the City generally has sidewalks on both sides of the street throughout most of the community's older (i.e. pre-World War II era) neighborhoods. The streets in these areas also tend to adhere to a strict grid pattern system, which provides pedestrians more direct routes between destinations in contrast with curvilinear streets and cul-de-sacs.

The City of Wausau also identifies proposed sidewalks within the inventory. These proposed sidewalks are focused primarily along key arterial roadways that serve destinations in the outlying areas of the City, such as the high school, the hospital, and the West Wausau Industrial Park.

The Village of Weston has sidewalks on one or both sides of several key streets including sections of: Schofield Avenue, Jelinek Avenue, Alderson Street and Camp Phillips Road. Roughly half of the streets that make up the Metro Ride Route K, serving Weston, have sidewalks. However, sidewalks are lacking along some key roads, such as Ross Avenue and much of Weston Avenue. Most residential areas do not have sidewalks.

Safe Routes to School

Safe Routes To School planning is necessitated by a number of factors. Chief among them are health and safety concerns for children. The National Highway Traffic Safety Administration (NHTSA) determined in 1998 that motor vehicle injury is the leading cause of death for children aged two to eighteen. Recent studies also report the incidence of childhood asthma continue to escalate due in part to exacerbated air pollutants caused by a number of sources including automobile emissions. Childhood obesity rates are also increasing and today one in four kids are over weight and at higher risk for chronic conditions such as diabetes.

In the Wausau School District, results from research conducted during the 2002-2003 Wausau School Project (School Children Have Early Onset of Learning Risk Factors for Cardiovascular Disease and Diabetes Mellitus) indicate that 16-18% of students were overweight or obese and 28-37% were at serious risk for becoming overweight. Additionally, students who were overweight or obese had a significantly higher rate of other cardiovascular risks such as abnormal cholesterol levels, sedentary activity habits and poor dietary choices.

In response to these and other deleterious health conditions and statistics, the Safe Routes To School model has been developed to increase the number of kids walking and biking to school safely. Doing so also provides noteworthy ancillary benefits. For one, increasing the number of children who walk or ride bikes to school lessens the amount of traffic congestion placed on local roadways. A recent NHTSA statistic reports between 20-25 percent of morning rush-hour traffic may be parents driving kids to school. At the same time, school districts are facing decreased budgets and rising gas prices. In fact, the National Center for Education Statistics reports school bus transportation is frequently the second largest budget item for school districts after salaries. In light of these and other conditions, Safe Routes To School planning makes good sense in any community working to increase the livability and sustainability of their neighborhoods.

The Safe Routes To School initiative is centered around five core areas, called "The Five E's". They include Engineering, Enforcement, Education, Encouragement, and Evaluation.

- Engineering is a broad concept used to describe the design, implementation, operation, and maintenance of traffic control devices or physical measures. It is one of the

complementary strategies of SRTS, because engineering alone cannot produce safer routes to school.

- Enforcement includes policies that address safety issues such as speeding or illegal turning, but also includes getting community members to work together to promote safe walking, bicycling, and driving.
- Education includes identifying safe routes, teaching students to look both ways at intersections, and how to handle potentially dangerous situations. This strategy is closely tied to Encouragement strategies.
- Encouragement combines the results of the other “E’s” to improve knowledge, facilities and enforcement to encourage more students to walk or ride safely to school. Most importantly, encouragement activities build interest and enthusiasm. Programs may include “Walk to School Days” or “Mileage Clubs and Contests” with awards to motivate students.
- Evaluation involves monitoring outcomes and documenting trends through data collection before and after SRTS activities. Surveys and audits can help provide quantitative support for improvements brought about through SRTS programming.

The Wisconsin Department of Transportation administers a federal grant program (SAFETEA-LU) to qualified communities that demonstrate a need for funding and have developed bicycle and pedestrian safety improvement plans. Current planning or infrastructure improvements awarded for completion in 2007 include two MPO communities, the Town of Rib Mountain and Village of Weston.

Town of Rib Mountain (\$132,000 infrastructure):

- Continuation of multi-use path from its current location to Eagle Ave.
- Construction of a sidewalk from Eagle Ave. to Rib Mountain Dr.
- Crosswalk enhancement at CTH R/Robin Lane and relocation of crosswalk button
- Project will be completed in 2009

Village of Weston (\$224,000 infrastructure; \$10,400 non-infrastructure):

- Installation of sidewalk on Machmueller St. to extend sidewalk to DC Everest School
- Provide sidewalk on school site to separate pedestrians from bus/auto drop-off area
- Add a multi-use trail at rear of school
- Implement pedestrian safety lessons into PE curriculum
- Implement a variety of bicycle and pedestrian encouragement activities
- Project completed in 2008

4.3.3 Gaps Analysis

The MPO’s Bike/Ped Committee was asked on August 23, 2007 to identify locations where there are gaps in the bicycle and pedestrian system. The gaps included any type of biking or walking facility, lack of facility, maintenance issues, or areas where bike paths and major routes should connect to other routes, residential or employment areas. Members placed numbered sticky-dots on maps that corresponded with a written description of the “gap” identified. The results were compiled and compared to the Bike Federation of Wisconsin’s bicycle audit. Results are located Appendix B.

Noteworthy overlap between the Bike/Ped Committee and BFW analysis included the following locations or segments:

- The bridge on W. Bridge Street is inadequate.
- N. River Drive is a good link to Wisconsin River, parks, and bridges.
- Grand Avenue is a difficult segment and an alternate bicycle route needs to be identified.
- Camp Phillips Road (CTH X) could be a major north/south route but current conditions preclude this segment as an alternate corridor.
- Rib Mountain Drive/South Mountain Rd (CTH N) are important connections between Rib Mountain State Park and Nine Mile Recreation Area. Retail areas are hard to reach without an automobile. Trails exist in limited locations.
- Sherman Street provides moderate bicycling conditions east of 17th Street but conditions for travel through the urbanized area (e.g. 17th Street intersection) is difficult.
- S. 28th Avenue (CTH R) is good for bicycling south of Sherman St. but bad to the north.
- N. Mountain Road (CTH NN) provides good conditions east of Grouse Lane but conditions deteriorate in the rural areas between C. Wausau and Marathon City.
- Stewart Avenue is difficult to navigate near Marathon County Park and bicycle or pedestrian connections to 17th Street are nonexistent. West of the USH 51 underpass there is a wide outside lane which turns into a paved shoulder.

A general comment from the Bike/Ped Committee about these gaps includes the usability of these areas on a year-round basis. The quick and effective removal of snow can be an issue when not done with respect to crosswalk locations or curb lanes. In some cases, snow is stored near crosswalks or on planting strips after removal from a road surface and not cleared for effective bike or pedestrian travel.

4.4 Bicycle and Pedestrian Statutes and Ordinances

In the 1960's, the national Institute of Transportation Engineers produced a publication titled -- *Recommended Practice for Subdivision Streets*. This publication contained a set of recommended standards for residential street design. These included: a 60 foot ROW; 32-34 feet of pavement; a 6-7 foot planting strip; and a 5 foot sidewalk on both sides of the street. Typical front yard setbacks were set at 40-60 feet. These standards have been widely used as the basis for many of today's subdivision regulations.

Many modern subdivisions continue to build the right-of-way for motorized transportation at the expense of walking or biking. Wide, curvilinear streets are thought to be appealing by many developers engaged in designing new housing projects and sidewalks are included as an afterthought, if at all. Unfortunately, it isn't until after these neighborhoods are built that residents begin to question street width and speeding that comes wide lanes, and the lack of pedestrian facilities such as sidewalks.

In response to traffic congestion and neighborhood concerns, many planners and engineers are looking to the past for answers. A key component of neo-traditional neighborhoods is creating neighborhoods that people enjoy walking around in. The minimum requirement is to provide sidewalks and safe street crossings. However, providing shade trees, planter strips, landscaping, benches, and other amenities can make an enormous qualitative difference in the pedestrian environment. Similarly, bicycle facilities can greatly enhance the usability of a transportation network. The best strategy for accommodating bicycle trips is to provide adequate bicycle lanes and to educate the driving public on the need to share the road with bicyclists.

Wisconsin Statutes

The State of Wisconsin does not require municipalities to provide sidewalk facilities, but does require clearing of sidewalks after snow conditions. Statutes are written to provide guidance

for the use and enforcement of rules governing pedestrian activities and facilities. Likewise, rules for bicycles regulate the proper use of facilities including roadways. Local communities are provided a great deal of discretion in the placement and usage of bicycle and pedestrian facilities under state law.

Marathon County Subdivision Code

The Marathon County Land Division Ordinance (Chapter 18) does not include regulations for the development of sidewalk facilities or multi-use paths. This is not uncommon for county ordinances since they control for development in unincorporated areas that often do not supply the density required to necessitate sidewalks. Still, if the county develops standards for a “traditional neighborhood development” or “conservation development” that may contain higher densities, standards for pedestrian and bicycle transportation should be included.

Ordinances in the Unincorporated Areas

All towns within the Wausau MPO are independently zoned and all have locally adopted land division ordinances. These ordinances should include provisions for sidewalks within the “Design Standards” section that discusses design and locations of transportation facilities. In many cases, insufficient density will preclude a sidewalk requirement, but should be included for discussion, especially in light of ADA requirements. Roadways should provide for a paved shoulder or separate striped bicycle lane whenever possible. Development of these facilities will be far cheaper if developed as part of the project development than if retrofitted later, and may be charged to the developer for construction, depending on local ordinance language.

The Rib Mountain Town Board passed a resolution in 2008 that places some of the path development burden on a developer. The resolution says that any development located near or adjacent to a planned bike/ped path that is in a comprehensive or bike/ped plan has to be installed by a developer.

Ordinances in Incorporated Areas

Incorporated communities within the urbanized area generally do not require sidewalks in residential areas. The villages of Rothschild and Weston are the exception. The City of Wausau addresses the issue of sidewalks with developers on a case by case basis. However, interest in creating walkable neighborhoods and increasing pedestrian friendliness in downtown areas has been increasing.

Rules on safe use of facilities are also determined on a community by community basis. For example, on a major north/south arterial in Schofield, Grand Avenue, bicyclists are required to use the sidewalk due to high traffic volumes and narrow lane widths on the roadway.

4.5 Existing Plans

Wausau Metropolitan Area Long-Range Transportation Plan 2035, “Wausau Area Crossroads” – The LRTP addresses transportation in terms of the movement of people and goods. It analyzes specific transportation modes (e.g. roads, public transportation, bicycles/pedestrians, rail, and aviation) it stresses the interrelationships between modes and, when possible, encourages the integration of the various transportation components into a system that efficiently and cost-effectively meets the mobility needs of the area’s citizens, businesses, industries, institutions, and the traveling public. Specific information and plans for bicycle and pedestrian transportation are located in Chapter 4 “Transportation System”, and Chapter 9 “Recommendations”.

Rivers Edge Master Plan – The *Rivers Edge Master Plan* was prepared by the Rivers Edge Commission and adopted by the City of Wausau in 1995. The plan identifies short and long term strategies for improving public access to the Wisconsin River, which runs through the heart of Wausau. The plan addresses many management and use issues related to the river with a focus on continuing development of a river edge parkway along the river that links parks along the river by improving pedestrian and bicycle transportation facilities and enhancing recreational opportunities. The plan envisions a web of walkways along the corridor that reaches from City limit to City limit. While focusing on the recreational aspects of the trails, the plan’s proposed trail system also has the potential to serve as a viable transportation corridor for pedestrians and bicyclists.

Wisconsin Pedestrian Policy Plan 2020 –WisDOT published the *Wisconsin Pedestrian Policy Plan 2020* in March 2002. The plan outlines statewide and local measures to increase walking and to promote pedestrian safety. The plan establishes state goals and objectives and identifies action steps for WisDOT to take toward achieving these goals and objectives. The plan does provide some pedestrian planning guidance for MPOs and recommends that MPOs set specific pedestrian objectives, develop sidewalk inventories, review existing ordinances regarding the installation and retrofitting of sidewalks. Other planning elements to consider included reviewing cost assessment practices for financing pedestrian projects, analyzing pedestrian crashes, reviewing snow removal issues relating to pedestrian travel, and developing pedestrian improvement recommendations.

Bicycle & Pedestrian Plan for the Non-Urbanized Area of Marathon County, Wisconsin, (1996) –The *Bicycle & Pedestrian Plan for the Non-Urbanized Area of Marathon County, Wisconsin, (1996)* suggested bike routes along a network of County roads throughout Marathon County. The plan focused solely on rural areas and suggested routes that were based on road and shoulder widths, pavement conditions, traffic volumes and connectivity. With the exception of the Mountain Bay Trail, none of the other suggested routes have been officially designated or signed as bike routes.

Wisconsin Bicycle Transportation Plan 2020 –WisDOT acknowledges the importance of bicycling as a legitimate transportation mode and clarifies its role in encouraging bicycling in the *Wisconsin Bicycle Transportation Plan 2020*. This plan presents a blueprint for improving bicycling conditions and encouraging bicycling in the state and calls for the implementation of metropolitan area bicycle plans prepared by Metropolitan Planning Organizations.

The Mountain Bay Trail is recognized as an important intercity facility. As a general policy statement, the 2020 plan recommends that state, county and communities work together to connect multi-use trails and trailheads to communities. Specifically, it is the recommendation of the plan to strongly consider safe and convenient bicycle access to trailheads located within a reasonable distance to communities (generally less than 5 miles). Except in very unusual situations, the improvement should be paved shoulders.

Wisconsin Bicycle Planning Guidance & Wisconsin Bicycle Facility Design Handbook – WisDOT has published two recent documents relating to bicycle planning and bicycle facility design. *Wisconsin Bicycle Planning Guidance* was published in June 2003 and provides guidelines for metropolitan planning organizations and communities in planning bicycle facilities. The document is available on the Internet (<http://www.dot.wisconsin.gov/projects/state/docs/bikeguidance.pdf>). The *Wisconsin Bicycle Facility Design Handbook* was published in January 2004 and provides a wealth of

detailed information for designing a range of bike facilities, from on-road bike routes to dedicated trails.

Rib Mountain Bicycle/Pedestrian Facilities Map (2007) – The Rib Mountain Town Board adopted a Bicycle/Pedestrian Facilities Map. The Map contains the routes of present and future multiuse paths and facilities. This will be used to guide future maintenance, construction, and improvements in Rib Mountain. Implementation of this map includes a resolution adopted by the Town Board requiring any new development located near or adjacent to a planned bicycle or pedestrian facility outlined on the map be installed by the developer.

5

GOALS and OBJECTIVES

Goals are statements that describe a desired condition or outcome. Objectives state a specific course of action to achieve a goal or address an issue. The goals and objectives listed in this document come from various sources and have been pared down by SAA to develop meaningful direction for the *Wausau Area MPO Bicycle and Pedestrian Plan*. These goals and objectives eliminate duplication from the prior plans and activities that were analyzed. Documents reviewed in the generation of these goals and objectives include:

- *River Edge Master Plan* (June 1995)
- *Bicycle & Pedestrian Plan for the Non-Urbanized Area of Marathon County, Wisconsin* (September 1996)
- *Wausau Metropolitan Area Long Range Transportation Plan – 2035* (July 2006)
- *Wausau Area MPO Bicycle and Pedestrian Committee SWOT Exercise* (March 2007)

5.1 Goals and Objectives (numerical listing for reference purposes only, ordering does not suggest order of importance)

1. Develop a well-connected trail system that links a variety of facilities together into a cohesive transportation system.
 - a. To link the River Edge parkway to the Mountain Bay Trail in eastern Marathon County and to other city and county bike routes where appropriate.
 - b. To promote bicycle and pedestrian travel modes by linking pedestrians and bicycle systems throughout the region.
 - c. To build on existing shared-use facilities development (Mountain Bay Trail, River Edge Parkway) to link additional destinations and resources (Rib Mountain State Park, Nine Mile Recreation Area).
 - d. To capitalize on the availability of easements and access corridors to enhance the existing linear trail network throughout and beyond Marathon County.
2. Increase the utilization, availability, and demand for funding to improve bicycle and pedestrian facilities.
 - a. To target resources for bicycle and pedestrian improvements to areas of greatest transportation need.
 - b. To increase education that encourages bicycle and pedestrian commuting and creates advocates.
 - c. To identify and pursue available grants.
3. Design roads to be compatible with surrounding uses and be pedestrian, bicycle and transit friendly.
 - a. To integrate the existing trail system into a bicycle and pedestrian transportation network which supports linkages to mass transit facilities and automobile modes of travel.
 - b. To identify priority origins and destinations and increase access to these locations by a variety of travel modes.
 - c. To better identify bicycle facilities on roadways sufficient for a dedicated bicycle lane including use of appropriate striping or signage.
4. Reduce the number and severity of vehicular crashes with particular emphasis on reducing vehicle-bicycle and vehicle-pedestrian conflicts and crashes.

- a. To increase reporting and tracking of crashes throughout the Wausau metro area.
 - b. To reduce speeding in high-traffic areas.
 - c. To increase the media attention given to bicycle, pedestrian, and automobile responsibilities.
 - d. To develop a safety arm of the Bike/Ped Committee to investigate crashes and crash statistics.
5. Provide adequate education, encouragement, evaluation, and enforcement programs to supplement facilities improvements.
 - a. To increase educational opportunities to educate pedestrians, bicyclists, and motorists about rights and responsibilities on roadways and shared-use facilities.
 - b. To promote incentives for walking and/or biking to work.
 - c. To increase the safety of transportation facilities by enforcing speed limits, rights of way, etc.
 - d. To encourage healthy lifestyles and reduce obesity rates.
6. Enhance intergovernmental cooperation and coordination for improving multimodal transportation.
 - a. To work jointly with multiple jurisdictions in planning and funding linear trail and dedicated on-street transportation facilities.
 - b. To increase political buy-in by engaging elected officials and residents in development and utilization of bicycle and pedestrian facilities.
 - c. To work cooperatively in developing grant-writing workshops, maintenance seminars, and training sessions.
7. Develop shared-use transportation standards to include in the development review process for local communities reviewing new developments.
 - a. To ensure “complete streets” are built when transportation facilities are originally installed to prevent costly retrofitting.
 - b. To promote connectivity to destinations and promote alternative methods of transportation within neighborhoods.
8. Enhance the livability of the Wausau area by improving quality-of-life issues related to transportation throughout the region by a variety of users.
 - a. To showcase the natural and scenic beauty of the Wausau area through appropriate placement and development of multimodal transportation resources.
 - b. To build on the current multimodal transportation system to increase the desirability of the Wausau area.
 - c. To promote economic vitality by utilizing and preserving access to natural features within the region.
 - d. To increase the amount of facilities along routes and trails (including benches, rest areas, trailheads).
9. Increase the numbers of commuters who live within the Wausau Area MPO and who bicycle to work and/or school.
 - a. To require secure bicycle parking at all new employment centers with 30 or more employees and encourage adequate bicycle parking outside existing structures.

- b. To work with the Bicycle Federation of Wisconsin, local certified instructors, or other groups increase bicycle education for bicycle commuters.
 - c. To work with neighborhood organizations and business improvement districts to match potential bicycle commuters together to increase ridership, camaraderie, and encouragement.
 - d. To encourage provision of appropriate worksite/school accommodations for bicycle and pedestrian commuters.
10. Increase the number of commuters who walk to work and/or schools.
- a. To improve walking conditions in area business districts and school neighborhoods by restriping crosswalks, installing crosswalk signals, and slowing traffic.
 - b. To create a more enticing walking environment by maintaining pedestrian facilities and safe distances (boulevards or barriers) between these facilities and automobile traffic.
 - c. To increase encouragement activities in workplaces and schools through contests, special recognition, or time off.

5.2 Goals and Objectives (Logic Model)

A logic model is a graphic representation of a program showing the intended relationships between investments and results. The following application of the logic model format illustrates the relationship between the activities participants engage in, and the short, medium, and long-term goals they are trying to achieve through these actions. This “working draft logic model” was prepared by the Bike/Ped Committee for discussion purposes.

**Working Draft Logic Model for Pedestrian /Bike Planning
October 10, 2008**

Participants

Activities

Short term goals

Medium term goals

Long term goals

Elected officials
DOT
Foundations
Media
Bike enthusiasts
Runners
Walkers
PTO/PTA's
Neighborhood organizations
School officials
Health officials
Business owners
Ped/Bike Committee
UW-Marathon County
NTC
Bike Federation
The public

Promote bicycle and pedestrian travel modes

Identify and pursue available grants

Identify bicycle facilities on roadways including use of striping or signage

Increase educational opportunities to educate about rights and responsibilities on roadways

Work jointly with multiple jurisdictions in planning and funding linear trail and dedicated on-street transportation facilities

Encourage provision of appropriate worksite accommodations for bicycle and pedestrian commuters

Promote incentives for walking and biking to work and school

Develop grant writing workshops, maintenance seminars, and trainings

Improve walking conditions in area business districts

Educate and encourage Ped/Bike commuting

To develop a safety arm of the Bike/Ped Committee to review crashes and crash statistics

Supplement facilities improvements with adequate education, encouragement, evaluation, and enforcement programs

Increase the safety of transportation facilities by enforcing speed limits, rights of way

Identify priority origins and destinations and increase access to these locations by a variety of travel modes

Increase the media attention given to bicycle, pedestrian, and automobile responsibilities.

Increase the amount of facilities along routes and trails (including benches, rest areas, trailheads)

Encourage adequate bike parking outside businesses/employers and schools

Promote connectivity to destinations and promote alternative methods of transportation within neighborhoods

Increase political buy-in by engaging elected officials and residents in development and utilization of bicycle and pedestrian facilities

Develop shared-use transportation standards to include in the development review process for local communities reviewing new developments

To target resources for bicycle and pedestrian improvements to areas of greatest need

Increase the number of commuters who walk or bicycle to work and/or school

Increase the utilization, availability, and demand for funding to improve bicycle and pedestrian facilities

Enhance inter-governmental cooperation and coordination for improving multimodal transportation

Promote economic vitality of the natural features within the region.

Utilize available easements and access corridors to enhance the existing linear trail network throughout and beyond Marathon County

Integrate the existing trail system into a bicycle and pedestrian transportation network which supports linkages to mass transit facilities and automobile modes of travel

Increase reporting and tracking of crashes throughout the Wausau metro area

Develop a well-connected system that links a variety of facilities together into a cohesive transportation system that is pedestrian, bicycle and transit friendly

Develop each new street as a "complete street"

Reduce the number and severity of vehicle-bicycle and vehicle-pedestrian conflicts and crashes

Enhance quality-of-life related to transportation throughout the region

Encourage physical activity and reduce obesity

Develop and maintain a pedestrian and bike friendly transportation system that is safe, increases physical activity and recreational options, and is an economic asset to the community.

6

BEST FACILITY PRACTICES

6.1 Preferred Transportation, Origins & Destinations

Preferred bicycle and pedestrian routes are largely determined by the geography and planned growth patterns of Marathon County. While the Wausau area consists primarily of a grid street system, the grid is significantly altered by the area's waterways and lakes. As a result, the location and condition of these bridges largely shape bicycle and pedestrian travel. Additionally, the nature of development within Marathon County creates disconnected pockets of residential and commercial development, which affect decisions to walk, bike, or drive. In some areas, past planning decisions preclude interconnectivity of the transportation system. Marathon County's prevailing freeway system also affects routes available to bicyclists and pedestrians.

In 2000, 81% of workers sixteen years or older in Marathon County drove to work alone. Only 1% used transit. Approximately 2.6% of Marathon County workers walked to work and only 0.3% biked to work. Forty percent of these trips take less than 15 minutes, and could potentially be replaced with bicycle or walking trips, if facilities improved.

While specific statistics for Marathon County are lacking, if the area mirrors national trends, up to 25% of morning traffic can be attributed to private vehicles dropping off students at school. Coupled with a dramatic decline in children walking and biking to school in the last 40 years (50% to 15%) and increased obesity and Type 2 Diabetes among children, more attention must be focused on facilitating walking and bicycling to school.



National Center for Safe Routes to School: Morning traffic surrounds school.

The Stakeholder Interviews, held in January 2008, revealed a number of preferred destinations for bicyclists and pedestrians. Among these, were public schools and higher learning institutions such as Northcentral Technical College and UW-Marathon County. Many respondents also wanted easier ways to get downtown, especially to the library. Recreational areas were also mentioned as a primary destination including the Mountain Bay Trail, Nine Mile Recreation Area, and Rib Mountain State Park.

6.2 Alternatives for Improved Bicycle and Pedestrian Facilities

Bicycle and pedestrian facilities greatly enhance the usability of the entire transportation network. Towards this end, public and MPO input, existing plans, and an assessment of existing facilities generated the following bicycle and pedestrian facility alternatives. To enable safe and efficient movement throughout the Wausau area, on-street, off-street and non-infrastructure improvements are addressed below.

6.2.1 Bicycle Facilities

The best strategy for accommodating bicycle trips is to provide adequate on-street bicycle lanes and to educate the driving public on the need to share the road with bicyclists. Some corridors within Marathon County are presently suitable for bicycling and require little or no

improvement (e.g. improved portions of CTH R, McCleary Bridge), while other corridors pose significant hazards to would-be bicyclists and pedestrians (e.g. Grand Avenue). There are four primary facility alternatives to provide safe and attractive infrastructure for bicyclists on urban streets: bike lanes (formal and informal), wide curb lanes, paved shoulders, and shared-use roadways. In non-urbanized areas, these same techniques can be used save for bike lanes which are generally less appropriate than striped curb lanes. Signs, pavement markings, off-road bicycle paths, and non-infrastructure initiatives also facilitate safe bicycle travel.

Sidebar Topic: Complete Streets
 Complete Streets are designed and operated to enable safe access for all users. Pedestrians, bicyclists, motorists and bus riders of all ages and abilities are able to safely move along and across a complete street.

SAA: This “Complete Street” section enables safe access for all users. Pedestrians, bicyclists, motorists and bus riders are all accommodated.



Bike Lanes

Bike lanes are the preferred treatment for streets carrying high traffic volumes in cities and villages. Striped bike lanes are a minimum of 4 feet wide excluding the gutter pan, (5 foot wide is preferred), and are located on both sides of the street. If parking is permitted, the bike lane is placed between the parking lane and the travel lane and is a minimum width of 5 feet. If the parking lane and the bike lane share a lane, a minimum 11-foot width is required. This does not include the gutter pan. The bike lane should never be placed on the curb side of a parking lane. Bike lane striping helps to communicate to bicyclists and motorists how the road is intended to be used.



Project for Public Space: Bike lane striping articulates lane.



SAA: Wide curb lanes accommodate bicyclists and vehicles.

Wide Curb Lanes

A right hand curb lane that 14 feet or wider is considered a wide curb lane. Traffic lanes that are this wide can better accommodate both bicycles and motor vehicles in the same lane. In many cases where there is a wide curb lane, motorists will not need to change lanes to pass a bicyclist. In addition, a wider curb lane provides more negotiation room for motorists entering the travel lane from driveways or in areas with limited site distance. In general, 14 to 15 feet of usable lane width is the recommended width for shared use in a wide curb lane. Usable lane width does not include the gutter pan. It is not advisable to install lanes much wider than 15 feet for continuous distances. Travel lanes 15-feet or wider for long distances will encourage drivers to operate two vehicles in one lane and increase vehicle travel speed. In these situations, consideration should be given to striping bike lanes or shoulders.

Paved Shoulders

Paved shoulders are a popular method to accommodate bicycle transportation, especially on rural highways. The proper width of the paved shoulders varies depending on a number of factors including the type of highway, the amount of daily automobile traffic, sight lines and number of curves, and the amount of expected bicycle traffic. On rural two-lane state trunk highways the DOT recommends employing a roadway evaluation method that would safely allow one bicycle and one motor vehicle traveling in the same direction and one motor vehicle in the oncoming travel lane to occupy the same lateral road section at the same time. When paved shoulder bikeways are located on county trunk highways or town roads, the paved width, if any, should be determined by the local government. However, local discussions indicate paved shoulders at least 4 feet wide are preferable to bicyclists in Marathon County.

Shared-Use Roadway

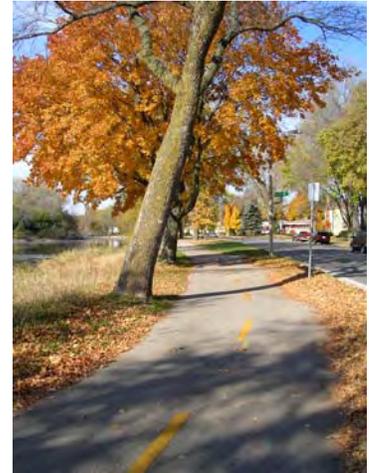
A shared-use roadway is typically a neighborhood street where traffic volumes and traffic speeds are low and bicyclists and motorists can comfortably share the road.

Sidepath

This path is a segregated facility located next to or alongside a roadway. A sidepath is similar to a sidewalk though it is generally wider to facilitate bicycle movement. Sidepaths are not generally recommended in areas with a lot of driveways or road crossings as they can cause conflicts, especially for users traveling in the opposite direction of traffic on the roadway.

Multi-Use Path

This path is located within its own right of way, is usually 10-14 feet wide and is not closely associated with a roadway.



Bicycle Routes

Suitably designed bikeways can be identified formally as "Bike Routes." Bike routes are segments of a system of roads that are designated by a jurisdiction having authority with appropriate directional and informational markers, with or without a specific bicycle route number (AASHTO definition). These routes should indicate a major route that most bicyclists will feel comfortable using. The routes are not intended to link all possible locations, and bicyclists are not required to use these routes. New bicyclists, and bicyclists new to the Wausau area, will find these routes useful for getting to know Marathon County by bicycle.

SAA: Multi-use paths separate users from motor vehicle traffic.

Bicycle Maps

In addition to signing, the County should publish maps of current biking conditions and designated bicycle routes. Maps should be made available at locations such as convenience stores, motels and bed and breakfasts, visitor information centers, and public libraries.

Road Hazard Identification Program

Bicycle Road Hazard Identification Programs increase bicycle safety and enjoyment through the identification and repair of road conditions hazardous to bicyclists. Communities voluntarily implement the program as a benefit to their citizens. The program works by allowing bicyclists, employees involved with roadwork in some capacity, other state/county/local employees (such as police officers) and/or concerned citizens to report road conditions hazardous to bicyclists. The hazards are reported to participating municipalities for inclusion in the local maintenance program. Implementation of the bike hazard identification program does not mean that a municipality is responsible for fixing all hazards immediately. A plan to repair hazards can be developed within a capital improvement budget and/or maintenance budget.

Signs

Signage on local bike routes should take two forms—the wayfinding or directional sign and the traffic regulation sign. Wayfinding/directional signs are used along routes to help bicyclists find the most direct route to their destinations and can also be helpful to out-of-town cyclists looking for a place to eat, a gift shop or a hardware store. Local municipalities

and interested community boosters can work together to develop custom directional signs for their community.

The placement and use of traffic regulation signs is not arbitrary but guided by the Manual on Uniform Traffic Control Devices (MUTCD). In particular, Part 2: Guide Signs and Part 9: Traffic Control for Bicycle Facilities of the MUTCD provide comprehensive guidance for the use



of signs, pavement markings, and traffic signals on both roadways and shared-use paths. The entire MUTCD is available as a pdf file from the US Department of Transportation and Federal Highway Administration website.

SAA: Bike lane signs sanction the presence of cyclists while posted speed limit signs enhance safety.

The "Caution Bikes" sign indicates to drivers that there is a good possibility there may be bikes sharing the road ahead. This sign may also be installed along roads where auto traffic is heavy (over 5,000 cars per day), where the physical conditions of the road create narrow road sections, where sight lines are compromised or where a popular route or multi-use trail crosses a busy street.

Pavement Markings

Pavement markings should be used to designate bicycle lanes and delineate paved shoulders from the travel lane. Pavement markings may give the motorists the feeling of a narrower traffic lane and thereby slow traffic speeds. Because these pavement markings indicate restricted and shared rights-of-way, they must be consistent with all traffic patterns. Refer to the following sources for designing specific pavement marking systems: Manual of Uniform Traffic Control Devices (MUTCD), Wisconsin Bicycle Facility Design Handbook, and Wisconsin DOT Facilities Development Manual (FDM)

Additional Design Considerations

Drainage grates with bars that are parallel to the direction of travel can catch bicycle tires and cause the bicyclist to fall. Utility covers that are not flush with the surrounding pavement can be hazardous to bicyclists as well. Bicycle facilities should avoid drainage grates wherever possible. Types A, H, HM, R, and Z drainage grates are considered bicycle-safe grate by WisDOT.



SAA: Drainage grate snags bicycle tire

Railroad track crossings require similar special consideration. Namely, the bikeway should cross railroad tracks at or near a right angle. This minimizes the potential for a bicyclist's front wheel to become caught by the tracks, causing a loss of steering control. If the crossing angle is less than 45 degrees, consider widening the outside lane, shoulder or bicycle lane to allow the bicyclists to improve the angle of approach without moving into traffic.

Rumble strips, found on rural roads as one approaches a stop sign or along the road's edge to alert errant drivers, are the topic of much discussion among bike planners and highway designers. Rumble strips work well for their intended purpose but impede bicycle travel. In the case of rumble strips used for a stop sign approach, the bicycle must enter the opposing traffic lane to avoid a rumble strip that extends from the center line to the pavement edge. The problem can be avoided by ending the rumble strips at the fog line. When used on the paved shoulder, the strips lessen the amount of usable pavement by a great deal. If continuous, rumble strips restrict the bicyclist's ability to make left-hand turns. To prevent these problems, rumble strips in paved shoulder areas should be avoided, if possible, or installed in a non-continuous pattern.

The development of facilities as outlined above is only one component to enhance and encourage bicycling. Operational procedures such as education, maintenance of facilities, enforcement of vehicle codes, promotional activities and even land use planning play a complementary role.

6.2.2 Potential Pedestrian Facilities

The overriding principle in providing for pedestrians is to create public rights-of-way that work effectively for and benefit all modes of transportation. A transportation environment and system that works for pedestrians will generally work better for bicyclists, disabled persons, automobile drivers, and for all other users, including transit and commercial vehicles.



Project for Public Space: Ladder crosswalk, signage, and pedestrian island facilitate safer street crossings.

As a general rule, sidewalks should be installed on both sides of every street where people live, work, go to school, or walk to accomplish errands or visit neighbors and friends. Sidewalks should be a minimum of five feet wide and wider in high volume pedestrian areas. Curb ramps should be installed at all intersections and mid-block crossing areas. Each municipality should also ensure that it has developed and updated an ADA compliance plan.

However, what constitutes a “pedestrian-friendly” or “walkable” neighborhood or business district is much more than merely having the aforementioned facilities in place. A walkable or pedestrian-friendly community is one that provides a comfortable and safe environment for pedestrians. High quality, navigable sidewalks certainly are one part of the equation; however, other amenities such as street trees, pedestrian-scale lighting, street furniture, and boulevard space separating vehicle traffic lanes from sidewalks are also important. In the Wausau area snow is another important consideration and should be removed from sidewalks within 24 hours.

The safety and comfort of pedestrians can also be enhanced by implementing traffic calming measures. Narrow roadways necessarily decrease automobile speed. Installing pedestrian and auto traffic signs and signals, raised pedestrian crossings, speed bumps/tables and woonerfs also moderate traffic speed. "Woonerf" ("Street for living") is a Dutch term for a common space created to be shared by pedestrians, bicyclists, and low-speed motor vehicles. They are typically narrow streets without curbs and sidewalks, and vehicles are

slowed by placing trees, planters, parking areas, and other obstacles in the street. Motorists become the intruders and must travel at speeds below 10 mph. This makes a street available for public use that is essentially only intended for local residents. A woonerf identification sign is placed at each street entrance. Consideration must be given to provide access by fire trucks, sanitation vehicles and other service vehicles (school buses and street sweepers), if needed.



Hamilton Baillie: Woonerf in the Netherlands provides shared common space.

Additional measures to encourage walking include a countywide “walk to work” program run by the county health department in partnership with private health care providers and employers. The National “Safe Routes to School” program has been gathering speed in Wisconsin for the last couple of years, and funding for planning and infrastructure improvements is currently available from the Wisconsin Department of Transportation. “Safe Routes to School” programs facilitate and promote walking and bicycling to school with the “5 Es”-- Encouragement, Engineering, Enforcement, Education, and Evaluation (see Chapter 7), key focus areas that complement any transportation plan. For more information on “Safe Routes to School,” visit www.dot.wisconsin.gov/localgov/aid/saferoutes.htm

6.3 Impacts of Bicycle and Pedestrian Facilities Alternatives

Transportation planning is largely dependent on land-use planning and the types of facilities being planned. Pedestrian amenities, such as street trees and lights, will do little to promote walking if there is nowhere to walk to. Land use, zoning, and subdivision ordinances that promote segregated uses separate origins and destinations, impede bicycling and walking, and necessitate reliance on the automobile. Governments and school districts should avoid constructing public buildings and facilities in places where people cannot walk or bike to them. Planning policies and county ordinances, on the other hand, can promote all modes of transportation equally by requiring that buildings front the street whenever practical, encouraging bike rack installation, and reducing the number of required auto parking for new buildings. In addition, friendly environments for bicyclists and pedestrians have been shown to facilitate community, benefit public health, and raise property values.

A 1999 Study by the Urban Land Institute of four new pedestrian communities determined that homebuyers were willing to pay \$20,000 more for homes in walkable areas compared to similar homes in surrounding areas. New Urbanism (walkable) communities enjoy significantly higher housing values than traditional suburban developments. In a growing number of small and medium sized cities, downtown condominium and townhouse prices and apartment rents command a premium over comparable suburban, auto-dependant real estate.

7

SAFETY ANALYSIS

The development of bicycle and pedestrian facilities as outlined in Chapter 6 is only one part of encouraging increased walking and bicycling. In order to enable transportation users a variety of modal choices, the safety of all transportation methods must be considered and accommodated. To this end, Chapter 7 comprises an analysis of regional crash statistics and characteristics, identifies countermeasures to prevent crashes, and outlines the Five Es for improving bicycle and pedestrian safety.

7.1 Crash Statistics

Highway and bicycle safety specialists now use the term “crash” instead of “accident” to emphasize that most automobile and bicycle interactions are predictable and preventable occurrences. Bicycle crashes include both falls and collisions. A bicyclist may fall due to slippery conditions or an unexpected impediment to travel; or a bicyclist might have a collision with a car, bike or pedestrian. These should all be considered “crashes” and in a perfect world, “crash” data would be available for all crashes no matter what the cause.

Understanding bicycle and pedestrian crash data helps to identify methods for preventing future crashes. Detailing statistics, such as who is typically involved in a crash (children or adults), where crashes occur (specific intersections or streets) and what time of day crashes occur allows bicycle and pedestrian planners and engineers to more accurately implement safety programs and roadway design enhancements.

National Data

Nationally, 773 pedalcyclists and 4,784 pedestrians were killed in 2006, according to the National Highway Traffic Safety Administration. Additionally, 61,000 pedestrians and 44,000 pedalcyclists were injured in traffic crashes in the United States this same year. Pedalcyclists include all types of transportation that is pedaled by the user, including bicycles, tricycles, etc. They accounted for 13 percent of all nonoccupant traffic fatalities in 2006, while pedestrians make up 80 percent of all nonoccupant traffic fatalities. In terms of age, those under age 16 accounted for 14 percent of all pedalcyclists killed and 28 percent of those injured in traffic crashes in 2006. Children under age 16 accounted for 17 percent of the pedestrian fatalities in 2006.

Wisconsin Data

In Wisconsin, 1,042 pedalcyclists were injured and eight pedalcyclists were killed in 2006. With 1.44 pedalcyclist fatalities per million population, Wisconsin was slightly lower than its neighboring states including Illinois (1.95), Iowa (1.68), and Minnesota (1.55). Additionally, fifty-three pedestrians were killed and 1,330 pedestrians were injured in traffic crashes in 2006.

Local Data

The Wisconsin Department of Transportation (WisDOT) Motor Vehicles Traffic Crash Section indicates that in 2006, Marathon County saw 26 bicyclists and 18 pedestrians injured in traffic crashes. Of the 53 pedestrian fatalities statewide in 2006, one pedestrian died in Marathon County.

The WisDOT Motor Vehicles Traffic Crash Section also indicated that crashes are most prevalent at the intersection of STH-29 at US-51 with 191 crashes between 1999-2004. US-51 at CTH-N, US-51 at STH-29, US-51 at CTH-WW, and BUS-51 at CTH-XX, Rib Mountain Dr at

US-51, and US-51 at Sherman St each accounted for over 100 crashes during this same time period. While it is unclear what specific safety issues contribute to these crashes, pedestrians were involved in 1% of these crashes, and bicyclists were involved in an additional 1% of crashes.

According to the Wausau Metropolitan Area (MPA) Long Range Transportation Plan-2035, the typical intersection within the Wausau MPA experiences less than one crash per million vehicles that enter the planning area. While this statistic demonstrates overall high levels of traffic safety within the MPA, not surprisingly, due to heavy daily traffic volume, the greatest concentration of crashes occurs in the City of Wausau. The Long Range Transportation Plan does identify eleven dangerous roadway segments that warrant additional safety analysis—BUS-51, STH-52, US-51, Bridge Street, Forest Street, 1st Avenue, 1st Street, CTH XX, CTH JJ, Grand Avenue, and STH-153. The following tables identify bicycle and pedestrian crashes by location from 1994-2004. See “Bicycle Crash Locations Map” in Appendix C.

Municipality	On Street at Closest Crossing Street	Crashes
C-Wausau	1 Ave at Bridge St	4
V-Rothschild	29 at Grand Ave	4
C-Wausau	Grand Ave at Lakeview Dr	4
C-Wausau	Grand Ave at Thomas St	4
C-Wausau	3 St at Bridge St	3
C-Wausau	Bridge St at 3 Ave	3
C-Mosinee	2 St at Main St	2
C-Wausau	Bopf St at 11 Ave	2
C-Wausau	Bridge St at 7 St	2
C-Wausau	Bridge St at 3 St	2
C-Wausau	Bridge St at 1 Ave	2
C-Wausau	Forest St at 6 St	2
C-Wausau	Jefferson St at 4 St	2
C-Wausau	Jefferson St at 5 St	2
C-Mosinee	Main St at 3 St	2
C-Schofield	Radtke St at Grand Ave	2
C-Wausau	River Dr at Thomas St	2
C-Wausau	Ruder St at Grand Ave	2
V-Weston	Schofield Ave at Alderson St	2
C-Wausau	Thomas St at 6 Ave	2
C-Wausau	West St at 17 Ave	2
V-Rothschild	Yawkey Ave at Grand Ave	2

Intersections with 1 Bike Crash 168

Total Crashes Involving Bikes 222

Source: WisDOT Motor Vehicles Traffic Crash Section; 2006 Wausau MPO LRTP

Table 7.1.1b: Crashes Involving Pedestrians by Location to Nearest Intersection

Municipality	On Street at Closest Crossing Street	Crashes
C-Wausau	6 St at Jefferson St	4
C-Wausau	6 St at Washington St	4
C-Wausau	Stewart Ave at 3 Ave	3
C-Wausau	3 Ave at Rosecrans St	2
C-Wausau	3 Ave at West St	2
C-Wausau	3 St at Dekalb St	2
C-Wausau	6 St at Wausau Ave	2
C-Wausau	7 St at Jackson St	2
C-Wausau	7 St at Washington St	2
C-Wausau	Adams St at 9 St	2
C-Wausau	Bridge St at 10 Ave	2
C-Schofield	Grand Ave at Lakeview Dr	2
V-Weston	Machmueller St at Jelinek Ave	2
C-Mosinee	Pine St at 9 St	2
C-Wausau	Scott St at 3 St	2
C-Wausau	Stewart Ave at 7 Ave	2
C-Wausau	Thomas St at 6 Ave	2
C-Wausau	Wausau Ave at Stevens Dr	2

Intersections with 1 Crash Involving Pedestrians 157

Total Crashes Involving Pedestrians 198

Source: WisDOT Motor Vehicles Traffic Crash Section; 2006 Wausau MPO LRTP

7.1.1 Bicycle Crashes and Countermeasures

Generally, there are three common crash types that comprise the majority of bicycle crashes occurring in both rural and urban areas of Marathon County: right-of-way usurpation, bicycle ride-outs and wrong way riding.

Right-of-way usurpation happens when either a bicycle or a car cuts off the other vehicle. For example, a car makes a left hand turn into the path of a bicyclist that is proceeding straight through an intersection or a bicyclist passes a stopped car on the right hand side at an intersection and is hit as the driver turns right.

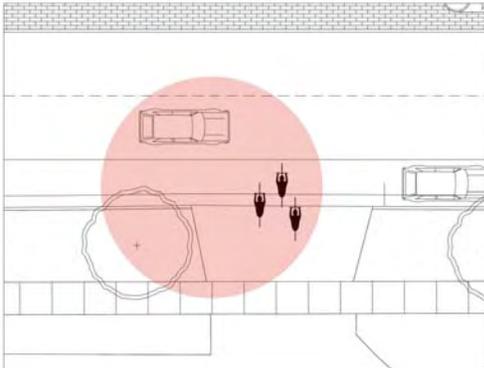
Countermeasures include:

- Educating bicyclists on the importance of following the rules of the road, searching for motorists and "catching" the motorist's eye prior to moving into the path of an on-coming vehicle.
- Educating motorists about the rights of bicyclists and searching for and avoiding bicyclists.



SAA: Right-of-way usurpation endangers travelers.

Bicycle "ride-outs" are very common, especially among child bicyclists. This crash occurs at driveways or along streets when the child darts out into traffic. It most commonly occurs at residential driveways.



SAA: Bicyclists dart out into traffic.

Countermeasures include:

- Remove on-street parking or restrict parking near driveways to improve visibility.
- Reduce speed of traffic where appropriate.
- Educate cyclists (adults and children) on the appropriate and safe way to enter a street from a driveway.
- Alert drivers to the possibility of the presence of children and ask for extra caution on the part of the driver.

Wrong way riding most commonly occurs when the bicyclist is riding on the sidewalk. These crashes occur mostly at driveways and intersections as the bicyclist enters the drive or intersection and the driver does not notice him or her approaching on the right as they are looking left for traffic. Wrong way riding on the street can also cause crashes because it places the bicyclist in a location on the street that is unexpected by the driver.



SAA: Bicycle-riding in unexpected areas, like sidewalks, jeopardizes safety.

Countermeasures include:

- Outlaw sidewalk riding for adults; educate children that sidewalk riding has hazards and how to avoid them.
- Educate bicyclists about the hazards of wrong way riding both on the street and on the sidewalk.
- Encourage drivers to be on the lookout for sidewalk bike riding, especially around schools and in residential neighborhoods.

7.1.2 Pedestrian Crashes and Countermeasures

Common characteristics of pedestrian collisions include:

1. Driver inattention
2. Struck by vehicle while crossing at intersection (failure to yield right-of-way)
3. Struck by vehicle while crossing midblock (failure to yield right-of-way)
4. Struck from behind while walking in the roadway in the same direction as traffic
5. Motorist exceeding safe speed
6. Darting out into the street at midblock (most common for children)
7. Vehicles backing up (difficult to see children or others walking behind)
8. Collisions in urban areas (approximately 70% of all pedestrian crashes)

Effective countermeasures include the following:

1. Improvements to the walking environment
2. Improvements in the road design

3. Intersection treatments
4. Traffic calming measures
5. Traffic management
6. Signs and signals
7. Other measures, including school zone improvements, speed monitoring, parking changes (add, remove, restrict), school crossing guards, ordinances, education programs, and enforcement

The countermeasures outlined above are meant to enhance the future safety of bicyclists, pedestrians, and motorists.

7.2 Five Es

Bicycle and pedestrian travel enhances the overall transportation system only when it can be done safely. The Federal Highway Administrations (FHWA)'s Safe Routes to School program and its associated "Five Es" present a useful model to increase the number of bicyclists and pedestrians and decrease the incidence of crashes. The Five Es—Education, Encouragement, Enforcement, Engineering, Evaluation—are integral to one another, as it is difficult to address one element effectively without also addressing the other four. Further, if one element is ignored, then the impact of the remaining four is reduced.

7.2.1 Education

Education includes identifying safe routes to bicycle and walk; teaching community members to walk, bike and drive safely; and sharing methods to handle potentially dangerous situations. This "E" is closely tied to Encouragement strategies.

Police departments are considered to have primary responsibility for pedestrian and bicyclist safety education; however, the message is even more effective when it comes from schools, parents, elected officials, public health educators, business owners, chambers of commerce and neighbors, in addition to police officers.



National Center for Safe Routes to School: Police officer promotes pedestrian safety.

At the state level, far more attention is being given to pedestrian safety. This attention stems from the Wisconsin Pedestrian Policy Plan 2020, the WisDOT Pedestrian Best Practices Guide, and from concerns that a single transportation mode (the automobile) is having a negative impact on pedestrian safety.

Communities in Marathon County can order free materials from WisDOT to promote pedestrian and bicyclist safety. Pedestrian and Bicyclist safety education materials that can be ordered include:

- Myths & Facts about Pedestrian Safety (for parents) HS209
- School Zones Save Lives (HS210)
- I Stop for Pedestrians Bumper Sticker (HS233)
- Walk on the Safe Side (HS242)

Note: School bus safety materials are also available from WisDOT Bureau of Transportation Safety (BOTS).

Other useful tools include:

- Walkability Checklist (www.walkinginfo.org) (can be used by citizens in neighborhoods)
- Safe Communities Pedestrian Safety Action Guide (published by WisDOT)
- Walking Workshop (funded through WisDOT)

A bicyclist who understands the rules of the road is more likely to be a safe bicyclist. A motorist who understands that bicycles are also vehicles and treats them as such is more likely to drive safely around bicyclists. In the Wausau area, bicyclists and motorists must understand that they may encounter each other around any turn or over any hill. Focused educational efforts are necessary to make motorists and bicyclists aware of this reality so that they can operate their respective vehicles safely.

An effective, ongoing educational initiative caters its message and delivery techniques depending upon the audience. The Wausau MPO can target its bicycle safety education message to three distinct groups:

- child bicyclists and their parents
- average adult bicyclists
- motor vehicle operators

Children are quick learners and will copy what they see demonstrated. Basic bike safety courses for children will reach most children if offered through public and private elementary schools in Marathon County. The Wisconsin DOT offers curriculum for teachers, such as the Basics of Bicycling, aimed at fourth and fifth graders. Physical education teachers can teach this hands-on curriculum that will increase a child's cycling abilities, teach them the rules of the road and help them avoid danger.

WisDOT BOTS offers funding of up to \$2,000 to public schools to buy bikes and other material for this course. Public and private school teachers are urged to attend the Wisconsin DOT's Teaching Safe Bicycling training courses. Contact WisDOT BOTS for more information.



National Center for Safe Routes to School: Bicycle and pedestrian safety education should include the entire community.

Some communities in Wisconsin offer bicycle safety education during popular, optional summertime classes such as Safety Town or Safety Camp, which are coordinated by civic groups, such as Junior Women's Clubs and conducted by law enforcement officers. Park and recreation departments around the state are beginning to sponsor bike safety classes taught by instructors certified by the League of American Bicyclists (LAB). A course for children K-3 requires that one parent attend. It covers bike and helmet fit, safety checks and basic bike handling skills. A course for children in fourth, fifth, and sixth grades teaches basic traffic laws, in-depth bike handling, group riding and how to select the safest route. It includes on-road riding to both test student comprehension and allow for practice of the skills learned in

the classroom and parking lot exercises. The Bicycle Federation of Wisconsin can provide a list of instructors.



National Center for Safe Routes to School:
Walking school bus promotes safely walking to school.

By involving parents in bicycle education classes, adults learn that bicycling is different from a kid's eye view. Adults are reminded that children under the age of 10 cannot judge vehicle speed accurately and have a narrower range of peripheral vision, which may prevent them from seeing danger. Most parents know that their children are easily distracted and do not always pay attention. Parents can help their children practice the stop, look and listen behaviors learned in a bike safety class, and by learning what to teach their children, parents learn to model positive behaviors themselves. The Wisconsin DOT offers the video "A Kid's Eye View" free of charge.

Adult cyclists are much more difficult to reach with a safety message. LAB offers safety classes for this age group, but most adults believe they know how to ride a bike even as they ride in the wrong direction on the road or ignore stop signs. Effective ways to educate adults include point of sale safety information, presentations at bike club meetings and organized bike rides that emphasize bike safety (wearing a helmet, stopping at stop signs, riding on the right, correct lane position, signaling, etc.). Public education campaigns, discussed below, are also effective. An excellent, free brochure, "Two-Wheeled Survival in a Four-Wheeled World", is available from the Wisconsin DOT. A convenient wallet card developed by the Bicycle Federation of Wisconsin highlights Wisconsin's Bicycle Laws.

Young people, especially, enjoy mountain biking, which is an extremely challenging and sometimes dangerous sport. Knowing how to handle a mountain bike safely on isolated, tricky trails is critical. Schools can invite an amateur or professional mountain bike competitor to speak annually at school assemblies to reach kids with a safety message. Ideally, the speaker would also be a bicycle commuter and would cover the basic rules of the road. A local bike shop can be encouraged to offer a course on mountain bike techniques (and safety) that will appeal to children and young adults.

Brand new motorists can learn about bike safety during driver's education classes, provided the instructor has the necessary information to teach the subject. Other motorists can learn about bike safety through public information campaigns. Senior centers often sponsor safe driving classes for older adults. The free WisDOT brochure, "Sharing the Road: Survival of the Smallest" and other basic bike safety materials should be included in such courses.

Safety campaign ideas for distribution of public information include the following ideas:

- Publicize safe driving tips during bicycle season (via newspaper articles, public service announcements)
- Distribute WisDOT brochure "Sharing the Road"
- Distribute "Share the Road with Bicyclists" bumper stickers

- Encourage service groups, injury prevention groups or local hospitals to sponsor and staff bike safety booths at public events or to sponsor a bike safety fair.
- Encourage the Marathon County Health Department to hold a summer safety fair and include bike safety materials and demonstrations
- Encourage the Wausau and Marathon County Parks, Recreation, and Forestry Department to distribute safety information
- Encourage Marathon County Public Library to display and distribute safety materials during the bicycling season and encouraging libraries to purchase educational videotapes and books about bike safety and maintenance
- Distribute bike safety materials in other locations such as city, village and town halls, motor vehicle registration office, bike shops and local libraries

7.2.2 Encouragement

Encouragement can only occur after the foundation of the previous E (Education) is strong. Encouragement combines the results of the other Es to improve knowledge, facilities, and enforcement to encourage more people to walk or ride safely. Most importantly, encouragement activities build interest and enthusiasm.

A bicyclist who understands how to bicycle safely in traffic is more likely to feel comfortable riding on the road and will bike more places more often. If cyclists know that the community's roadway maintenance practices take bicycling into consideration, they will be more likely to use their bicycle for more types of trips. Bicyclists who believe that law enforcement will both protect them and motorists will operate their bicycles in a safe manner.

One way that Marathon County can encourage new bicyclists to go for a ride is to ensure that safety classes are offered and that safety materials are widely available. Then, Marathon County can promote family rides by suggesting bike routes that appeal to all age and skill levels through distribution of a bicycle routes map.

Employers in the Wausau area can encourage employees to bike to work by providing information about bicycle commuting, installing bicycle parking, offering incentives, and making showers available.

The Wausau MPO can participate with other groups or local governments to sponsor "Bike Week" in the early summer to encourage people to ride their bike at least once during that week to a nearby destination. The Bicycle Federation of Wisconsin can help by providing information about how to plan a Bike Week. Many communities encourage different activities on different days. Some examples of fun events include Monday - Bike to School Day, Tuesday - Bike to the Library Day, Wednesday - Bike to Work Day, Thursday - Bike the Brook Day, Friday - Bike to the Store Day, Saturday - Bike to the Coffee Shop Day, Sunday - Bike to the Park Day.



National Center for Safe Routes to School: Walk to School Day.

Marathon County can distribute its bicycle maps and encourage local chambers of commerce to develop and distribute "around town" bicycle maps. The County can also partner with

bicycle tour operators to make sure that all of the routes and communities are ready for bicyclists. Finally, communities in the Wausau area can partner with local bike shops to sell Wisconsin's four-section state bike map. This map highlights the most favorable bicycling conditions and rates all roadways for rideability. The map also includes mountain bike trails and state bike paths.

Additionally, schools can become involved in encouraging young people to walk and bike to school. The Walk/Bike Across America initiative involves students keeping track of the miles they accumulate walking and biking to school. The Walk/Bike Across America program instructs classes to add up individual student totals walked per day (or week) and plot them on a map. They then effectively “travel” to a destination and learn more about it. “Walking Math,” as the name suggests, links math with walking. For example, students calculate gas mileage and auto emissions and compare the miles per gallon for different vehicles. These figures have a significant impact on the amount of air pollution produced by a vehicle and can be used to emphasize the importance of walking and biking for physical health and in combating climate change. Other programs, including Walk/Roll to School Days, FREIKER (**Frequent Biker**), and Mileage Clubs and Contests with awards, further serve to motivate students. The Walking School Bus or Cycle Train is a particularly popular method of encouraging kids to walk or bike to school and is simply a group of children who walk (or bike) to school with a designated parent or adult. Several adult leaders arrange to lead the bus or train on different days and/or lead different segments. To encourage walking, communities should adopt the goal of The National Walking and Bicycling Study to double the number of walking trips within the community.

7.2.3 Enforcement

Enforcement includes policies that address safety issues, such as speeding or illegal turning, but also includes encouraging community members to work together to promote safe walking, bicycling, and driving. Law enforcement officers play an important role in advancing bicyclist and pedestrian safety. Officers have the greatest impact when they speak to young people in a school environment or when they demonstrate safety practices to children. Many communities sponsor bicycle rodeos or Safety Towns that emphasize the importance of wearing a helmet and riding on the correct side of the road. In this setting, children learn that they should not ride on the roadway until they understand and practice all of the rules of the road.

By involving law enforcement in delivering the bicycle safety message to motorists and bicyclists alike, officers are more apt to see that their responsibility includes the enforcement of laws that promote bike safety. Officers can reinforce bicycle safety messages by stopping bicyclists they observe ignoring the rules of the road. A verbal or written warning is very effective. Along with the warning, officers should be encouraged to give the cyclist information about sharing the road with motorists and Wisconsin’s bike laws.

By stopping motorists who exhibit dangerous driving practices around bicyclists, an officer helps to prevent a future tragedy. Such a stop is a “teachable moment” and the officer can give the motorist information about sharing the road with bicyclists.

Increasing the presence of law enforcement, especially when children are present, will establish a safer traveling environment for people on foot or bike. Specifically, enforcing speed limits can boost the safety of walkers and bicyclists. The “Keep Kids Alive—Drive 25” campaign is a community-based approach to attract attention to reducing driving speed in neighborhoods or school areas.



A growing number of Wisconsin communities have bicycle patrols. Although it may not be feasible to have an officer on a bike during the entire riding season, having a trained bike patrol officer available during special events, such as the county fair, would help to make the Wausau area's commitment to bicycling more visible to its residents. The Wisconsin DOT offers bike patrol training and it is recommended that the Wausau MPO send one or more members to such a course.

National Center for Safe Routes to School: Officers patrol the community on bike.

In addition to promoting educational campaigns about pedestrian safety, Wausau area police departments and police officers can join with other departments and officers throughout Wisconsin in making pedestrian safety part of community oriented policing. Technical assistance and officer training is available from WisDOT BOTS.

Sidewalk, building and property maintenance laws that support a safer, friendlier walking environment must also be enforced. For example, overgrown vegetation, namely at corners, can obscure the visibility of the pedestrian to motorists and vice versa. In addition, sidewalks in disrepair (or snow-covered) can become a tripping hazard or otherwise impassable.

7.2.4 Engineering

Engineering is a broad concept used to describe the design, implementation, operation, and maintenance of traffic control devices or physical measures. It is one of the complementary strategies of the 5 Es, because engineering alone cannot produce a safer environment for walking and bicycling.

Engineering considerations include designating and signing routes and making capital improvements to provide bike lanes, wider shoulders, and crosswalks. Engineering also includes periodic street and bridge sweeping to remove glass, gravel and other debris and the installation of drain grates that do not impede bicycle tires. The Wisconsin DOT promotes the Road Hazard Program that involves local cyclists in reporting roadway hazards to the appropriate municipal agency. The Wausau MPO can work with the WisDOT to implement this program. Furthermore, localities countywide can include provisions for bike lanes or wide shoulders in future Capital Improvement Plans.



National Center for Safe Routes to School: Engineering improvements, including bulb-out, crosswalk, pedestrian signage and speed bump, enhance pedestrian safety.

The WisDOT Pedestrian Best Practices Guide provides specific engineering strategies. In addition, WisDOT at the state and district level can be called upon for technical assistance. Engineers can seek technical assistance and training from WisDOT and from the U.S. DOT. Useful websites provide ongoing help - www.bicyclinginfo.org and www.walkinginfo.org, and www.bikewalk.org. New tools on these websites include an “ask an expert” feature providing design options complete with pictures and operational information. Several interactive CDs are available as additional and handy tools.

7.2.5 Evaluation

Evaluation involves monitoring outcomes and documenting trends through data collection before and after activities associated with the previous four Es. Evaluation is necessary to assess advancements in implementing this plan, recognize progress towards the completion of each element, and identify successes in achieving plan goals and objectives.

Attitudinal surveys provide information on community feelings toward walking and biking and travel mode surveys provide raw data on the extent and nature of walking and bicycling throughout the Wausau area. Both are useful tools for identifying methods to improve walking and bicycling in Marathon County. Walkability/bikeability audits should be regularly performed to identify safe routes to bicycle and walk. Audits can help provide quantitative support for improvements brought about through the 5 Es programming.

In sum, the Five Es—Education, Encouragement, Enforcement, Engineering, and Evaluation—support walking and bicycling safely and help develop a culture where pedestrians and cyclists are respected and their mobility is given priority.



RECOMMENDATIONS & IMPLEMENTATION

The following recommendations are presented as a means to address the goals and objectives identified by the Wausau MPO in previous chapters. These recommendations were developed using an inventory and analysis of existing facilities, ordinances, and plans, and rely on suggestions from the Bicycle Federation of Wisconsin and the Wausau MPO's Bike/Ped Committee. This chapter recommends bicycle and pedestrian programs, facility improvements, route configuration, and implementation strategies. A timetable for expansion of the bicycle and pedestrian network concludes this chapter.

8.1 General Pedestrian & Bicycling Programmatic Recommendations

Drawing from the bicycle and pedestrian safety initiatives outlined in Chapter Seven, the following operational recommendations focus on education, encouragement, enforcement, and facility maintenance. Attention to operational procedures is critical if the Wausau area wants to improve the level of safety and convenience for local bicyclists and people who travel to the area to enjoy its natural resources.

Education, Encouragement, & Outreach

Education, encouragement, and outreach programs are designed to foster a safe bicycling and walking environment and increase the prevalence and enjoyment of walking and bicycling. Successful encouragement and outreach efforts largely rest on a foundation of extensive and effective educational programs. Education programs include identifying safe routes for bicyclists and pedestrians, teaching bicycling techniques, disseminating information regarding regulations that govern bicyclists and pedestrians, and instructing bicyclists and pedestrians how to handle potentially dangerous situations. Encouragement activities are valuable because they enable or promote biking and walking through incentives (such as rewards) or provisions (such as shower facilities). Outreach activities are among the easiest and least cost intensive initiatives that advance bicyclist and pedestrian safety. The following recommendations promote biking and walking as part of a healthy transportation system.

- 8.1.1 Following successful grant awards in the Town of Rib Mountain and the Village of Weston, other Wausau Area communities should implement Safe Routes to School (SRTS) programs. The Wisconsin Department of Transportation (WisDOT) sponsors both infrastructure and non-infrastructure grants to facilitate safely walking and bicycling to school. Contact Wisconsin's SRTS Coordinator.
- 8.1.2 Utilize local firefighters, police officers, or certified bicycle instructors to hold a bicycle-training rodeo—a one-time event that teaches safe bicycling and good judgment to elementary and middle school children and their parents.
- 8.1.3 Support transportation initiative coordination through the Bike/Ped Committee (MPO) as the area-wide bicycle and pedestrian advisory committee. This committee is in a unique position to highlight areas of concern recognized in multiple communities and to coordinate intergovernmental planning and implementation efforts. These may include investigating concepts like creating an area-wide greenway program similar to the Green Circle Trail in Stevens Point. Similar efforts include the Marathon County Comprehensive Outdoor Recreation Plan 2007-2012 which places a

high priority on developing a county-wide trail system providing year-round use for a variety of users. Extending the range of this planning and coordination to a multicounty initiative would better promote the resources within the region.

- 8.1.4 Create an education sub-committee of the MPO Bike/Ped Committee in order to increase the visibility of bicyclists and pedestrians in the Wausau area and develop educational materials and programs.
- 8.1.5 Develop employer incentive programs to encourage employees to try bicycling and walking to work, such as more flexible arrival and departure times and/or monthly raffle contests.
- 8.1.6 The City of Wausau Comprehensive Outdoor Recreation Plan 2003-2008 emphasizes the lack of adequate bicycle commuter routes within the City of Wausau. For bicyclists who currently commute, encourage employers to provide shower and locker facilities. Some cities use incentives such as reducing the amount of automobile parking required if shower facilities are included.
- 8.1.7 Create a multimodal transportation guide highlighting how to access specific destinations with emphasis on biking, walking, and transit. Access guides should include graphics, specific step-by-step travel directions, and information about the benefits of walking and bicycling. Access guides are usually developed by facility managers, employers, downtown business owners, or the Department of Transportation. The transportation guide, or route map, should be available at the area's Visitor Center.
- 8.1.8 Contact local governments and police departments to institute a *Sunday Parkways* ride once a month. *Sunday Parkways* are times set aside on weekends and holidays for traffic-free bicycling, skating, and walking on a network of selected streets. Existing automobile infrastructure is effectively transformed into bicycle and pedestrian trails gathering neighbors outdoors to celebrate walking and bicycling. The program has been remarkably successful in promoting public health and alternative transportation in large cities like Bogota, Columbia, but is scalable and can even be implemented within a small circuitous network (such as downtown Wausau).



Sunday Parkways transform urban streets into active recreation centers. (Healthy Streets Campaign)

- 8.1.9 Promote public bicycle rides, events, programs, and bicycle advocacy groups including bike to work week, bike swap, club rides, fundraising events, and competitive sporting events (24 Hours of 9 Mile, etc).
- 8.1.10 Commit to becoming a recognized Bicycle Friendly Community, a designation sponsored by the League of American Bicyclists. The League provides technical assistance and other information for cities working toward Bicycle Friendly Community status at www.bicyclefriendlycommunity.org.
- 8.1.11 Create a Bicycle Ambassador Program to interact with people every day on area streets—answering questions, giving out free safety gear and resources, teaching “ABC Quick Check” techniques, and speaking with motorists about bicycle and pedestrian issues. Potential ambassadors should attend a training program, such as the Teaching Safe Bicycle program through the Wisconsin DOT offered annually.
- 8.1.12 Educate motorists and bicyclists through a Share the Road Campaign by developing Share the Road flyers—one targeting bicyclists and pedestrians and one targeting motorists. Fliers outline safe and courteous behavior, collision reporting procedures, and local bicycling resources.
- 8.1.13 Order free materials from WisDOT to promote pedestrian and bicyclist safety, including Myths & Facts about Pedestrian Safety, I Stop for Pedestrians Bumper Sticker, and Walk on the Safe Side, and distribute in public places and at recreation facilities.
- 8.1.14 Hold a summer safety fair, which includes bicycle safety materials and demonstrations, in conjunction with the Marathon County Health Department and local park and recreation departments.
- 8.1.15 Implement a helmet campaign at area schools to highlight the importance of helmet use.
- 8.1.16 Coordinate with the HEAL Coalition, which works to impact obesity by increasing physical activity and healthy food choices, as a community partner for plan implementation and dissemination efforts.

Enforcement

Consistent enforcement of traffic laws plays an important role in advancing bicyclist and pedestrian safety.

- 8.1.17 In conjunction with the local police or sheriff department, hold periodic traffic stops where motorists, bicyclists and pedestrians may be stopped, given a Share the Road flyer, and have the opportunity to provide feedback to officers regarding the campaign.
- 8.1.18 Implement bicycle patrols in the urbanized area to enforce traffic laws and model safe bicycling techniques. Although it may not be feasible to have an officer on a bike during the entire riding season, having a trained bike patrol officer or Community Service Officer available during special events, such as

the county fair, music festivals, or kayak/canoe races, would help to make the Wausau area’s commitment to bicycling more visible to its residents.

8.1.19 Continue to educate and train law enforcement personnel in the enforcement of laws concerning bicyclists’ rights and responsibilities. Consider sending an officer to the WisDOT-Bureau of Transportation Safety (DOT-BOTS) Pedestrian and Bicycle Law Enforcement training course, new recruit training, and refresher courses.

8.1.20 Train crossing guards to report motorists who violate crosswalk regulations or otherwise endanger children through illegal or unsafe driving. Crossing guards should be encouraged to record license plate numbers and other descriptors of alleged violators and provide reports to local law enforcement authorities.

8.1.21 Install driver feedback signs, such as those located near John Muir Middle School on Stewart Ave., to display driver’s rate of speed in real time. These devices work best when programmed to display a message such as “Slow Down” to speeding motorists. They should be used in combination with periodic enforcement efforts by local police.



Image of driver feedback sign (DFS)

8.1.22 Work with residents, school districts, and neighborhood groups to identify crosswalks where motorists fail to yield to pedestrians. The listing should be compiled by local law enforcement agencies and periodic targeted enforcement operations set up to implement crosswalk regulations. Involve the local media and explicitly identify those locations which will be subject to the targeted enforcement effort in order to create discussion and promote awareness.

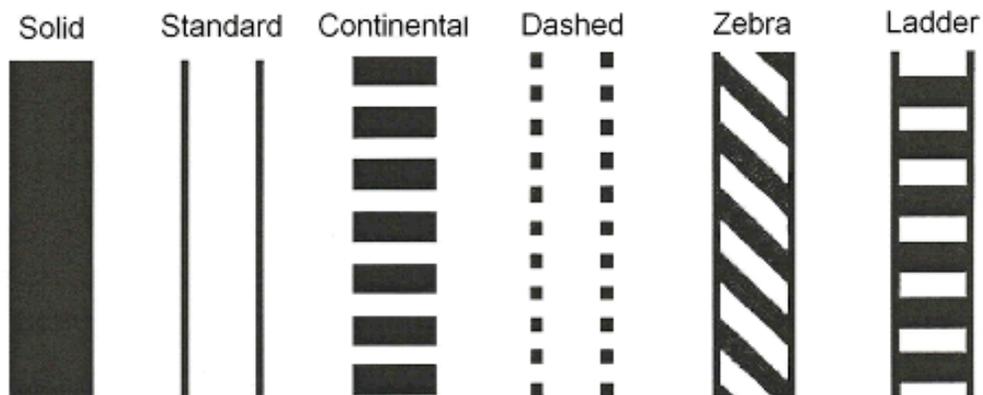
Facility Maintenance

Maintenance procedures are important for all types of transportation facilities. Poorly maintained facilities can increase the County's liability by being unsafe or unsuitable for use. Periodic and consistent removal of debris and resurfacing/patching of deteriorated pavement are important procedures for ensuring that users are provided with safe and reliable transportation facilities. Bicycles, especially, are more sensitive than motor vehicles to roadway irregularities such as potholes and loose gravel.

8.1.23 Develop a maintenance policy that addresses the special needs of bicyclists, including more frequent street sweeping on streets frequented by bicyclists and minor pothole and crack remediation.

8.1.24 Develop a web-based system for bicyclists, pedestrians and motorists to proactively identify needed repairs to roadways, bikeways, and sidewalks. Link these items to a central clearinghouse (such as the Wausau MPO site or City Pages site) for quick download and review.

- 8.1.25 Reduce disturbance of bicycle routing during construction, maintenance, and repair work on roadways and trails. For example, if feasible, avoid parking construction or maintenance vehicles in bicycle lanes, shoulders, or on designated bicycle routes. Signage should warn bicyclists well in advance of any location where the bike lane or shoulder is closed for construction or maintenance activities and a 3' to 5' coned-off area between the construction zone and vehicle lane should be maintained for bicycle travel. Bicycle traffic should be detoured, like automobile traffic, when facilities are under repair.



Crosswalk marking patterns. (FHWA)

- 8.1.26 Continue to regularly inspect and maintain signs and pavement markings. Use uniform crosswalk striping in school zones. Such striping may include ladder or zebra-style crosswalks that better identify these facilities to motorists.
- 8.1.27 Implement an “Adopt-a-Bikeway” program and other similar public/private cooperative agreements to offset maintenance costs and provide reliable, routine roadway clean-up on heavily-used bicycle routes. In Rib Mountain, two elementary schools took part in the “Adopt-a-Trail” program. Rib Mountain elementary school adopted the northern portion of CTH R trail, and South Mountain elementary adopted the southwestern portion.
- 8.1.28 To facilitate public safety on sidewalks and shared-use trails, install pedestrian-scale lighting at select, popular locations.
- 8.1.29 Ensure curb cuts and curb ramps are available in heavily traveled areas. These facilities allow people with mobility limitations to utilize the pedestrian network and are required under Title II of the Americans with Disabilities Act (ADA).
- 8.1.30 On bridges, ensure outside lanes are regularly swept to ensure a clear travel lane is provided for bicycles.
- 8.1.31 Investigate the adequacy of pedestrian signals at traffic controlled intersections. In some cases, these signals may not allow enough time for a

pedestrian to completely cross the street. These instances should be reported to the local traffic authority. To help pedestrians in decision-making, consider installing pedestrian countdown timers at intersections that experience a lot of pedestrian traffic, like those on CTH R. These signals have been shown to reduce pedestrian crashes by up to 25%.



Pedestrian countdown timer (FHWA)

Policies

Encouragement and enforcement efforts coupled with the provision of well-maintained sidewalks and bicycle facilities may not be sufficient to increase non-motorized transportation mode share. County and municipal land use patterns and development policies, which accommodate bicyclists and pedestrians, are also important. Many of these policies need to be developed and implemented at the community level following extensive public participation.

- 8.1.32 Review and strengthen existing zoning and subdivision ordinances to reflect adequate on-site pedestrian and bicycle access, parking, and circulation. Considerations may include connections to existing or planned bicycle and pedestrian facilities, maximum block lengths, and reservation of right-of-way for shared-use paths.
- 8.1.33 Future updates to local planning documents, such as a Comprehensive Plan, Land Use Plan and Park and Open Space Plan, should incorporate recommendations for accommodating bicycling and walking.
- 8.1.34 To increase multimodal transportation, provide bicycle racks on Wausau area buses as they are replaced or retrofit buses as funds become available.
- 8.1.35 Investigate sources of funding, including impact fees, for shared use paths and on-street bicycle and pedestrian facilities in new developments. Local engineering departments should also keep abreast of state or federal monies available to help fund local facilities development. Examples include Transportation Enhancement (TE) and Bicycle and Pedestrian Facility program funds through the Wisconsin DOT.
- 8.1.36 Establish a schedule and capital improvement plan (CIP) to maintain and improve paths, sidewalks and roads. Make bicycle and pedestrian infrastructure development part of regular CIP programming.
- 8.1.37 Encourage all new or reconstructed county and local roads and new or reconstructed bridges meet standards within the Wisconsin Bicycle Facility Design Handbook. Promote development of a policy that requires the Marathon County Highway Department to build, or rebuild when scheduled, county roads to these minimum standards, especially when that roadway has been identified as a bike route.
- 8.1.38 Increase public bicycle parking facilities at public destinations, including community centers, parks, schools and shopping centers. Consider custom

racks that can serve not only as bike racks, but also as public artwork or advertising.

- 8.1.39 Require secure bicycle parking at all new employment centers with 30 or more employees and encourage adequate bicycle parking outside existing structures. Explore additional provisions for bicycles that reduce the number of automobile stalls required to provide incentives for employers to increase bicycle accommodations within their facility. These facilities may be extended to showers and changing rooms that would provide credits or vouchers to reduce the amount of required parking.
- 8.1.40 Support efforts to adopt a statewide “complete streets” policy. This policy ensures that all streets are designed and operated to enable safe access for all users (pedestrians, bicyclists, motorists, transit users).
- 8.1.41 Perform biennial inspections of all sidewalk and crosswalk facilities within each local municipality. Some communities hire summer interns to evaluate and map crosswalks and sidewalks. This detailed listing will help prioritize capital improvement planning and identify gaps in the current pedestrian network.
- 8.1.42 Enforce existing property maintenance regulations that require trimming vegetation, clearing snow from sidewalks, and maintaining clear pathways on sidewalks. Encourage volunteers to report instances of improper maintenance to increase the usability of pedestrian facilities.

8.2 General Pedestrian & Bicycling Facility Recommendations

While useful to encourage and sustain walking and bicycling as transportation, operational programs and policies are futile without adequate facilities. Too often, multimodal facility planning is synonymous with planning separate trails. Separate bike lanes and bike/pedestrian paths, though, are the most costly of all facility improvements. Because of their direct costs and the amount of public right-of-way needed to accommodate these systems, separate trails seldom form a complete bicycle and pedestrian system. As a result, it is more efficient to make use of established transportation right-of-ways. Signing, shared roadways, bicycle parking, a strong education system and policy improvements are perhaps the best and most cost effective means of improving conditions for bicycling and walking.

Signage

Many roads in the Wausau area are currently suitable for bicycling due to wide outside travel lanes, paved shoulders, and/or low traffic volume. Considering these factors, some roads in Table 8.2 mention “Route Signage” as the primary facility improvement. This section discusses route signage more in depth.

Signing “Bike Routes” allows the communities who post these signs to better prioritize bicycle improvements on local roadways and to direct potential bicyclists to the preferred routes within the community. The route signs are good for users inside



Unique wayfinding signage for bicyclists and pedestrians, City of Naperville, IL. (SAA)

the community because they give local residents the ability to negotiate the local street pattern using established routes. Visitors from outside can also enter the community using recommended routes that they know link up with other connections or destinations. These routes also increase the likelihood that motorists will encounter bicyclists along the route which may heighten driver attentiveness and bicyclist camaraderie.

Signage can convey a variety of information. Chief among these are locational attributes such as where the nearest commercial center is located, distance to a local trail connection (such as Mountain-Bay Trail), or other marketing opportunities. Unique signage can also establish a community's identity and replicate the efforts of beautification taken in other parts of the community (such as a unique downtown district). Signage should be authorized and placed by the local traffic authority and consistent with MUTCD standards. They should also be consistent throughout the MPO.



Top: Portland, OR includes travel time information to inform cyclists how long a bicycle trip will take at 10 mph. (BikePortland.org)

- 8.2.1 Sign all recommended “Bike Routes” identified in this plan as soon as possible. Coordinate map development with signage so route users can navigate effectively within and between all MPO communities.

- 8.2.2 Seek grants at the federal, state, and local level to install uniform signage along “Bike Routes” throughout the MPO

Bottom: Example of a panel combination using a more traditional route sign graphic. (NCUTCD)

- 8.2.3 Facilities identified as “Bike Routes” should receive evaluation considering all modes of travel. Provide six-foot (no less than 4’) paved shoulders in the redesign of County highways that are signed as bicycle routes. Maintain this standard in winter.

- 8.2.4 Bridges that link segments of bike routes should be considered for bicycle lane accommodation upon redesign or re-decking. Properly signing bridges on bicycle routes enables safer bicycle travel.



- 8.2.5 Display signs indicating “Bikes Use Full Lane” where narrow road shoulders preclude side-by-side bicycle and automobile travel in the same travel lane.

Railroad Right-of-Way Trails

Railroad right-of-ways provide opportunities for multimodal travel because trains operating within the right-of-way require very little of the 50’ typically reserved (25’ on each side of the track). There are two options that exist on railroad right-of-ways; the first is “rails to trails”

that utilizes the rail bed itself for a multiuse trail by removing the tracks and ties of an abandoned rail corridor. Large portions of many Wisconsin state trails were developed on abandoned rail lines (including the Mountain-Bay Trail). The second option is to develop “rail-with-trail” facilities. In this example, a multiuse trail is developed alongside a maintained railroad track. There are examples of this design in many areas throughout Wisconsin including the Wild Rivers, La Crosse River, 400, Military Ridge, Badger, and Capital City state trails.

Most of the following identified areas are rails with trails (RWT) facilities that will keep railroads that help fuel the local economy active while enhancing the right-of-way area to include a multiuse trail facility that can provide important linkages for pedestrians and bicyclists throughout the region.

The following seven areas were discussed by staff and presented to the Bike/Ped Committee for consideration in early 2008. The purpose of these conversions is to connect the Mountain-Bay Trail to Wausau and other MPO communities. Concept maps are located in Appendix E.

1. Mountain Bay to Camp Phillips: The track is abandoned and could extend the Mountain-Bay Trail to Camp Phillips Road. This connection should be developed after the reconstruction of Camp Phillips which will include a trail component in 2010.
2. Schofield Triangle: Acquiring right-of-way on either of the east-west tracks from Camp Phillips Road to the north/south mainline would bring the Mountain-Bay Trail into Schofield and potentially north to Wausau or south to Rothschild. Most of the east/west portions are only occasionally used for storage.
3. South to Rothschild: This route would be the shortest and quickest connection from the Mountain-Bay Trail to the bike/ped bridge off River Street and potentially linking the Mountain-Bay Trail to Rib Mountain State Park. Off-street accommodation would most easily be achieved along the railroad right-of-way. Using the railroad would also provide a direct link from the bike/ped bridge to the Rothschild Pavilion.
4. Rail Yard to Downtown: This is the main switchyard for the area but with the old landfill and the amount of right-of-way there is an opportunity to link points east to the River Edge Parkway to the west.
5. River Edge Area: There are plans for trail development on both sides of the Wisconsin River. There appears to be an opportunity to link trail access with existing railroad locations, especially from the south to Thomas Street and to the north past Bridge Street.
6. Western Leg: This leg could become one of the most important pieces in Wausau if part of the railroad right-of-way can be utilized. This could create a major commuter route from the industrial park to downtown including areas around the highway 51/29 interchange area. This also links to the CTH R trail and Rib Mountain parks.
7. Northern Area: Utilizing a combination of railroad and utility corridors, this trail could potentially link the Wausau area north to Brokaw and beyond (Merrill, Tomahawk).

Pedestrian Facility Improvements

It is critical to maintain a comprehensive vision for creating a walkable Wausau area, which includes trails, parks, and roadways. Pedestrian planning as it applies to municipal governments is best done at the local level. Rather than recommend a myriad of specific facility improvements within municipalities, this MPO plan sets policy priorities and offers guidance and tools to municipal governments to help them promote walking and pedestrian safety.

Because of the health and community benefits derived from walking, it is highly recommended that county and municipal governments adopt ordinances requiring that sidewalk improvements occur regularly in existing neighborhoods. These facilities can be paid for with general funds instead of through property owner assessment.

The overriding principle in providing for pedestrians is to create public rights-of-way that work effectively for and benefit all modes of transportation. A transportation environment and system that works for pedestrians will generally work better for bicyclists, disabled persons, automobile drivers, and for all other users, including transit and commercial vehicles.

In anticipation of future development, wherever practical, the municipalities should provide pedestrian facilities. Pedestrian improvements should be made in accordance with the latest design guidelines prescribing sidewalk width and cross slope.

In all but the most extreme circumstances, it is recommended that every municipality adopt a sidewalk ordinance requiring sidewalks to be built on at least one side of the street in all new developments and to be included when roads are reconstructed or resurfaced.

In the Wisconsin Pedestrian Policy Plan 2020, the Wisconsin Department of Transportation (WisDOT) articulated its commitment to accommodate pedestrians. In Objective 1.0, WisDOT recognized its responsibilities for pedestrians on state trunk highways (STH) and agreed to evaluate pedestrian needs on STH projects and minimize barriers in STH designs.

General pedestrian design guidelines and best practices suggest a sidewalk gap closure program, a pedestrian countdown signal program, and a high-visibility sidewalk installation program. See Chapter 6: Best Facility Practices for additional design information.

In order to prioritize future funding for pedestrian improvements and pedestrian facilities, the following section sets forth recommended project priorities.

Pedestrian Project Priorities

8.2.6 Encourage children to walk to school.

- Add or replace existing school zone signs with bright green signs and arrows marking crosswalks, in accordance with the Manual on Uniform Traffic Control Devices (MUTCD).
- Consider initiating a formal Safe Routes to School program in area elementary and middle schools.
- Make crosswalks more visible and paint them as needed.
- At signalized and non-signalized intersections that parents or children identify as dangerous, post crossing guards.
- Conduct education campaigns with motorists about school zones using a "School Zones Save Lives" flier. Establish a "walk to school" program with school staff, PTO's, and families.

- Encourage parents and children to conduct walkability audits using the SRTS Walkability Checklist to help improve the safety of their route to school.
- Complete gaps in sidewalk systems from neighborhoods to schools. Even small gaps that disrupt safe routes to school should be prioritized and completed.

8.2.7 Make it practical for people to walk to the library, grocery store, pharmacy, community swimming pool, neighborhood park, government buildings, and other destinations.

- Governments and school districts should avoid constructing public buildings and facilities in places where people cannot walk to them. Cheap land today does not justify the future cost to public health and safety.
- Encourage elected officials, staff and citizens to conduct walkability audits to help determine safer routes.
- Use educational materials from WisDOT to promote pedestrian safety and walkability in these areas.
- Install pedestrian-scale street lights along popular walking routes or between popular destinations to encourage pedestrian use and enhance security.



In-street pedestrian pylons, like this one on N. 1st St near the library, help motorists identify pedestrian crossing locations.

8.2.8 Encourage public and private employers to promote walking for transportation.

- Establish a countywide "walk to work" program in partnership with public and private health care providers and employers.

8.2.9 Adopt planning policies that promote all modes of transportation equally.

- Consider amending building ordinances to require that buildings front the street whenever practical.
- Consider amending building ordinances reducing the amount of required auto parking for new buildings and place it behind the building to promote pedestrian access.
- Amend building site ordinances entailing sidewalk snow removal.
- Encourage or require pedestrian facilities and amenities, such as benches, awnings for shelter and other services consistent with the community's character.

- Advocate shared-use transportation standards, including “complete streets” guidelines, in the development review process.
- Direct streets in all new developments to provide sidewalks (5’ minimum) on at least one side of the street.
- ADA guidelines shall be met when new sidewalks, curb ramps, or other pedestrian facilities are installed or when facilities are reconstructed
- Install sidewalks along transit routes. Almost every transportation trip begins and ends with walking, and even the most comprehensive transit system will be underutilized without sidewalks connecting destinations or origins with the mass transit system.

8.2.10 Establish a goal of becoming the most walkable metro area in Wisconsin.

- Focus facility improvements first in areas where area residents walk most often.
- Focus next on areas where visitors to the area walk most often, such as the Rib Mountain State Park and Nine Mile Forest.
- Establish a partnership (County Health Department and other county agencies, chambers of commerce, tourism organizations, DNR, DOT and others) to develop maps and brochures detailing walks in the area for fitness, recreation and transportation.

Bicycle Facility Improvements

In order to form a well-connected non-motorized transportation system, the bicycle network was planned to utilize both on- and off-street facilities. The routes and facilities recommended within this plan have been determined keeping established transportation right-of-ways in mind. However, a mix of on-road and off-road facilities are recommended to accommodate the greatest range of age and experience levels.

Regardless of whether streets and roads are included in this plan’s designated bicycle network, bicyclists will use all available roads. Therefore, the recommended bicycle network has been developed primarily to:

- eliminate gaps within the current network
- facilitate the year-round use of facilities
- continue the expansion of the existing trail network
- formalize existing routes used by cyclists
- improve access and connectivity between municipalities within the Wausau MPO.

The recommended bicycle network is delineated on Maps 1-15 in Appendix B. Projects and costs are detailed in the Implementation Table (Table 8.3). Select projects are described in Appendix F.

8.3 Costs for Developing and Maintaining Facilities

Facility Development Costs

Costs for specific projects have been outlined the Implementation Table (Table 8.3) at the end of this chapter. Development costs were determined by using general estimates for a variety of facilities types. Cost assumptions are shown below.

Paved Facilities: \$150,000 per mile, including excavation, base course, asphalt, salvaged topsoil, and drainage (assume two pipes per mile).

Gravel Facilities: \$85,000 per mile, including excavation, base course, and salvaged topsoil.

Striping: \$1,320 per mile (epoxy) or \$530 per mile (paint).

Stencils: words each (\$60 epoxy, \$40 paint), symbols each (\$120 epoxy, \$70 paint), arrows each (\$120 epoxy, \$70 paint).

Signs: \$40 each sign, \$50 each post.

Facility Maintenance Costs

Per-mile maintenance costs can differ according to environmental conditions, like snow removal and economic factors. The following estimated costs were derived from various state and municipal sources and are given on a per mile/per year basis.

Bike Lanes and Wide Curb Lanes: \$1,500 per mile, including signs, striping, stencils and street sweeping (Arizona Highway Dept.)

Paved Paths: \$600 - \$900 per mile, including barriers, spot repairs, vandalism, striping stencils, clean-up and shoulder grading (MinDOT and C. Madison, WI)

Gravel Paths: \$1,200 - \$1,500 per mile, depreciation and spot repairs, signs, litter clean-up and mowing ditches (WDNR)

Shared Roadways: Negligible costs (less than 1% of the routine road costs, including sign repair, vegetation pruning and extra litter clean up)

These per-mile costs are generalized and do not include the maturation costs of reconstruction or the costs of snow removal activities.

Maintenance costs can be offset through cooperative agreements with private agencies. Adopt-a-Bikeway programs and other similar programs can provide reliable routine clean up and repair activities.

Implementation Costs for Pedestrian Facilities

In each municipality, it is recommended that one-quarter of all streets be studied annually to determine if pedestrian improvements are needed. "Improvements" include construction, maintenance and replacement. If there is a gap in the sidewalk network, or a pedestrian system needs to be put in place, this information will show up during the inventory process. If it is determined that sidewalks are needed to promote more walking trips, then the community should add them, drawing from funds set aside for this purpose. Each municipality is encouraged to include in their annual budget a specific and appropriate sum of money to maintain existing sidewalks and install new sidewalks. For instance, following a Walking Workshop, the City of Wautoma (population 1,998) allocated \$50,000 to improve sidewalks and start the inventory process.

The purpose of a sidewalk system inventory process is to ensure that every four years each municipality completes an analysis of its entire community.

8.4 Funding Opportunities

Marathon County and member communities of the Wausau MPO should appropriate annual funds for bicycle and pedestrian improvements just as it does for other roadway projects. In addition, bicycle and pedestrian projects may be eligible for state or federal funding. Pedestrian improvements that benefit public health and safety should be funded through the general fund, supplemented by available state and federal grants, rather than through assessment.

As part of the state and federal initiatives to enhance bicycling and walking as transportation modes, several grants and funding sources are available to communities in the metro area for planning, facility development, and land acquisition. Although some grants may be available for improving on-street facilities, opportunities to fund off-street facilities (such as bicycle paths) are substantial—particularly if the facility is intended to provide both utilitarian and recreational benefits.

Federal transportation enhancement programs, most recently reauthorized as SAFETEA-LU, have helped fund many bicycle and pedestrian transportation activities throughout the United States. Similarly, Wisconsin has approved the funding of many community projects. Local officials in the metro area should work with the WisDOT North Central Region to ensure that pedestrians and bicycles are accommodated on state trunk and connecting highway projects, both urban and rural. The Wisconsin DOT has funding to complete these types of improvements.

Off-street paths may have overlapping recreational and transportation value. For these bicycle improvements, the Wisconsin Department of Natural Resources' Stewardship Program may be an appropriate source of funding. In addition, impact fees provide a potential source of funding for multi-use paths both within and connecting to residential subdivisions. Current ordinances permit the use of impact fees by municipalities for transportation improvements as well as for parks and recreational facilities. Multi-use paths serve both a transportation and recreational function and therefore impact fees are an appropriate source of funding.

Alternate funding strategies through private interests should also be considered. Local private interests will benefit from an improved system that offers transportation choices and attracts tourists to the area. Private agencies that share the MPO's vision for an integrated bicycle system may be willing to invest in development or maintenance of facilities. These private partnerships should be explored to provide better bicycle facilities.

Specific Funding Opportunities

The following programs provide funds for bicycle and pedestrian improvements.

Local Transportation Enhancements (TE)

Program Description: Transportation enhancements (TE) are transportation-related activities that are designed to strengthen the cultural, aesthetic, and environmental aspects of transportation systems. The transportation enhancements program provides for the implementation of a variety of non-traditional projects, with examples ranging from the restoration of historic transportation facilities, to bike and pedestrian facilities, to landscaping and scenic beautification, and to the mitigation of water pollution from highway runoff. Most of the projects awarded in Wisconsin have been for bicycle and pedestrian facilities. Examples of bicycle and pedestrian projects include: multi-use trails, paved shoulders, bike lanes, bicycle route signage, bicycle parking,

overpasses/underpasses/bridges, sidewalks, and pedestrian crossings. Local municipalities contribute 20% of the project costs.

Transportation enhancement activities must relate to surface transportation. Federal regulations restrict the use of funds on trails that allow motorized users, except snowmobiles.

Contact Joe Benbenek at WisDOT North Central Region at 715-365-5714 or joseph.benbenek@dot.state.wi.us or John Duffee, State Coordinator at 608-264-8723 or john.duffee@dot.state.wi.us

Bicycle and Pedestrian Facilities Program (BFPF)

Program description: Bicycle and pedestrian facility projects costing \$200,000 or more and planning projects costing \$50,000 or more are eligible for BFPF funds. To be eligible, the project must be usable when it is completed and not staged so that additional money is needed to make it a useful project. A project sponsor must pay for a project and then seek reimbursement for the project from the state. Federal funds will provide up to 80% of project costs, while the sponsor must provide at least the other 20%. Because of the similarities between the BFPF and the Transportation Enhancements (TE) program objectives and eligibility criteria, applications and funding for both programs are undertaken together.

Contact: Joe Benbenek at WisDOT North Central Region at 715-365-5714 or joseph.benbenek@dot.state.wi.us or John Duffee, State Coordinator at 608-264-8723 or john.duffee@dot.state.wi.us

Surface Transportation Program (STP) Urban

Project Description: This program allocates federal funds to complete a variety of improvements to federal-aid-eligible roads and streets in urban areas. Projects must meet federal and state requirements, which are detailed here: <http://www.dot.state.wi.us/localgov/highways/stp-urban.htm>. Communities are eligible for funding on roads functionally classified (collector or arterial). The WisDOT requires that pedestrian and on-street bicycle accommodations be part of all STP projects and STP-Rural projects within or in the vicinity of population centers, unless extraordinary circumstances can be demonstrated to WisDOT for not providing these accommodations.

Contact: Paul Wydeven at the Wisconsin DOT at 608-266-1535 or paul.wydeven@dot.state.wi.us or Joe Benbenek at the WisDOT North Central Region at 715-365-5714 or joseph.benbenek@dot.state.wi.us

Surface Transportation Program (STP) Rural

Project Description: This program allocates federal funds to complete a variety of improvements to federal-aid-eligible roads and streets outside of urban areas, primarily county trunk highways. The program funds roads functionally classified as principal arterial, minor arterial, and major collector. The WisDOT requires that pedestrian and on-street bicycle accommodations be part of STP-Rural projects within or in the vicinity of population centers, unless extraordinary circumstances can be demonstrated to WisDOT for not providing these accommodations. For more information, visit:

<http://wisconsin.gov/localgov/docs/stp-rural.pdf>. The 2009-2012 program cycle will award \$29,375,120.

Contact: Paul Wydeven at the Wisconsin DOT at 608-266-1535 or paul.wydeven@dot.state.wi.us or Joe Benbenek at the North Central Regional Wisconsin DOT office at 715-365-5714 or joseph.benbenek@dot.state.wi.us

Robert Wood Johnson Foundation (RWJF)

Project Description: One of the largest foundations in the country, the Robert Wood Johnson Foundation offers grants that address public health issues, such as childhood obesity and asthma. Bicycle and pedestrian facilities qualify for RWJF funding.

Contact: Robert Wood Johnson Foundation <http://www.rwjf.org/applications/index.jsp>

Hazard Elimination Program

Program Description: Bicycle and pedestrian projects are now eligible for this program. This program focuses on projects in areas with a documented history of bicycle and/or pedestrian crashes with automobiles.

Contact: Brent Matthews at WisDOT North Central Region at 715-421-8312

Wisconsin Department of Natural Resources Stewardship Program

Program Description: Stewardship funds are intended to support the development of “nature-based” recreational facilities. Stewardship grants have been used to implement hiking and biking trails and otherwise facilitate active recreation. Local municipalities or the grant applicant is responsible for 50% of project costs.

Contact: Brigit Brown, State Trails Administrator, Bureau of Parks & Recreation, Wisconsin Department of Natural Resources at 608-266-2183 or brigit.brown@wisconsin.gov

Wisconsin DNR Recreational Trails Grant

Program Description: Recreational Trails grants provide funding to build off-street trails for both motorized and non-motorized transportation. Local municipalities or the grant applicant is responsible for 50% of project costs.

Contact: Brigit Brown, State Trails Administrator, Bureau of Parks & Recreation, Wisconsin Department of Natural Resources at 608-266-2183 or brigit.brown@wisconsin.gov

Safe Routes to School (SRTS)

Program Description: Safe Routes to School aims to increase walking and bicycling to school. Safe Routes to School programming is gaining traction across the country largely as a result of national trends in health, safety, the environment, and land use, and substantial federal funding. The 2005 passage of the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU) institutionalized Safe Routes to School by allocating \$612 million among the fifty states. These funds have been distributed to states based on student enrollment, with no state receiving less than \$1 million per year from

2005-2009. SRTS funds can be used for both infrastructure projects and non-infrastructure activities within 2 miles of elementary and middle schools. Safe Routes to School grants fully fund accepted projects.

Contact: Renee Callaway, Wisconsin Safe Routes to School Coordinator, Wisconsin Department of Transportation at 608-266-3973 or renee.callaway@dot.state.wi.us

8.5 Implementation Plan

The success of this plan is largely dependent on the actions and support of local people. Implementation of highway improvements, bike facilities, and programs are the responsibility of local individuals, businesses, towns, cities and villages, the County and the State. The following actions identify strategies to grow local interest in enhancing walking and bicycling in the Wausau area.

General Actions

Individuals

- Increase the frequency of bicycling or walking trips per week and then encourage family members to do the same.
- Wear a helmet when bicycling and respect the rules of the road.
- Talk to employers about providing incentives and bicycle parking facilities.
- Form a local bicycle focus group in each community. The purpose of this group would be to influence local policies and capital improvement project decisions.
- Beautify a walking route, e.g., by planting flowers or a garden, or place a bench in a strategic resting spot.

Commercial Businesses

- Encourage employees to bicycle and walk to work by offering incentives and by providing needed facilities at the workplace such as bicycle parking and improved connections.
- Sponsor bicycling promotional activities like "Bike Rodeos" and "Bike to Work Days" to show support and create enthusiasm.
- Promote the use of the Bicycle Commuter Tax Provision (to be implemented in January 2009).

Health and Educational Institutions

- Offer bicycling and pedestrian education curricula.
- Start a Safe Routes to School campaign at the local grade school or school district.
- Promote Walk/Bike to School/Work days and weeks.
- Work with local health organizations to increase the availability of programs, information, and organizational capacity to hold and market events.

Municipalities

- Integrate bicycling and walking into the county comprehensive transportation and land-use plans.
- Promote bicycling through special events.
- Improve facilities for bicyclists and integrate improvements into the Capital Improvement Plan.
- Provide mapping and signing that helps bicyclists get around the community.
- Act as a "clearinghouse" for bicycle and pedestrian related information.
- Annually monitor the progress of projects and evaluate existing facilities, plan for new development and explore funding sources.

- Develop a bicycle and pedestrian subcommittee to coordinate local bicycle and pedestrian improvements and coordinate with the MPO on multimodal transportation initiatives. This committee should be part of a transportation committee as opposed to recreation committee to emphasize biking and walking as transportation alternatives, not just recreational pursuits.

Marathon County

- Continue to integrate bicycling into the overall county transportation, recreation and land use plans.
- Promote bike facilities that will connect communities and regional destinations.
- Provide mapping and signage that helps bicyclists find their way around the county.

Wausau MPO

- Maintain the Bike/Ped Committee to act as a clearinghouse for bicycle and pedestrian information at the metro level and to monitor and implement the plan and act as resource for community efforts.
- Provide bicycle and pedestrian facilities direction and review. Work with member communities to design unique signage.
- Maintain ongoing community dialogue between local groups, communities, and special interests.
- Review the Wausau MPO Bicycle and Pedestrian Plan every two years.
- Update the Wausau MPO Bicycle and Pedestrian Plan every five years to ensure integrity and determine priorities. Give the Committee the responsibility to meet, discuss, and implement changes or amendments to the Plan in between the five-year update as necessary.

State

- Respond to the needs of local bicyclists and pedestrians by providing appropriate accommodations on state trunk and connecting highways.
- Provide technical information to local units of government.

Amendment Process

The Bicycle and Pedestrian Plan is a staged, multi-year, multimodal program of transportation projects developed to create and enhance the bicycling and walking network in the Wausau area. The Bicycle Pedestrian Plan was developed by the MPO through its Technical Advisory Committee (TAC) and its Bicycle and Pedestrian Sub-committee.

The Bicycle and Pedestrian Plan should be reviewed in its entirety with a full update every 5 years. The updates should be done to utilize any statistical data that may be obtained from the decennial census. The next update should be in 2014.

Amendments to documents such as the Bicycle and Pedestrian Plan are occasionally necessary after they have been adopted. Amendments may be appropriate throughout the lifecycle of the plan, particularly if new issues emerge or trends change, due to new requirements and needs, the implementation of improvements, and the completion of more specific studies or plans in the metro area. Large-scale changes or frequent amendments to meet individual transportation challenges should be avoided or the plan will lose its integrity. Although the plan recommends specific projects for the communities to engage in, changes to the plan to account for every new project being proposed by individual communities should not be considered without a review of the overall plan. This plan is a guideline for the

MPO communities to follow; it is not just an accounting of projects to be built or an instrument to obtain funding.

The Amendment process is as follows:

- A community or group, through its community, will bring a recommendation or proposed amendment to the Bicycle and Pedestrian Sub-committee for their review and comment.
- The Bicycle and Pedestrian Sub-committee will bring its recommendations on the proposed amendment to the MPO TAC for their review.
- The MPO TAC will make a recommendation on the proposed amendment to the MPO for its approval.
- The MPO review will entail an announcement of the proposed amendment through the Wausau Daily Herald newspaper.
- The public comment period on the proposed amendment will last a minimum of thirty (30) days.
- The public review will be held before the MPO takes its final action on the proposed amendment.
- Upon approval by the MPO, the amendment will be included in the current version of the Bicycle/Pedestrian Plan.

Implementation Table

The following table schedules area wide on- and off-street bicycle and pedestrian facility improvements into four (4) five-year time frames, and identifies specific roles and responsibilities for implementation (including costs and funding sources).

Recommendations are divided into one of the four (4) five-year time frames based on their capacity to meet plan goals and objectives. In particular, the recommendations were prioritized to reduce gaps in the existing bicycle and pedestrian transportation network, connect MPO communities, increase the quantity, pleasure, and safety of bicyclists and pedestrians within the MPO, and enhance bicycle and pedestrian travel as an economic asset to the community.

Improvement suggestions from the consultant (Schreiber/Anderson Associates; Bicycle Federation of Wisconsin), the MPO Bike/Ped Committee, and the general public were also taken into consideration in generating and prioritizing projects for the implementation table. Five-year recommendations are viewed as the most vital for fulfilling the short-term goals of the Bike/Ped Committee, especially promoting increased connectivity to key destinations. Recommendations within the first five-year timeframe also represent existing planned projects that will soon be implemented. Other timeframes, such as the 10- and 20-year recommendations, are longer-term desires requiring a more sustained effort to implement and/or fund.

Table 8.3 consolidates physical improvements detailed elsewhere in this chapter into 5-, 10-, 15- and 20-year increments. The left column of the table indicates when to pursue the proposed recommendation, e.g. 5 years, 10 years, or 20 years. The segment of roadway recommended for improvement is listed under "Street Name" and is identified by the column labeled "Limits" (the beginning and end of each segment). The proposed recommended improvement is detailed under "Recommendation" with the entity responsible for implementing the recommendation identified under "Implementing Agency". The length of the improvement is designated in feet and was extracted from GIS data.

Particular care should be taken when considering the total project cost shown in the column entitled “Total Cost” as these numbers are estimates and subject to unforeseeable market fluctuations and specific site conditions analysis, which are beyond the scope of this plan. For example, a detailed study of storm water management, special design or engineering requirements, demolition issues, topography concerns, unique landscaping, and the location of existing and future utility lines was not undertaken for each recommendation and will undoubtedly alter the estimated project cost somewhat. The costs provided are for preliminary planning purposes only and have not been altered for inflation. The “Funding Opportunities” column outlines strategies for funding the proposed recommendation. Refer to the Section 8.4 in this chapter for a detailed description of these potential funding sources. The final column references project sheets where more detailed information regarding the recommended facility improvement may be found.

Table 8.3: Implementation Table for On- and Off-Street Facility Improvements								
	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
5-Year	Sherman St	28 th Ave to 1 st Ave	Sidewalk from 28 th Ave to 17 th Ave	City of Wausau	4000	\$80,000	BPFP, RWJF, TE, STP-Urban, Local	1
			On-street striped bicycle accommodations & sign bicycle route from 28 th Ave to 1 st Ave		8400	\$134,400		
	1st Ave	Thomas St. to W. Union Ave.	Stripe on-street bicycle accommodations & sign	City of Wausau	9700	\$9,700	BPFP, RWJF, TE, Hazard Elimination Program,	3
	3rd Ave	Thomas St. to W. Union Ave.	Stripe on-street bicycle accommodations & sign	City of Wausau	9700	\$9,700	BPFP, RWJF, TE, Hazard Elimination Program,	3
	Bridge St	Westwood Dr. to 3 rd Ave	Stripe on-street bicycle accommodations & sign bicycle route	City of Wausau	5600	\$5,600	BPFP, RWJF, TE, Hazard Elimination Program, SRTS, STP-Urban, Local	5
	Stewart Ave	17 th Ave to 48 th Ave	On-street striped bicycle accommodations & sign bicycle route	City of Wausau	10800	\$172,800	BPFP, RWJF, TE, SRTS, STP-Urban, Local	7
			Install zebra stripe crosswalk and signage to connect cul-de-sac with Marathon Park		100	\$1,400		
	Main St	Water St to Old Hwy 51	On-street 5 ft. urban paved striped shoulders (scheduled construction in 2008-10) & sign bicycle route	City of Mosinee / WisDOT	1800	\$90,000	BPFP, RWJF, TE, WisDOT, Local	8
			10 ft. sidewalk along southside (schedule construction in 2008-10)		1800	\$72,000		
	CTH N	Park Rd to Lily Ln.	Stripe on-street bicycle accommodations & sign bicycle route	Town of Rib Mountain	1000	\$16,000	Local	

5-Year	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
	CTH R	CTH NN to Park Rd	Stripe on-street bicycle accommodations & sign bicycle route	Town of Rib Mountain	6300	\$100,800	Local	
	CTH NN	CTH O to CTH R	Pave six-foot shoulder from town limits to CTH R	Marathon County	15450	\$247,200	BPFP, RWJF, TE, STP-Urban, STP-Rural	11
			Reconstruct CTH NN from town limit to V Marathon City		25660	\$410,560		
	CTH N	CTH KK to Thornapple Rd.	On-street striped bicycle accommodations & sign bicycle route or paved shoulders	Marathon County	14900	\$238,400	BPFP, RWJF, TE, SRTS, STP-Rural, Local	11
	CTH X	Ross Ave to Northwestern Ave	Off-street path (scheduled construction in 2011)	Village of Weston / Marathon County	5200	\$62,400	STP-Urban, Local	9
	Mountain Bay Trail	Existing trail head to Schofield Triangle	Extend rail-with-trail off-street path	Marathon County	8600	\$232,200	BPFP, RWJF, TE, DNR Stewardship Program, DNR Recreational Trails Grant	9
	Old Highway 51/ Bus 51	Maple Ridge Rd to W Grand Ave	On-street striped bicycle accommodations & sign bicycle route	V Kronenwetter / V Rothschild / WisDOT	28000	\$448,000	BPFP, RWJF, TE, SRTS, STP-Urban, Local	
	17 th Ave	Rosecrans St. to Bridge St	On-street striped bicycle accommodations & sign bicycle route	City of Wausau	6800	\$340,000	BPFP, RWJF, TE, Hazard Elimination Program, SRTS, STP-Urban, Local	
	51/29 Trail	Eagle Ave to Morning Glory Ln	Off-street path	Town of Rib Mountain	3700	\$99,900	BPFP, RWJF, TE, Local	
Rib Mountain State Park to Violet Ln	Park Rd	Off-street pedestrian-only path	Town of Rib Mountain / WiDNR	9000	\$243,000	BPFP, RWJF, DNR Stewardship Program, DNR Recreational Trails Grant, Local		

5-Year	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
	28 th Ave	Sherman St to Stewart Ave	Off-street 10' path and wide curb lanes (scheduled construction in 2009)	WisDOT	1600	\$43,200	BPFP, RWJF, TE, STP-Urban	2
	28 th Ave	Stewart Ave to CTH U	On street striped bicycle accommodations & sign bicycle route	Marathon County	17900	\$895,000	BPFP, RWJF, TE, STP-Urban, SRTS, Local	2
	Kowalski Rd	Old Highway 51 to Kronenwetter Drive	4 to 5' urban paved striped shoulders (scheduled construction in 2008) & sign bicycle route	Village of Kronenwetter/WisDOT	3100	\$155,000	BPFP, RWJF, TE, WisDOT, Local	10
			9' sidewalk on northside (scheduled construction in 2008)		3100	\$111,600		
	Rib Mountain Dr. / McCleary Bridge / 17 th Ave.	Goose Ln. to Sherman St.	Stripe on-street bicycle accommodations & sign bicycle route	WisDOT	5900	\$94,400	BPFP, RWJF, TE, WisDOT	
	CTH K/Bus 51	20 th Ave. to Campus Drive	On-street striped bicycle accommodations & sign bicycle route	WisDOT	2400	\$120,000	BPFP, RWJF, TE, WisDOT	
			Sidewalks		2400	\$48,000		
			Interchange replacement scheduled for 2013		TBD	TBD		
	CTH U	18 th Ave. to Arlington Ln.	On-street striped bicycle accommodations & sign bicycle route (scheduled construction in 2013)	City of Wausau / WisDOT	1200	\$60,000	BPFP, RWJF, TE, WisDOT, Local	
Sidewalks			1200		\$24,000			
Overpass bridge replacement scheduled for 2013			TBD		TBD			
Bopf St.	17 th Ave. to 3 rd Ave.	Sign bicycle route	City of Wausau	4200	\$4,200	BPFP, RWJF, TE, Local, STP-Urban		

5-Year	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
	Main St.	Rangeline Rd. to 5 th St.	Stripe on-street bicycle accommodations & sign bicycle route	City of Mosinee	6800	\$108,800	BPFP, RWJF, TE, STP-Rural, STP-Urban, Local	
	Old 51	STH 153 to Maple Ridge Rd.	Sign bicycle route	City of Mosinee	10,500	\$10,500	BPFP, RWJF, TE, STP-Rural, STP-Urban, Local	
	Rangeline Rd. / Moon Rd.	CTH B to CTH O	Sign bicycle route	City of Mosinee / Town of Mosinee	15,000	\$15,000	BPFP, RWJF, TE, STP-Rural, Local	
	W. Grand Ave.	Bus 51 to Bus 51	Sign bicycle route	Village of Rothschild / City of Schofield	16,000	\$16,000	BPFP, RWJF, TE, STP-Rural, Local	
	Rib Mountain Path	Trillium Ln to Foxglove Rd	Off-street path	Town of Rib Mountain	9300	\$251,100	BPFP, RWJF, TE, DNR Recreational Trails Grant, Local	
	Weston Ave.	Alderson St. to Birch St.	On-street striped bicycle accommodations (scheduled construction in 2009) & sign bicycle route	Village of Weston	2700	\$135,000	STP-Urban, Local	
			Sidewalks		2700	\$54,000		
	Maple Ridge Rd.	Old Hwy. 51 to Field Rd	On-street striped bicycle accommodations & sign bicycle route (scheduled construction in 2012)	WisDOT	1000	\$50,000	BPFP, RWJF, TE, WisDOT	
			Sidewalks		1000	\$20,000		
Martin Rd.	Creek Rd. to Kronewetter Village limits	Sign bicycle route	Village of Kronewetter	21,100	\$21,100	BPFP, RWJF, TE, Local		
32 nd Ave.	CTH WW to CTH K	Sign bicycle route	Town of Maine	4300	\$4,300	BPFP, RWJF, TE, Local		
Merrill Ave./28 th Ave.	CTH K to CTH U	Sign bicycle route	Town of Maine	3000	\$3,000	BPFP, RWJF, TE, Local		

5-Year	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
	Decator Dr.	28 th Ave. to 14 th Ave.	Sign bicycle route	Town of Maine	4000	\$4,000	BPFP, RWJF, TE, Local	
	Foxglove Rd.	Azalea Rd. to N. Buttercup Rd.	On-street striped bicycle accommodations & sign bicycle route (scheduled construction in 2012)	Town of Rib Mountain	800	\$12,800	BPFP, RWJF, TE, WisDOT, Local	
	Azalea Rd. / Sunrise Dr.	Foxglove Rd. to Lakeshore Dr.	On-street striped bicycle accommodations & sign bicycle route	Town of Rib Mountain	9100	\$145,600	BPFP, RWJF, TE, WisDOT, Local	
	CTH U/Merrill Ave	28 th Ave to 18 th Ave. & Arlington Ln. to Fernwood Dr.	On-street striped bicycle accommodations & sign bicycle route	City of Wausau / Town of Maine	3500	\$56,000	BPFP, RWJF, TE, SRTS, STP-Urban	
			Sidewalks from Arlington Ln. to Fernwood Dr		1730	\$34,600		
	Ross Ave	Kramer Ln to S Grand Ave	On-street striped bicycle accommodations & sign bicycle route	C Schofield/ V Weston/ T Weston	22000	\$352,000	BPFP, RWJF, TE, Local	
	Heuss St	Alta Verde St to Volkman St	Sign bicycle route	City of Schofield	2700	\$2,700	BPFP, RWJF, TE, STP-Urban, Local, SRTS	
	Normandy St	Heuss St to Schofield Ave	Sign bicycle route	City of Schofield	4600	\$4,600	BPFP, RWJF, TE, STP-Urban, Local, SRTS	
	Robin Ln	US 51 to Rib Mountain Drive	Off-street path path (USH 51 to Eagle Ave.)	Town of Rib Mountain	1700	\$45,900	SRTS	
Sidewalk (Eagle Ave. to Rib Mountain Dr.)			1700		\$34,000			
STH 52	18 th Ave to 17 th Ave	On-street striped bicycle accommodations	WisDOT	530	\$600	WisDOT		
		Sidewalks		530	\$10,600			
		Pedestrian crossings at 17 th and 18 th Ave intersections		530	\$600			
28 th Ave	CTH R to Sherman St	Striped bicycle accommodations	Marathon County	3100	\$49,600	Local		

10-Year	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
	5 th St	Forest St to Bridge St	On-street striped bicycle accommodations & sign bicycle route	City of Wausau	6200	\$6,200	BPFP, RWJF, TE, Hazard Elimination Program, SRTS, STP-Urban, Local	3
	6 th St	Forest St to Evergreen Rd.	On-street striped bicycle accommodations & sign bicycle route	City of Wausau	8600	\$8,600	BPFP, RWJF, TE, Hazard Elimination Program, SRTS, STP-Urban, Local	3
	Kowalski Rd	Kronenwetter Drive to CTH X	On-street striped bicycle accommodations & sign bicycle route	Village of Kronenwetter	8400	\$420,000	BPFP, RWJF, TE, SRTS, STP-Urban, Local	10
			Sidewalk		8400	\$168,000		
	Thomas St	17 th Ave to Grand Ave (including bridge)	On-street striped bicycle accommodations & sign bicycle route	City of Wausau	8800	\$440,000	BPFP, RWJF, TE, Hazard Elimination Program, SRTS, STP-Urban, Local	4
	Military Rd	Bus 51 to Charles St	Off-street path linking W & E Military Rd	Village of Rothschild	1000	\$27,000	BPFP, RWJF, TE, Local	10
	Weston Ave	Alderson St to Birch St	Extend off-street path	Village of Weston	2700	\$72,900	BPFP, RWJF, TE, STP-Urban, Local	
	Weston Ave	CTH X to CTH J	On-street striped bicycle accommodations & sign bicycle route	Village of Weston	19400	\$310,400	BPFP, RWJF, TE, Local	
	Weston Ave	Alderson St to Bus. 51	On-street striped bicycle accommodations & sign bicycle route	Village of Rothschild	8800	\$140,800	BPFP, RWJF, TE, STP-Urban, Local	
CTH J	Weston Ave to River Rd	On-street striped bicycle accommodations & sign bicycle route	Marathon County	6600	\$105,600	BPFP, RWJF, TE, STP-Urban, Local		
Bittersweet Rd	CTH N to Rib Mountain State Park	On-street striped bicycle accommodations & sign bicycle route	Town of Rib Mountain	2500	\$40,000	BPFP, RWJF, TE, Local		

	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
10-Year	CTH K/ Bus 51	20 th Ave to Hillcrest Dr & Campus Dr to Merrill Ave / Fernwood Dr	On-street striped bicycle accommodations & sign bicycle route	City of Wausau	15,600	\$249,600	BPFP, RWJF, TE, STP-Urban, STP-Rural, Local	
			Sidewalks from Campus Dr. to Merrill Ave/Fernwood Dr		2,000	\$40,000		
	Rib Mountain Dr	Morning Glory Ln to Robin Ln	On-street striped bicycle accommodations & sign bicycle route	Town of Rib Mountain	5700	\$285,000	BPFP, RWJF, TE, STP-Urban, Local	
			Sidewalk on east side from Oriole to Cloverland Ln. (planned 2009-10 construction)		2500	\$50,000		
	E Kent St	Coel Blvd to Northwestern Ave	Off-street path	City of Wausau	2200	\$59,400	BPFP, RWJF, TE, Local	
	Volkman St.	Military Rd to STH 29 overpass	On-street striped bicycle accommodations & sign bicycle route	Village of Rothschild	7000	\$112,000	BPFP, RWJF, TE, STP-Urban, Local, SRTS	
Kort St / Jelinek St	S Grand Ave / Park St to Birch St	On-street striped bicycle accommodations & sign bicycle route	Village of Rothschild / City of Schofield/ V Weston	5700	\$91,200	BPFP, RWJF, TE, STP-Urban, Local, SRTS		
15-Year	STH 52 / E. Wausau Ave.	5 th St to CTH J	On-street striped bicycle accommodations & sign bicycle route	WisDOT	33000	\$528,000	BPFP, RWJF, TE, SRTS, WisDOT	
	Ski Hill Trail	Robin Ln to Rib Mtn Way	Off-street path	Town of Rib Mountain	8800	\$237,600	BPFP, RWJF, TE, Local	
	CTH KK	CTH B to Burma Rd	On-street striped bicycle accommodations & sign bicycle route	Marathon County	12800	\$204,800	BPFP, RWJF, TE, STP-Rural, Local	14

	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
15-Year	CTH W	Meadow Rd to CTH WW	On-street striped bicycle accommodations & sign bicycle route	Marathon County	22400	\$358,400	BPFP, RWJF, TE, SRTS, STP-Urban, STP-Rural, Local	
	CTH WW	RR tracks (north of East St., Brokaw) to CTH K	On-street striped bicycle accommodations & sign bicycle route	Marathon County	10,700	\$171,200	BPFP, RWJF, TE, STP-Rural, Local	
	STH 153	Main St to CTH O and Old 51 to CTH X	On-street striped bicycle accommodations & sign bicycle route	WisDOT	36700	\$587,200	BPFP, RWJF, TE, SRTS, WisDOT	
	Off-Street Path	Kowalski Rd to CTH XX	Off-street path and/or sidewalks	Village of Kronewetter	6000	\$162,000	BPFP, RWJF, TE, Local	
20-Year	Rail-with-Trail along	Military Rd to Schofield Triangle	Extend rail-with-trail off-street path to link Rib Mountain, Rothschild, Schofield & Wausau	Marathon County/ Town of Rib Mountain / City of Schofield	11000	\$297,000	BPFP, RWJF, TE, DNR Recreational Trails Grant, Local	
	River Edge	Thomas St to Bridge St	Off-street path along both sides of river edge	City of Wausau	4200	\$113,400	BPFP, RWJF, TE, DNR Recreational Trails Grant, Local	
	Western Leg	72 nd Ave to River Dr	Rail-with-trail off-street path linking industrial park to downtown	City of Wausau	17000	\$459,000	BPFP, RWJF, TE, DNR Recreational Trails Grant	
	Schofield Ave.	CTH J to Alderson St	On-street striped bicycle accommodations & sign bicycle route	Village of Weston	20600	\$329,600	BPFP, RWJF, TE, STP-Urban, Local	
			Sidewalks		20600	\$412,000		
CTH X	Bull Junior Creek Bridge to STH 153	On-street striped bicycle accommodations & sign bicycle route	Marathon County	28000	\$448,000	BPFP, RWJF, TE, STP-Urban, STP-Rural, Local		

20-Year	Street Name	Limits	Recommendation	Implementing Agency	Length (in feet)	Total Cost	Funding Opportunities	Project Sheet
	CTH X	Northwestern Ave to STH 52	On-street striped bicycle accommodations & sign bicycle route	Marathon County	20800	\$332,800	BPFP, RWJF, TE, STP-Urban, Local	
	CTH U/Merrill Ave	28 th Ave to 18 th Ave. & Arlington Ln. to Fernwood Dr.	On-street striped bicycle accommodations & sign bicycle route	Marathon County	4500	\$72,000	BPFP, RWJF, TE, SRTS, STP-Urban	
	Swan Ave	Oriole Ln to Morning Glory Ln	On-street striped bicycle accommodations & sign bicycle route	Town of Rib Mountain	3900	\$62,400	BPFP, RWJF, TE, Local	
	Rib Mountain Path	Lilac Ave to Liberty Park on old STH 29 ROW	Off-street path	Town of Rib Mountain	3100	\$83,700	BPFP, RWJF, TE, Local	
	Rib Mountain Dr	Robin Ln to Goose Ln	On-street striped bicycle accommodations & sign bicycle route	Town of Rib Mountain	1100	\$55,000	BPFP, RWJF, TE, STP-Urban, Local	
			Sidewalks		1100	\$22,000		
	River Edge	Radtke Park to Memorial Park to Fairmount St	Off-street path	City of Wausau	14200	\$170,400	BPFP, RWJF, TE, DNR Recreational Trails Grant, Local	6
Maple Ridge Rd	Kronewetter Dr. to CTH X	On-street striped bicycle accommodations & sign bicycle route	Village of Kronewetter	13600	\$217,600	BPFP, TE, Local		

Table 8.3.1: Actual Facilities Improvements Totals by 5-Year Increment

Timeframe	Cost
5-Year	\$6,011,860
10-Year	\$2,626,700
15-Year	\$2,249,200
20-Year	<u>\$3,074,900</u>
Total	\$13,962,660

Table 8.3.2: Estimated Facilities Improvements Totals by Implementation Agent in 5-Year Increments					
	5-Year	10-Year	15-Year	20-Year	Totals
WisDOT	\$841,733	\$0	\$1,115,200	\$0	\$1,956,933
Marathon County	\$2,104,160	\$105,600	\$734,400	\$1,149,800	\$4,093,960
City of Wausau	\$837,800	\$803,800	\$0	\$742,800	\$2,384,400
City of Schofield	\$132,633	\$30,400	\$0	\$0	\$163,033
City of Mosinee	\$198,800	\$0	\$0	\$0	\$198,800
Village of Weston	\$337,533	\$413,700	\$0	\$741,600	\$1,492,833
Village of Rothschild	\$157,333	\$310,200	\$0	\$0	\$467,533
Village of Kronenwetter	\$282,033	\$588,000	\$162,000	\$217,600	\$1,249,633
Town of Rib Mountain	\$949,100	\$375,000	\$237,600	\$223,100	\$1,784,800
Town of Maine	\$11,300	\$0	\$0	\$0	\$11,300
Town of Mosinee	\$42,100	\$0	\$0	\$0	\$42,100
Town of Weston	\$117,333	\$0	\$0	\$0	\$117,333
Totals	\$6,011,860	\$2,626,700	\$2,249,200	\$3,074,900	\$13,962,660

Appendix A:

Stakeholder Interviews

Appendix A: Stakeholder Interviews

Introduction

On January 15, 2008, SAA staff (Reed Dunbar and Ann Freiwald) conducted interviews with twenty individuals representing groups or organizations with an interest in bicycle or pedestrian transportation within the Wausau area. The purpose of these interviews was to collect primary-level data regarding the current and future conditions for bicyclists and pedestrians within the planning area. A special emphasis was placed on collecting information about the attitudes toward these modes of transportation and the perceived adequacy of existing facilities. A summary of the interview process and results is provided below.

Protocol

The interviews were conducted over a one-day period with selected stakeholders identified as having interest, expertise, or insight into bicycle and pedestrian issues within the MPO. Every effort was made to reduce duplication of interviewees with members of the already established Bicycle/Pedestrian Committee charged with oversight of plan development. In some cases the agencies represented on the committee were interviewed when that entity was deemed the most appropriate source for desired information.

The standard interview protocol included informing each interviewee that their individual responses were confidential. The names and organizations of individuals who attended are included below; however, no quotes are attributed to specific individuals. It has been our experience that this promise of confidentiality is critical to obtaining forthright responses from interviewees. In order to maintain the credibility of this project with these key community leaders and stakeholders, the detailed responses were omitted from this report, and a summary of responses provided.

The following individuals participated in the interview process:

- Matt Block, Wausau Wheelers Bike Club
- Bill Duncanson, Wausau/Marathon County Parks, Recreation & Forestry Department
- Gary Freels, Alexander Foundation
- Judy Fries, Kronenwetter Parks
- Greg Gaetzman, North Central Health Care
- Sue Gantner, HEAL Coalition
- Jeff Gates, City of Mosinee
- Dot Kalmon, Marathon County Health Department
- Gerry Klein, Town of Rib Mountain
- Peggy Kurth, Marathon County Aging and Disabilities Resource Center
- Kevin Lang, Marathon County Highway Department
- Aaron Nelson, D.C. Everest Area School District
- Helen Pagenkopf, Friends of the Mountain-Bay Trail
- Mark Parman, Town of Maine
- George Peterson, Village of Rothschild
- Andrew Plath, Friends of the Mountain-Bay Trail
- Gaylene Rhoden, Town of Rib Mountain
- Dennis Saager, Wausau Police Department
- Darien Schaefer, Wausau/Central Wisconsin Convention & Visitors Bureau
- Jean Tehan, Community Foundation of NC Wisconsin

Each interview lasted about one hour although overage did occur due to the number and willingness of interviewees to provide detailed explanations to their responses. A combination of questions were posed from scaled-response to open ended interrogatives. As anticipated, not all questions were equally applicable to every interviewee, and more or less time was spent on each set or grouping of questions depending on the nature of the group (i.e. more time spent asking about organizational capacity for “Recreation” group than for “Local Government” group).

Results

Several general trends emerged from the interview process. These include:

- Schools: there are special conditions that exist around many schools related to biking and walking. These areas should be addressed on a case by case basis.
- County Highways: these should include a wide paved and striped shoulder to the extent practicable in all areas.
- Roads in Urbanized Areas: should include a painted stripe where existing outside travel lane is wide enough to accommodate bicycle travel.
- Education: is necessary for all transportation users. Motorists need to be more aware of bicycle and pedestrian rights, and walkers and bikers need to use the transportation system correctly and safely. Increased education about transportation issues and options also has potential to provide momentum for increased bicycle and pedestrian facility development. There is also a lot of advocacy occurring currently, though increased efforts are desired.
- Funding: is a universal concern. A diversified approach to funding education, encouragement and engineering projects is preferred and more money is required to affect change.

Survey Information

The survey instrument used during the interview process appears below.

- I. Background
 1. Tell me about yourself.
 - i. Which municipality do you live in?
 - ii. How do you generally travel to work/school/shopping?
 - iii. Do you walk/bike often? Where?
 2. Tell me about your organization
 - i. What is your group doing as far as advocacy?
 - ii. Is there more you think you could be doing? What is holding you back?
 - iii. Is there a common complaint you hear from your members about biking in the area? About walking?
 - iv. Would you consider helping us distribute and collect a survey on biking and walking among your members?
 3. On a scale of 1 to 5, with 5 being the “highest” or the “best”:
 - i. How would you rate the “quality of life” in the Wausau Area?
 - ii. How would you rate the condition of the current transportation network?
 - iii. Where do you rate the importance of biking or walking as part of the transportation network?
 4. Name five “strengths” or “assets” about living in the Wausau Area
 5. Name five “weaknesses” or “liabilities” about living in the Wausau Area
- II. General
 1. Would you like to see more investment in roads, sidewalks, bikeways and transit?
 - 2a. Are there any safety or operational issues that you feel need to be addressed though this study?

2b. Do you have ideas or specific suggestions about how to address the issues you noted above?

III. Street Design

1. What works well today as it relates to bicycle and pedestrian access and circulation?
2. How do you feel about the local street design standards (lighting, sidewalks, street trees, etc.)?

IV. Access and Circulation

1. As properties develop (or redevelop), how should bicycle and pedestrian access be provided?
2. What level of importance should be placed on connecting bike/ped access to other neighborhoods, parts of the transportation network, or other destinations?

V. Multi-Modal Issues

1. How could local communities improve bicycle and pedestrian access and safety?
2. Would you be encouraged to bike around town if there were more bike lanes, racks or other bike amenities?
3. What are the primary factors discouraging you from walking or biking for more trips (truck traffic, lack of facilities, weather)?

VI. Funding

1. What is the best way to fund the improvements that will be identified in this plan?
2. Would you be willing to contribute a share to any locally funded portion of the improvements?
3. Should more monies be spent on bicycle and pedestrian improvements/connections?
If Yes: If doing so means a reduction in the funding for automobile facilities are you still in favor?
4. Would your organization be in favor of sponsoring/applying for grants or other funding through local, state, or federal programs?

Response Summary

Part 1: Background

Brief Introduction and Organizational Description

The purpose of this question is to serve as an “ice-breaker”, but also to allow the analyst to gain additional insight regarding the positions and interests of the interviewee. The discussion also informed other interviewees at each session about each of the others they were grouped with.

Common Complaints

This question sought to identify “common issues” in the Wausau area for biking and walking. The analyst was looking to identify overlap between groups through this question. Major areas of complaint included:

- System-wide, there is a lack of connectivity
- There is no respect for pedestrians, even in crosswalks
- No formal linkages to Mountain Bay Trail or 9-Mile Recreation Area
- Need safer pathways for senior/disabled community
- SRTS surveys revealed parents afraid of traffic speed and volume, weather
- Drop-off time in school zones can be dangerous

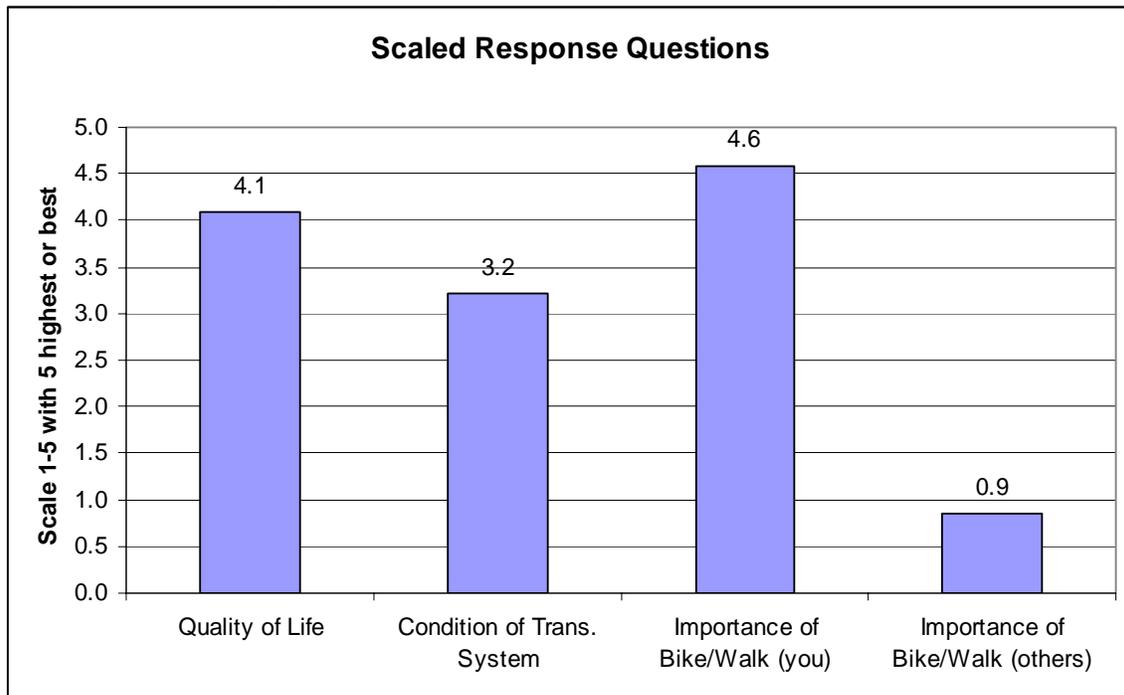
Advocacy

This question was posed to identify the local capacity for implementation of the plan. As it turns out, there are a lot of activities occurring now that helps to increase the awareness, safety, and volume of people biking and walking in the Wausau area. Due to time constraints, not all groups were asked this question. Some current activities include:

- Bike Rodeos
- Website hosting and updating
- National Trails Day, Free Park Day
- Fundraising
- Traffic enforcement

Scaled Response Questions

These are general questions intended to gather information about how people “feel” about life in the Wausau area. It was clear from the responses that people very much enjoy the area overall, but many feel biking and walking need to be improved. Those who really valued walking and biking as a daily activity rated the condition of biking and walking very low. Responses were scaled from 1 to 5 with 5 being the “best” or “highest”.



Part 2: General

Safety or Operational Issues

This question included a variety of responses about specific locations that could be improved, or general comments about how the entire system can work together more effectively.

- Grand Avenue is extremely difficult for walking/biking
- There is a lack of education: pedestrian, cyclist, motorist
- Most of the recent improvements are good; it's the older infrastructure that needs improvement
- Parking lots in “big box” stores lack walkways to entrance
- Rivers and topography is an issue throughout the area
- There are no bike lanes in the MPO

- Biking and walking as tourism cannot currently be competitively marketed
- Some areas need increased facilities because their use (schools, health clubs, libraries) generates increased foot or bike traffic

Recommended Improvements

As a follow up to the above question pertaining to problem areas, interviewees were asked if they knew of a solution to these issues. A sampling of their recommendations is listed below:

- Route bicycle and pedestrian traffic off of Grand Avenue
- County highways need paved and striped road shoulders
- Develop more facilities like on CTH “R” (sidepath and striped curblane)
- Grow the “green culture” and increase learning opportunities
- Experiment with rubber sidewalks (adds mobility, safety to senior/special needs populations)
- Greater understanding of the way neighborhoods are built affects transportation choice (include some sort of bike or pedestrian facility in all new developments; also a market advantage to doing this)
- Complete 25th Street by high school
- Stripe McCleary Bridge (and road segments before and after bridge)
- Develop on-street connections from USH 51 corridor to 9-Mile Recreation Area
- Emphasize waterways (esp. Wisconsin River) in new path development

Part 3: Street Design

What works well today?

This question was asked to generate a list of facilities that people like to use, or that work well. Successful facilities will be recommended for replication in developing or redeveloping areas. Some of the recommendations include:

- More facilities like CTH “R” (sidepath and striped curblane)
- Bridge Street works well, but they should stripe curblanes where sufficient space is available for bicycle travel
- CTH “KK” from CTH “N” to Burma Road was identified as a good facility
- There needs to be better marked/observed “school zones”
- Streets functioning as collectors and above should include facilities for bicycles and pedestrians

Part 4: Access and Circulation

As properties develop or redevelop, how should bicycle and pedestrian access be provided?

The question sought to record attitudes toward sidewalks, trails, and other facilities that could be included when new neighborhood development is approved. A summary of the results is provided below:

- Sidewalks are must for in urban areas (esp. for elderly); they also need to be maintained, replaced, and cleared of snow
- Greater uniformity between communities within the MPO is desired (a regional system requires intergovernmental cooperation rather than each community developing a unique system)
- Even though sidewalks are not appropriate in every location, some form of connection should be made to key destinations or other transportation linkages (on-street facilities, or trails)

What level of importance should be placed on connecting bicycle and pedestrian facilities to neighborhoods, parts of the transportation network, or other destinations?

Most interviewees mentioned “connections” from the outset of the interview. Primary issues seem to be a lack of intergovernmental coordination, political acceptability for requiring bicycle/pedestrian facilities, and cost. Many participants mentioned cost as a major factor. This seems to stem from the belief that bicycle or pedestrian facilities require their own right-of-way, engineering, and development. Primary connections should include schools and neighborhoods, major recreation areas (9-Mile Recreation Area, Rib Mountain State Park, Mountain Bay State Trail), and major shopping destinations (Rib Mountain Drive, etc.).

Part 5: Multi-Modal

Cite the primary issues keeping more people from using biking or walking for more trips.

This discussion was used to help identify possible reasons why biking or walking for daily transportation, recreation, or other means is not more prevalent in the Wausau area. Responses included:

- Trail segments don’t necessarily lead to on-road facilities to complete trip
- There is no “culture of expectation” that bikers or walkers will be using facilities or that they are viable options for many short trips
- Not enough education (and use of education to leverage funding)
- Need to institutionalize encouragement
- Many people feel they require dedicated facilities so won’t use roadways
- There are two different kinds of bikers – commuter/dedicated and recreational. The latter requires dedicated facilities.
- Lack of facilities at destination (bike parking, showers, etc.)

Part 6: Funding

Should more money be spent on biking and walking facilities?

The bias of the invitation list led to universal agreement that additional monies should be spent on biking and walking in the Wausau area. However, many people felt there was not sufficient funding to do what is necessary or that because automobile traffic is the predominant use, that it should retain the predominant share of spending. This led to discussions about whether more facilities would lead to more walking and biking (“if you build it, they will come”). Most agreed that prioritization should be given to bicycle or pedestrian facilities that would enable connections from other places or transportation networks.

If yes, where should this money come from?

Many of the interviewees are already working with a variety of funding sources to promote walking or biking, or the development of facilities to enable safer walking or biking. The municipalities are all grant-savvy and remain interested in using available funds to the extent practicable. Recreation groups are seeking donations, applying for grants, and working with sponsors to achieve local missions. The enforcement and education communities are taking advantage of available resources where they exist to allow for increased efforts to promote and enhance safe bicycle and pedestrian travel. Likewise, local foundations are looking for community building initiatives that educate and enhance the quality of life throughout the planning area. Business groups are looking for ways to capitalize on the Wausau area’s recreational attributes and seem interested in promoting walking and biking. Still, with all the current on-going efforts there is a universal call for increased funding.

Many participants thought that additional funding will become available with increased education about environmental conditions, existing transportation networks, and safety. It was mentioned that it will take a “groundswell of public outcry” to develop “real” change in the allocations available for

walking and biking facilities, education, and encouragement activities. A combination of funding is thought to yield the best results. Some ideas and current sources of funding include:

- Local foundations
- Grants (SRTS, WisDOT – Context Sensitive Design, etc.)
- Fundraisers
- Friends Groups
- Encouraging individuals to buy, maintain sections of trails
- Utilize state funds (state currently pays 80% of cost to build sidewalks along state highways)
- Impact fees

Conclusion

While this is a very limited sampling of the residents of the Wausau area, it appears there is some consensus about the current transportation system. Universally, there is a desire for better connectivity between on-street and off-street bicycle and pedestrian facilities. Often, this includes a more coordinated approach to route development across jurisdictional boundaries. In terms of good and bad, everyone seemed to like what was done on CTH “R” which contains both a sidepath and a wide striped curblane. At the same time, most agreed that Grand Avenue is substandard for either bicycle or pedestrian travel due to high traffic volume, frequent driveway conflicts, and low setback of the sidewalk from the street. It is commonly thought that an increase in education and encouragement will enhance the demand for, and usership of biking and walking for transportation and for recreation.

Continuing to apply for and to utilize a variety of funding sources increases the availability of funds. It will take a champion, or group of champions united around a cohesive message, to change the mindset within the Wausau area about the use of walking and biking for regular transportation. This includes planning for bicycle and pedestrian facilities when new neighborhoods, schools, and commercial areas are being developed. Safe and direct transportation for walkers and bikers on a regional basis will require the efforts of all members of the Wausau Area MPO, adjacent and overlapping organizations, and other volunteers working in concert to increase mode share for biking and walking.

Appendix B:

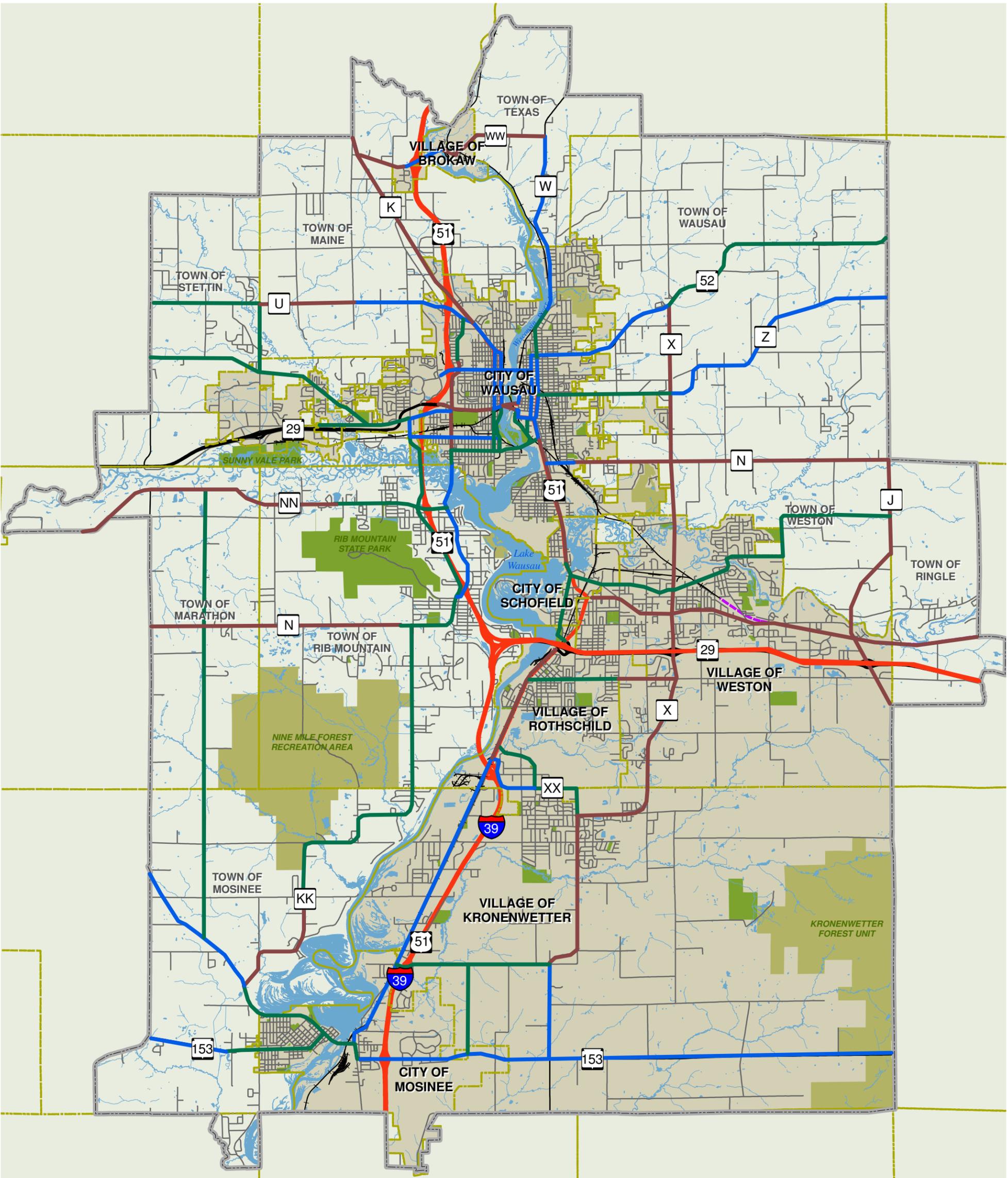
Sidewalk Inventories and Bike/Ped System Gaps Analysis

Gap Analysis: General Comments by Segment

Segment Name	General Comment	BFW Bike Audit Analysis
W. Bridge Street	<p>Bridge needs to be configured for bikes</p> <p>Stripe bike lane; is wide enough</p> <p>Lots of school traffic with no accommodation</p> <p>Busy intersections</p>	<p>Conditions from west to east include the bridge which is bad for cycling, however from here to I-39 conditions are moderate for biking with wide outside travel lanes and no on-street parking. The I-39 overpass is adequate for bikes with a wide outside travel lane.</p>
N. River Drive	<p>Links to River Edge Trail</p> <p>Need pedestrian access along river</p> <p>Park along river good destination</p>	<p>This short segment provides a good linkage between Thomas Street and W. Washington Street. It has a wide travel lane and little used on-street parking.</p>
Grand Avenue	<p>High traffic; no alternative route</p> <p>Widen to safely accommodate both sides</p> <p>Intersection Grand and Thomas (improve)</p> <p>Intersection Grand and Sturgeon Eddy (improve)</p>	<p>This roadway is problematic for cyclists. Though pedestrian facilities exist, bicycle facilities are severely lacking on this primary north/south corridor. The Bridge is adequate for bicycle travel but conditions on both sides limit its use.</p>
Camp Phillips Rd (CTH X)	<p>Could act as major route</p> <p>Not fit for biking; cannot get from central Wausau to Mtn Bay Trl</p> <p>Too narrow; route to Mtn Bay Trail</p> <p>Needs shoulder or bike lane</p>	<p>There are no shoulders and high traffic volume. This route provides the straightest route in a north/south direction east of Business 51. Current bicycling conditions are poor. There is one bridge which crosses the Eau Claire River that is structurally deficient according to WisDOT. The bridge is not compatible for cycling.</p>
Rib Mountain Drive (CTH N; north/south)	<p>Morning Glory needs shoulder from bike trail/tunnel to Lilac</p> <p>Strip outside travel lane; provides major connection between Rib Mountain State Park and C. Wausau (key bridge crossing)</p>	<p>There is a shared-use trail and wide shoulder east of Bittersweet Road by the entrance to Rib Mountain State Park. After this segment the trail and paved shoulders both end and cycling conditions are poor. There is a bridge along this segment that is good with 4-foot paved shoulders.</p>
S. Mountain Road (CTH N; east/west)	<p>Riding an bike to Wal-Mart is not an option</p> <p>Important connection to Nine Mile Recreation Area</p> <p>Needs striped shoulders</p> <p>Connects Rib Mountain Park to Nine Mile Rec.</p> <p>No parallel alternative to this roadway</p>	

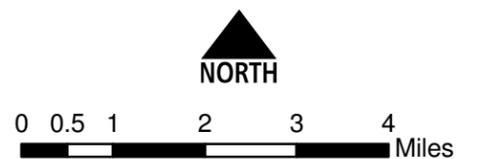
Segment Name	General Comment	BFW Bike Audit Analysis
Sherman Street	Difficult travel west on Sherman to west on Stewart West of 17th conditions are bad	This street provides wide outside travel lanes and paved shoulders under I-39.
S. 28th Avenue (CTH R)	There is no clear way to bike north from Sherman Ave. There should be separate bike/ped facilities entire length of "R" Poor surface and heavy traffic north of Sherman Need connection between "R" (Home Depot) and sidewalks on 52	This route is good for bicycling south of Sherman St.
N. Mountain Road (CTH NN)	There is no shoulder and pavement is bad Provides connection between Marathon City and Rib Mountain but no paved shoulders and high traffic volume Stripe outside travel lanes between CTH R to CTH N Not many parallel alternatives, poor conditions	Segment is good with a paved shoulder east of Grouse Lane. West of Grouse Lane high speed and traffic volume with no paved shoulder makes for poor biking conditions.
STH 52 (Stewart/5th/Wausau)	Roads marked as "Bike Route" should have capacity for bikes Painted lines should be maintained	Underpass is currently under construction, it was a poor facility. West of the underpass Stewart Ave is wide with a wide outside lane which turns into a paved shoulder. It is good for bicycling. From here, Stettin Drive is a good escape route with low traffic volume even though it does not have paved shoulders.
Stewart Avenue	Eastbound near Marathon Co. Park offers no shoulder/bike lane Walkways do not connect on Stewart and 17th Stewart and 17th high traffic volume and NO accommodations Underpass at STH 51 needs sidewalks	
STH 153 (Main Street)	Bridges into Mosinee are poor	Located between USH 51 and CTH J, this is a high speed corridor but has a wide outside travel lane. Conditions are moderate for cyclists all the way to Old HWY 51. There is an existing I-39 underpass. Mosinee bridges provide 3-foot shoulders.

WAUSAU AREA MPO BICYCLE & PEDESTRIAN PLAN BICYCLE CONDITION AUDIT



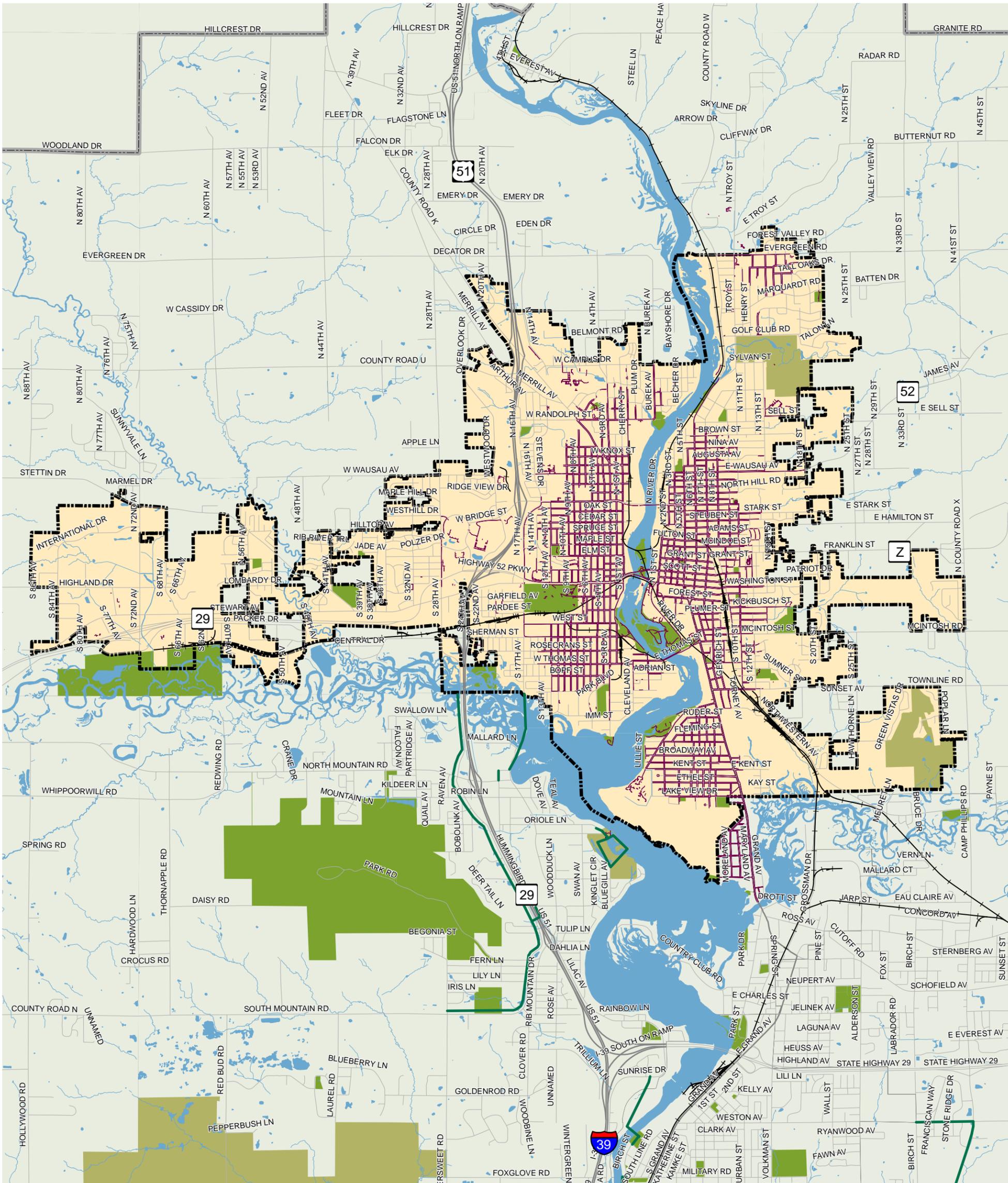
Legend

- MPO Boundary
- Municipal Boundary
- Mountain Bay Trail
- Forest Unit / Recreation Area
- Park
- Best Conditions for Bicycling
- Moderate Conditions for Bicycling
- Undesirable Conditions for Bicycling
- Bicycling Prohibited



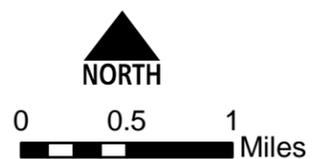
WAUSAU MPO BICYCLE & PEDESTRIAN PLAN

City of Wausau Sidewalk Inventory



Legend

- Sidewalk
- Existing Off-Street Path
- MPO Boundary
- Park
- City of Wausau

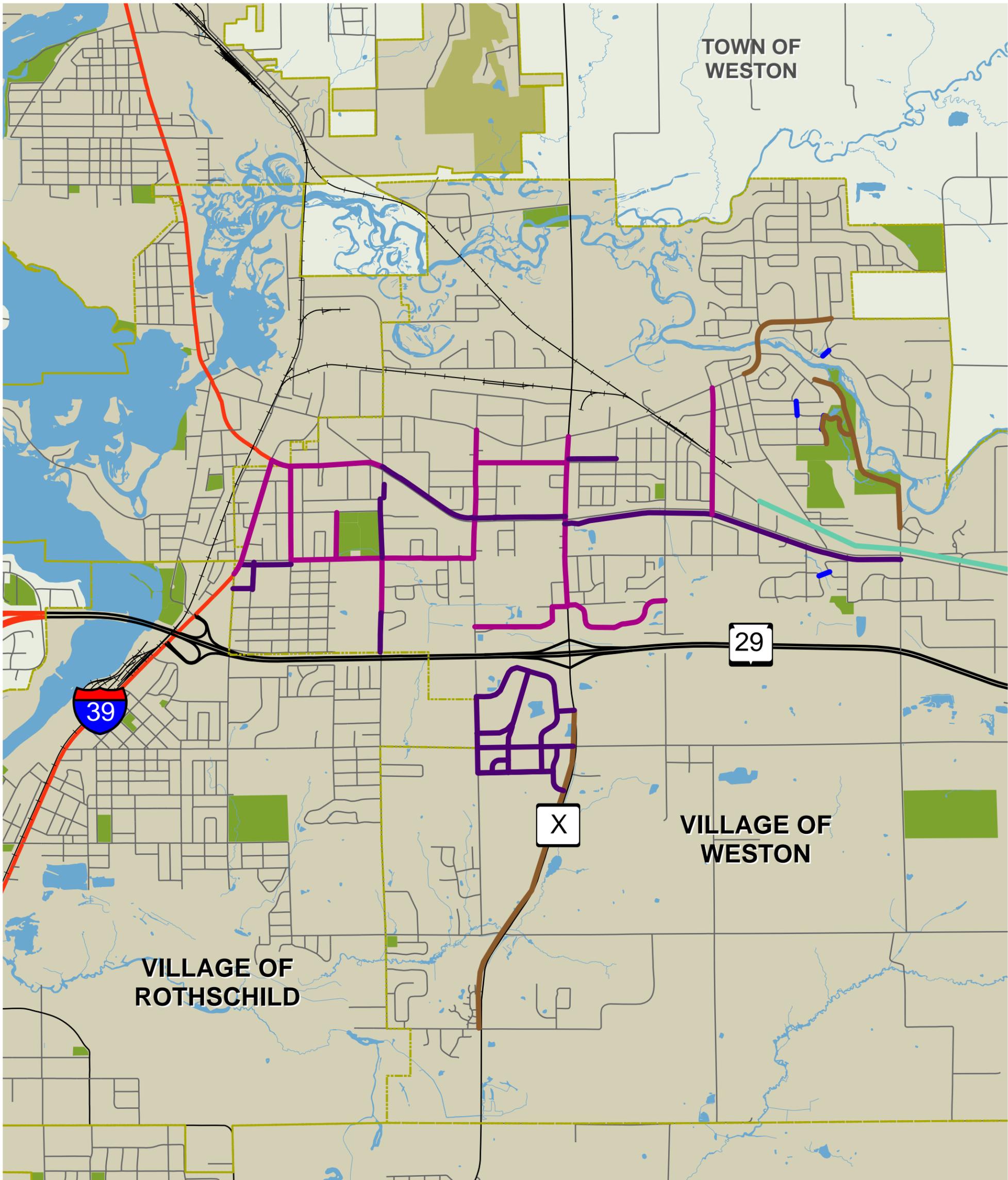


Project # 2274
October 8, 2008

MAP #1

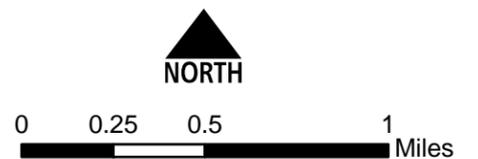
WAUSAU MPO BICYCLE & PEDESTRIAN PLAN

Village of Weston Sidewalk Inventory



Legend

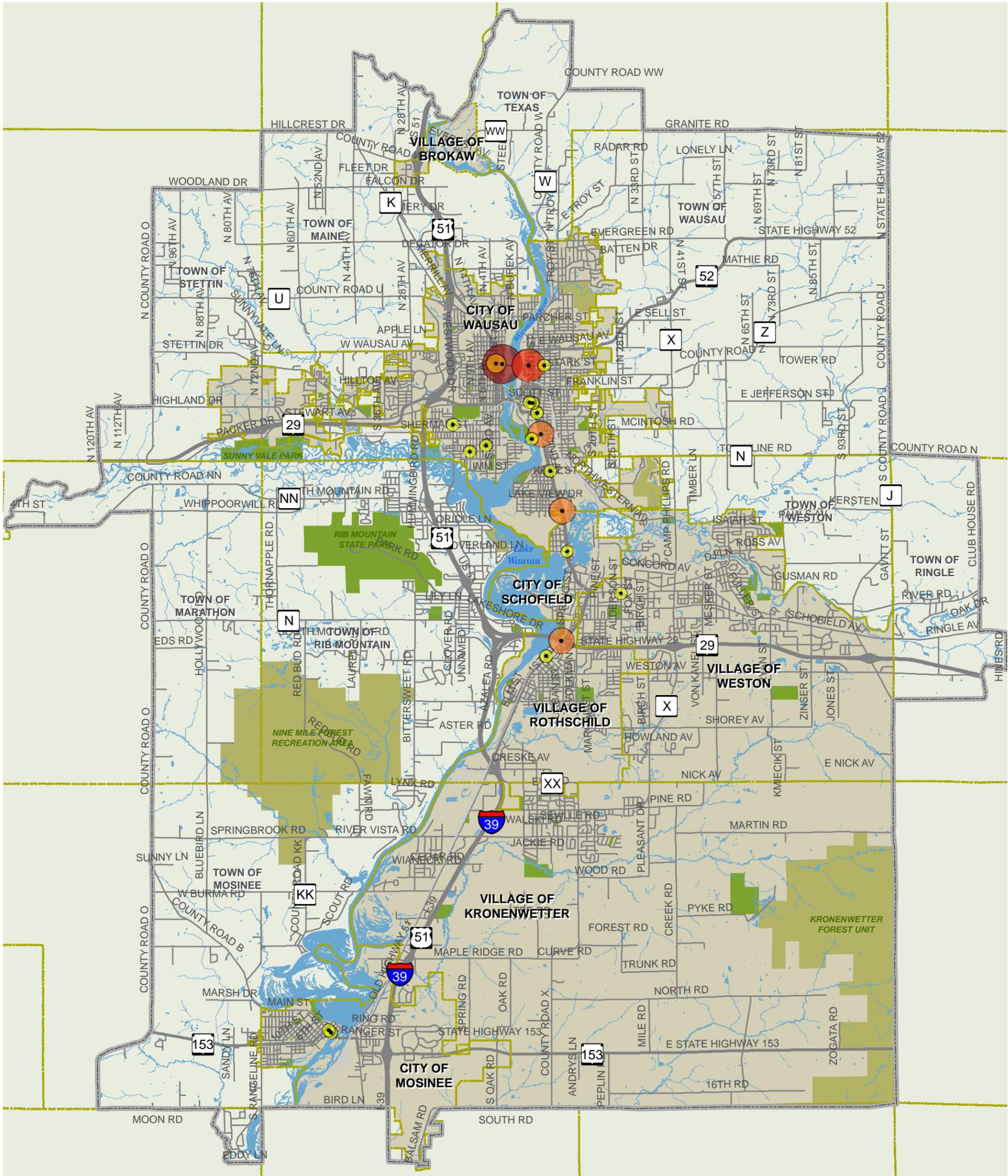
- Municipal Boundary
- Forest Unit / Recreation Area
- Park
- Mountain Bay Trail
- Multi-use path
- Path areas
- Sidewalks on both sides
- Sidewalks on one side



Appendix C:

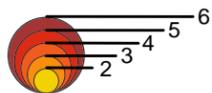
Bicycle Crash Locations

WAUSAU AREA MPO BICYCLE & PEDESTRIAN PLAN BICYCLE CRASH LOCATIONS

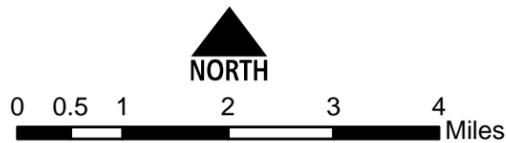


Legend

-  MPO Boundary
-  Municipal Boundary
-  Forest Unit / Recreation Area
-  Park



Number of bicycle / pedestrian related crashes



Appendix D:

Recommended Bicycle Route Maps

Area Wide Bicycle & Pedestrian Route Configuration

The Recommended Bicycle and Pedestrian System Map (Map 15) depicts potential routes throughout the metropolitan area. These routes are based on the analyses and project recommendations discussed in Chapter 8.

The maps delineate potential routes in different colors. Colors relate to the type of improvement required. A complete description of route categories is listed below.

Local Bike Route: These routes include local on-street routes identified by individuals who ride these streets frequently, or are formalized on-street routes containing bike route signage (C. Wausau).

Proposed On-Street Bike Route (Planned Improvement): These on-street routes contain segments that have been programmed for improvement and upgrade that will increase their ability to accommodate bicycles.

Proposed On-Street Bike Route: These on-street routes have been identified as currently suitable for bicycle accommodation. Additionally, they have been chosen to increase mobility throughout the MPO and connect to other routes, paths, or destinations of local or regional interest.

Proposed On-Street Bike Route (Requires Improvement): These on-street routes provide direct linkages between other identified routes, paths, or destinations but require improvement for safer bicycle accommodation. Determination for suitability was determined through user reviews, WisDOT Bicycle Conditions Maps, and a windshield survey (See Chapter 4 – Section 4.3). Identification of these routes as requiring improvement does not mean they are unsafe. Rather, they do not conform to the standards identified in this plan as providing a safer bicycling environment such as low motor vehicle speeds or wide paved shoulders.

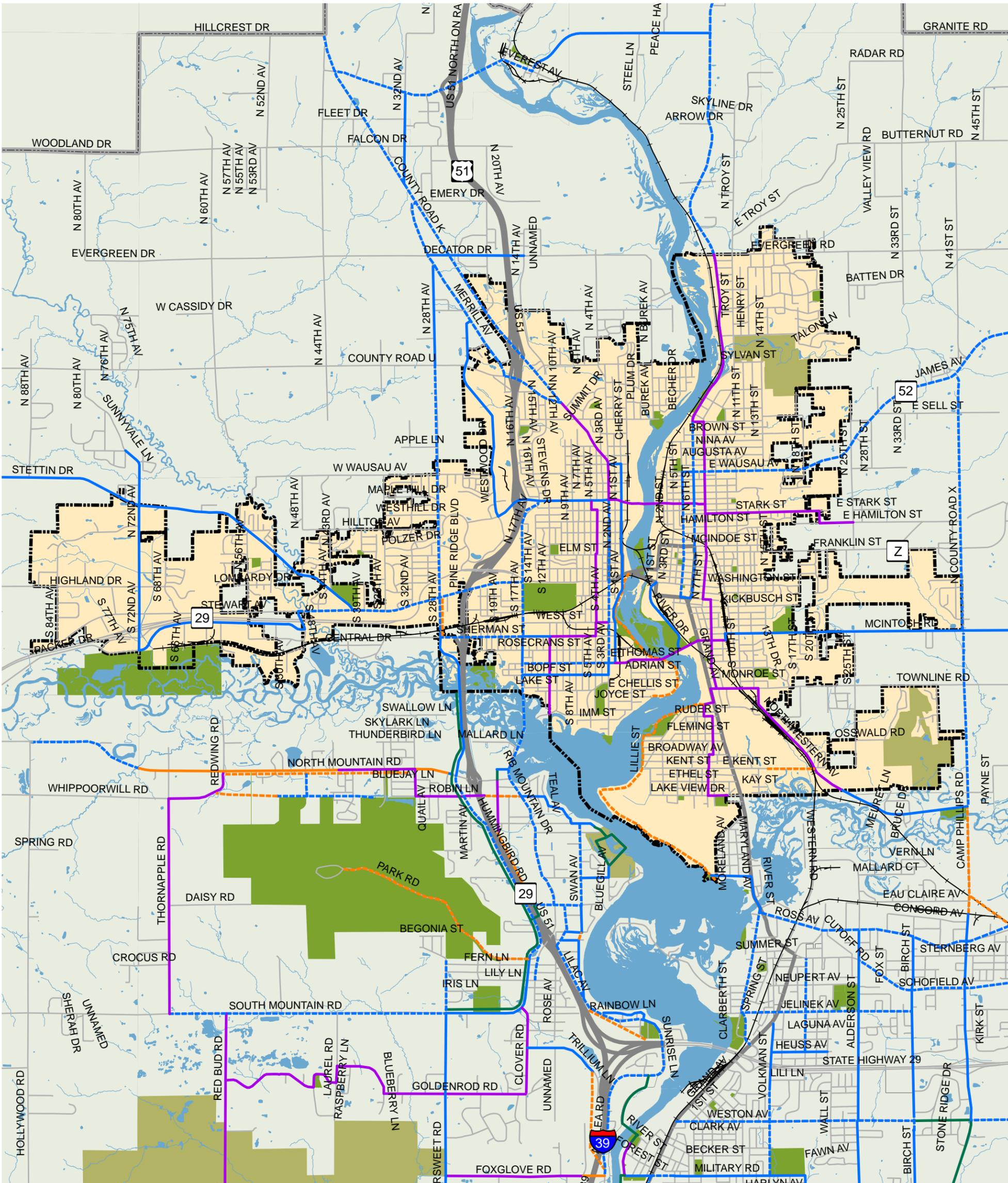
Existing Off-Street Path: These facilities are off-street paths that existed when the plan was developed. They can be used interchangeably with on-street routes, or to augment bicycle or pedestrian trips to increase non-motorized transportation mobility throughout the MPO.

Proposed Off-Street Path: These facilities are proposed off-street paths that are recommended for installation. Development of these facilities will enhance mobility for non-motorized transportation users and provide options for pedestrians and bicycles navigating throughout the MPO.

Planned Off-Street Path: These facilities were being scheduled for installation when the plan was developed. Development of these facilities will enhance mobility for non-motorized transportation users and provide options for pedestrians and bicycles navigating throughout the MPO.

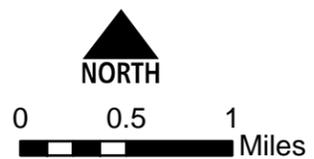
Disclaimer: Designation of routes is not an endorsement of these routes. Route users assume all rights and responsibilities for safe operation while utilizing transportation facilities and should exercise common sense when selecting a route. Always wear a helmet when operating a bicycle and use hand signals to communicate with other traffic.

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN CITY OF WAUSAU BICYCLE ROUTES



Legend

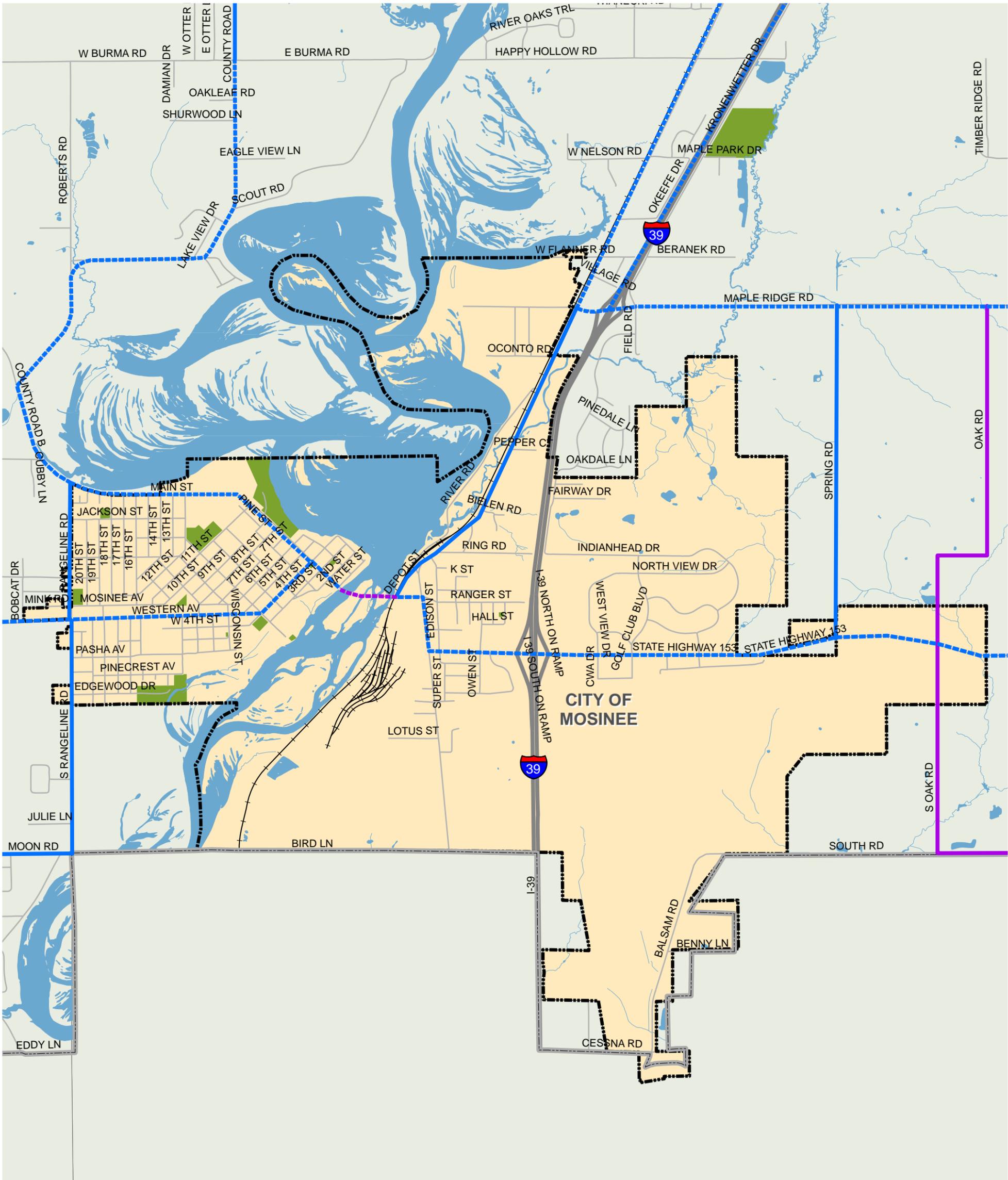
- Existing Off-Street Path
- Local Bike Route
- Proposed On-Street Bike Route
- Proposed On Street Bike Route (Requires Improvement)
- Proposed On-Street Bike Route (Planned Improvement)
- Planned Off-Street Path
- MPO Boundary
- Park
- City of Wausau



Project # 2274
January 15, 2009

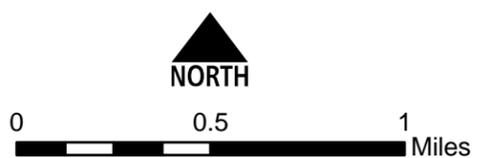
MAP #1

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN CITY OF MOSINEE BICYCLE ROUTES

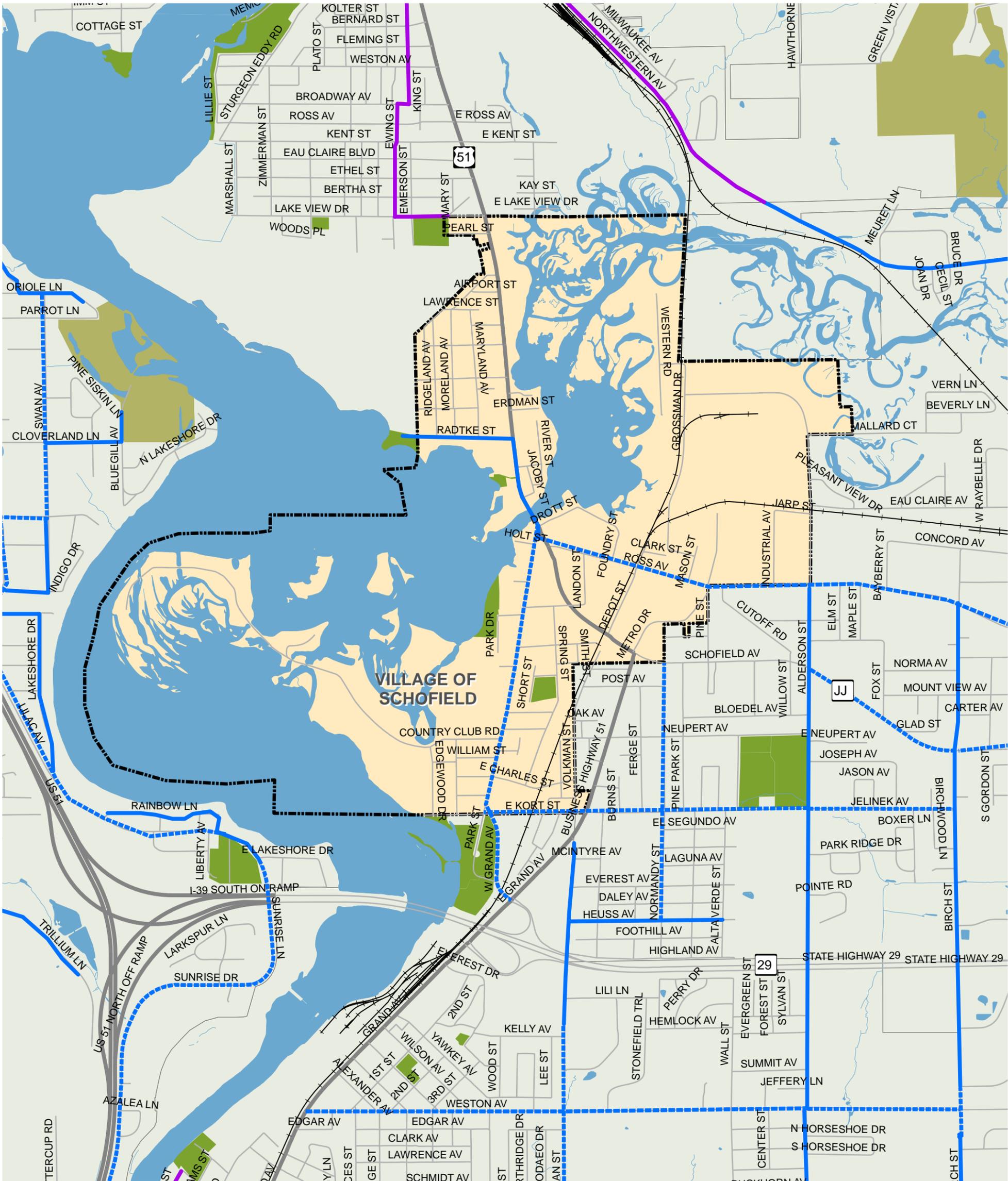


Legend

-  City of Mosinee Boundary
-  MPO Boundary
-  Park
-  Local Bike Route
-  Proposed On-Street Bike Route (Planned Improvement)
-  Proposed On-Street Bike Route
-  Proposed On Street Bike Route (Requires Improvement)



WAUSAU MPO BICYCLE & PEDESTRIAN PLAN SCHOFIELD BICYCLE ROUTES



- Legend**
- MPO Boundary
 - Park
 - City of Schofield
 - Existing Off-Street Path
 - Local Bike Route
 - Proposed On-Street Bike Route
 - Proposed On Street Bike Route (Requires Improvement)

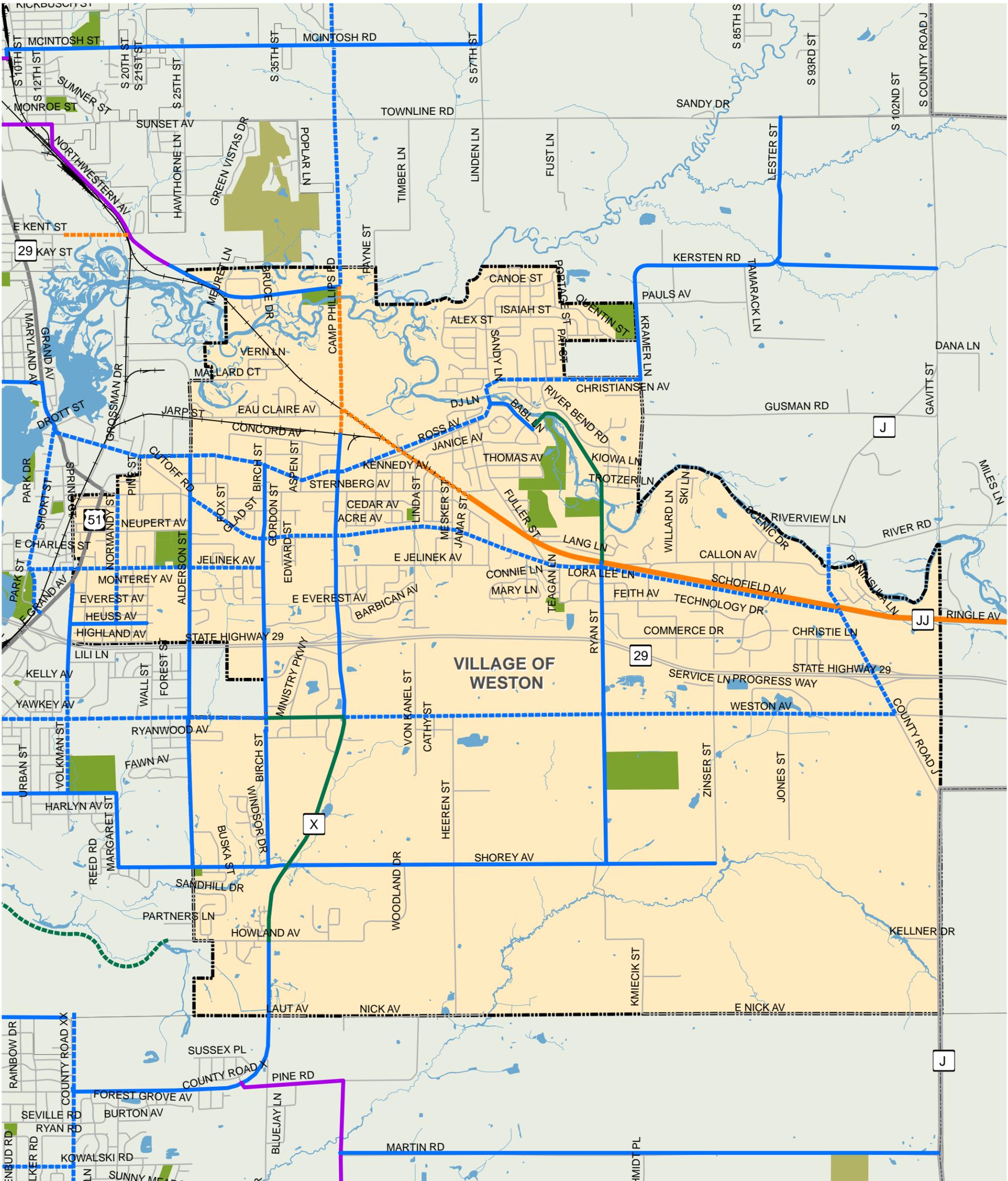


Project # 2274

January 15, 2009

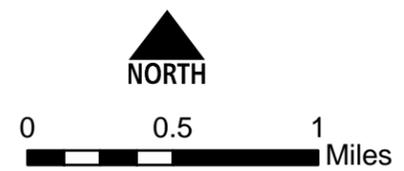
MAP #3

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN VILLAGE OF WESTON BICYCLE ROUTES



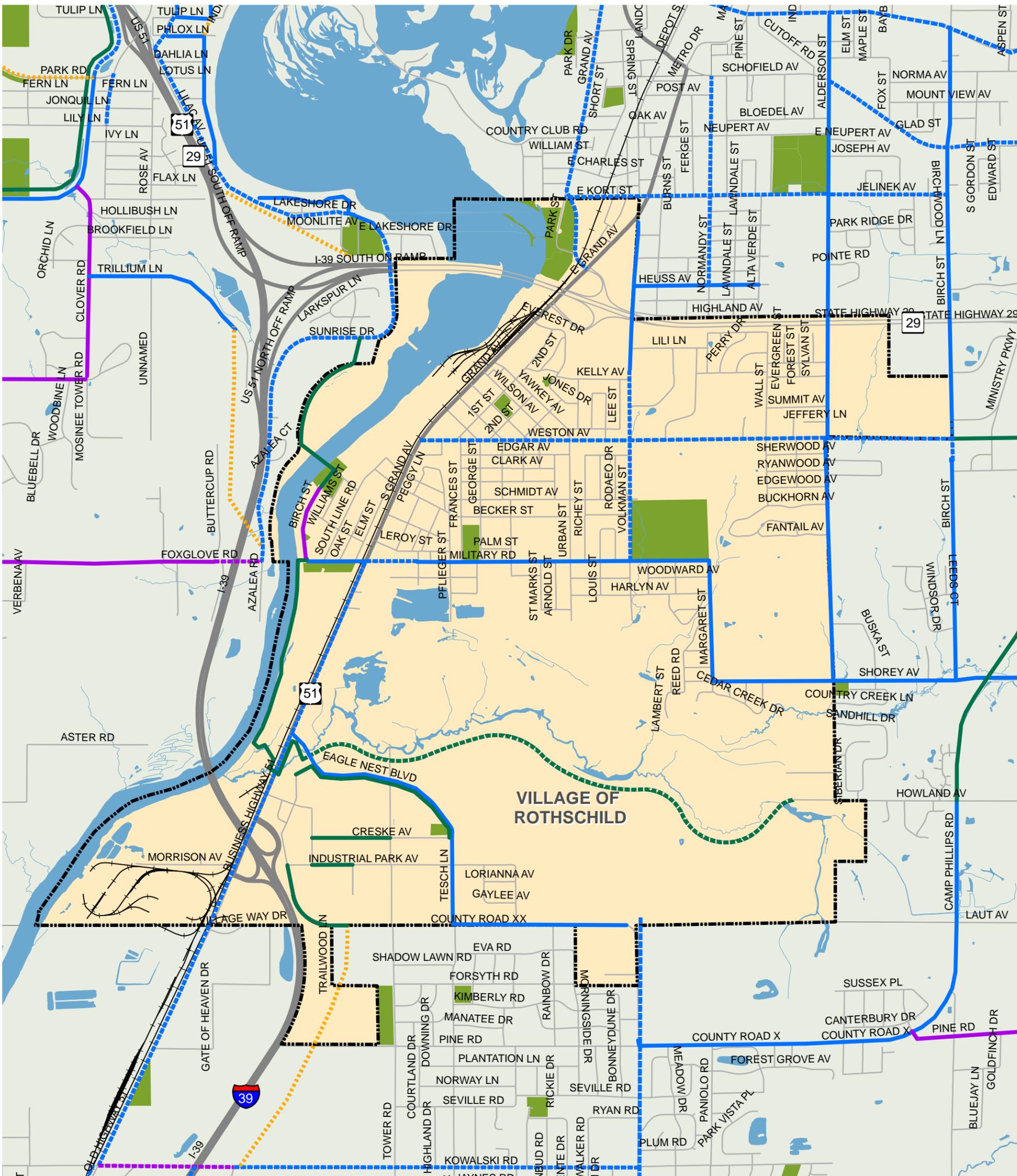
- Legend**
- Local Bike Route
 - - - Proposed On-Street Bike Route (Planned Improvement)
 - Proposed On-Street Bike Route
 - - - Proposed On Street Bike Route (Requires Improvement)
 - Existing Off-Street Path
 - - - Proposed Off-Street Path
 - Planned Off-Street Path

- Mountain Bay Trail
- Village of Weston
- MPO Boundary
- Park



Project # 2274
October 8, 2008

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN VILLAGE OF ROTHSCHILD BICYCLE ROUTES



Legend

- Local Bike Route
- - - Proposed On-Street Bike Route (Planned Improvement)
- Proposed On-Street Bike Route
- - - Proposed On Street Bike Route (Requires Improvement)
- Existing Off-Street Path
- - - Proposed Off-Street Path
- - - Planned Off-Street Path

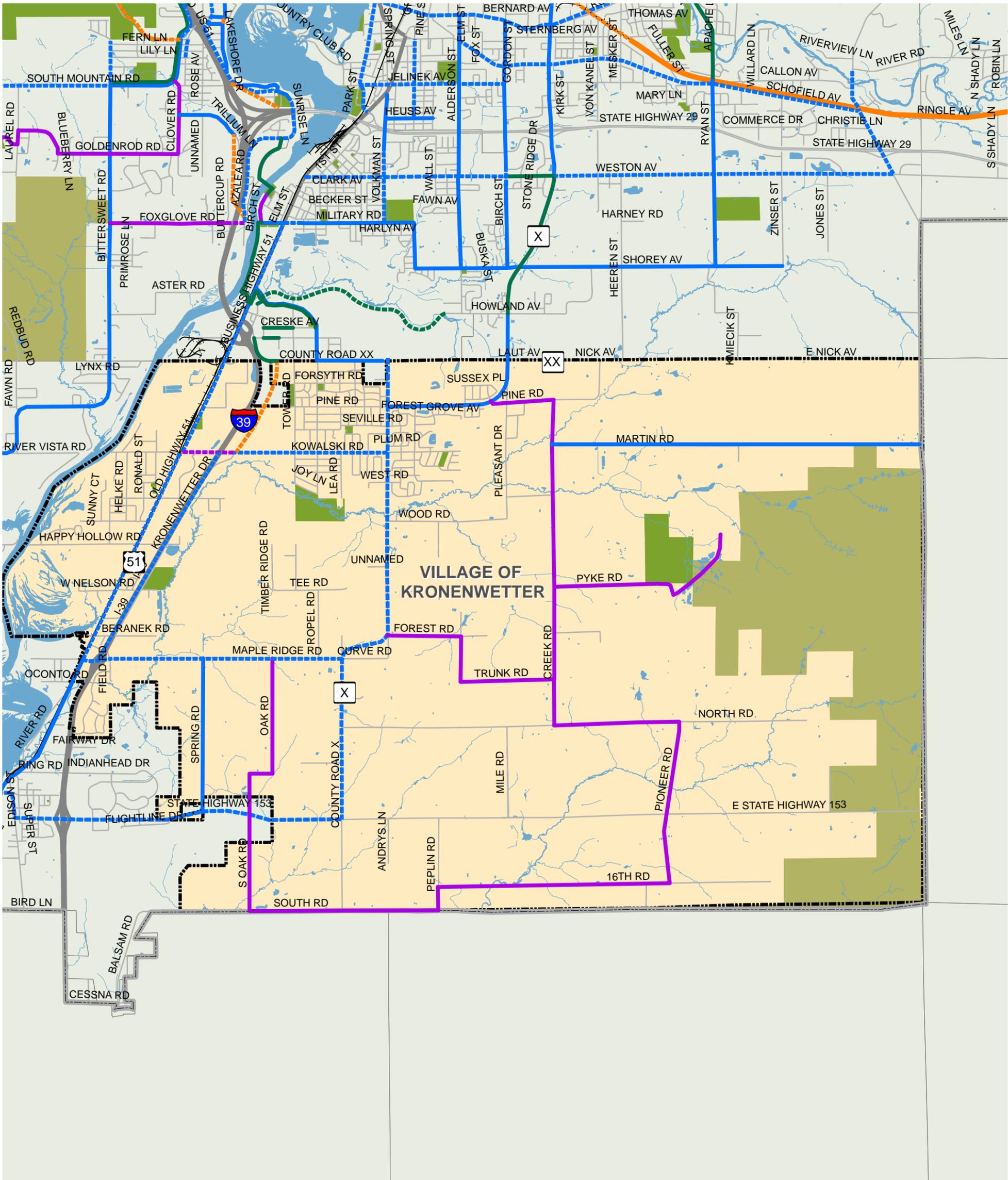
- Village of Rothschild
- MPO Boundary
- Park



Project # 2274
October 8, 2008

MAP #5

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN VILLAGE OF KRONENWETTER BICYCLE ROUTES



Legend

- Local Bike Route
- - - Proposed On-Street Bike Route (Planned Improvement)
- Proposed On-Street Bike Route
- - - Proposed On Street Bike Route (Requires Improvement)
- Existing Off-Street Path
- - - Proposed Off-Street Path
- - - Planned Off-Street Path
- Village of Kronenwetter
- MPO Boundary
- Park
- Mountain Bay Trail

NORTH

0 1 2 Miles



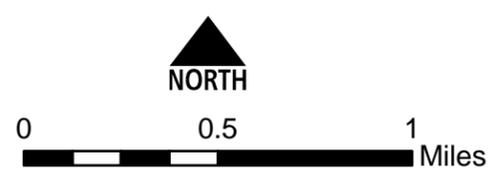
Project # 2274
October 8, 2008

MAP #6

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF TEXAS BICYCLE ROUTES

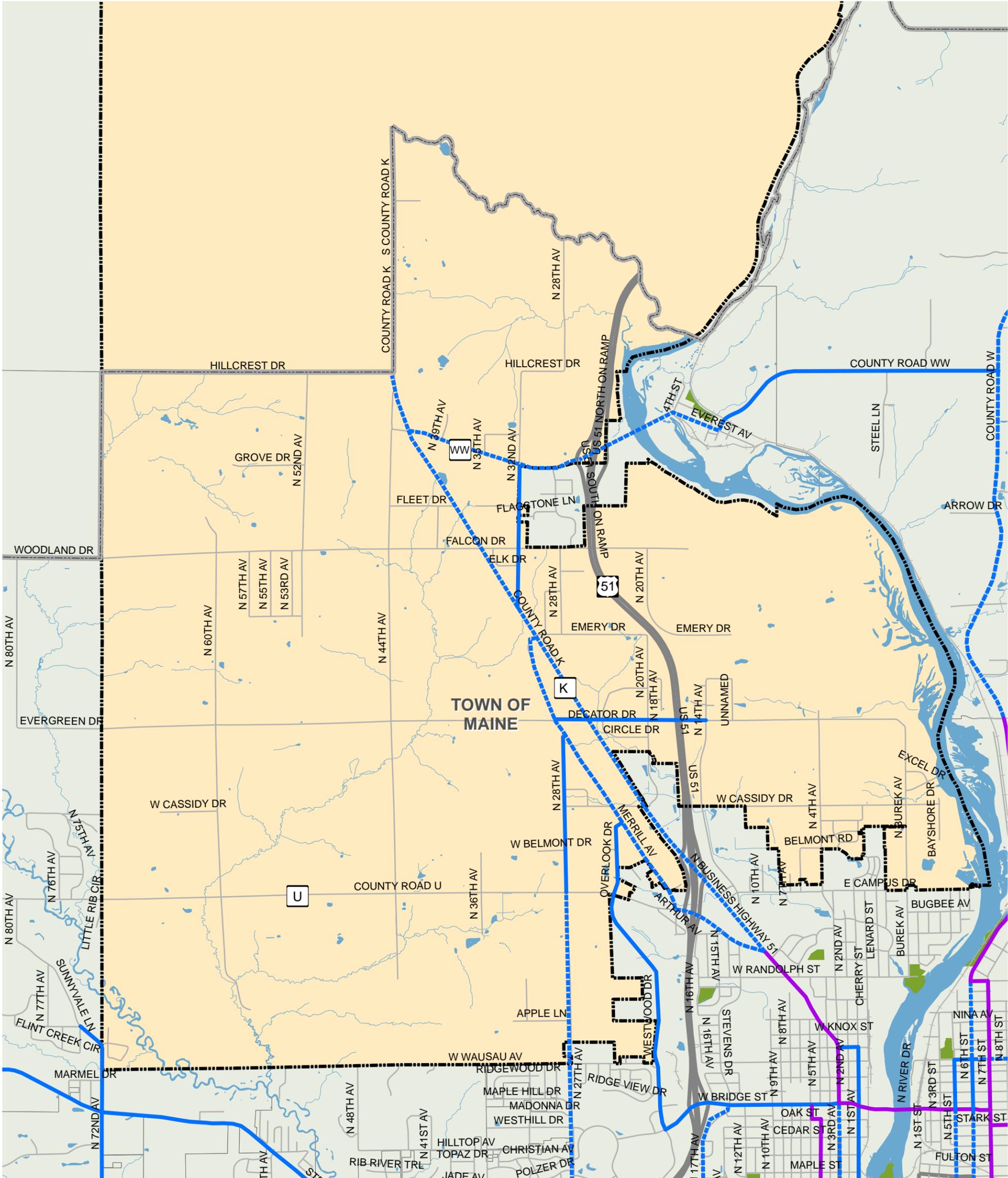


- Legend**
-  MPO Boundary
 -  Park
 -  Local Bike Route
 -  Proposed On-Street Bike Route
 -  Proposed On Street Bike Route (Requires Improvement)
 -  Town of Texas



Project # 2274.01
January 15, 2009

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF MAINE BICYCLE ROUTES



- Legend**
-  Town of Maine
 -  MPO Boundary
 -  Park
 -  Local Bike Route
 -  Proposed On-Street Bike Route
 -  Proposed On Street Bike Route (Requires Improvement)



NORTH

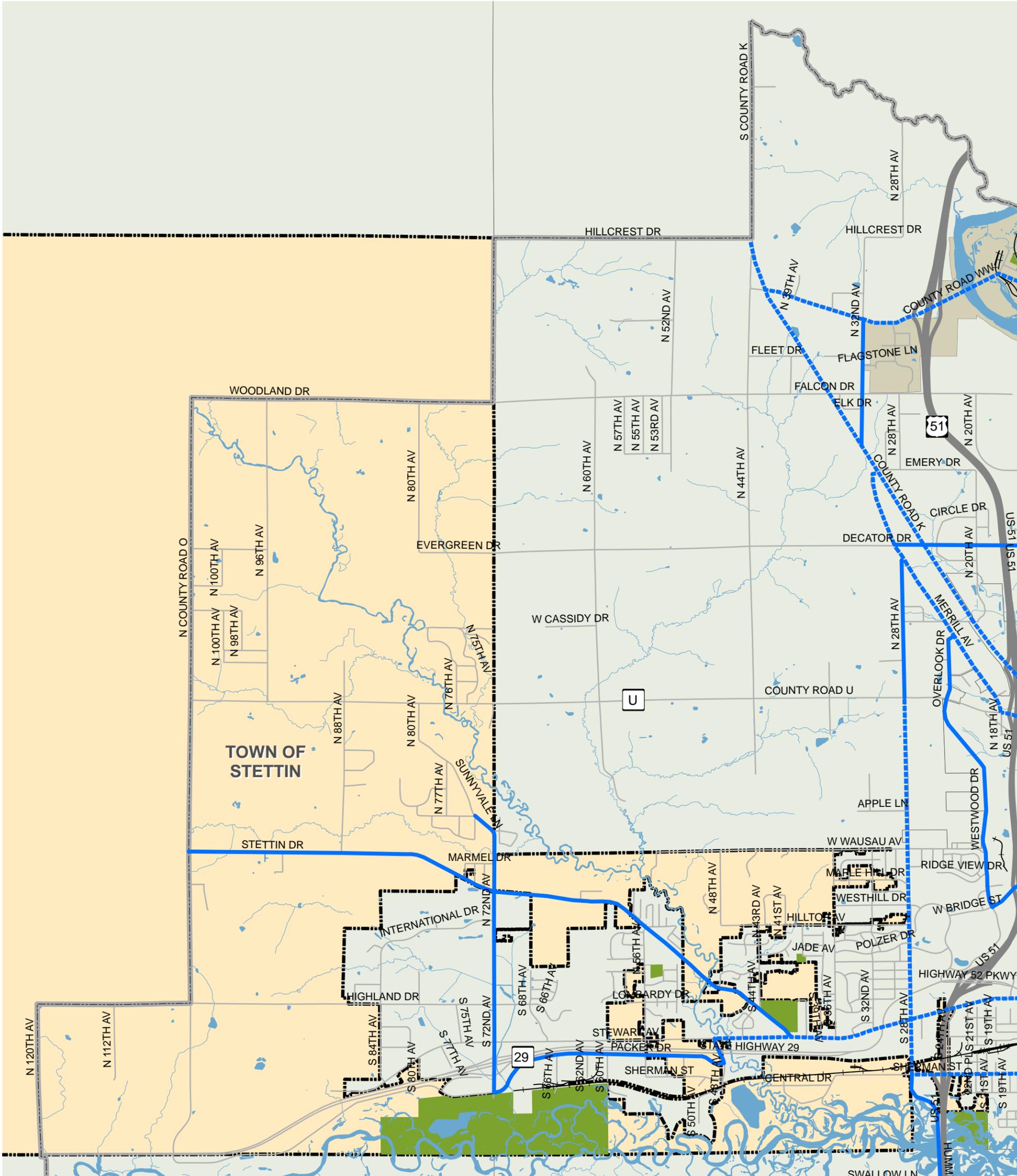


0 0.5 1 Miles



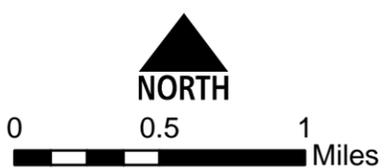
Project # 2274
January 15, 2009
MAP #8

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF STETTIN BICYCLE ROUTES



Legend

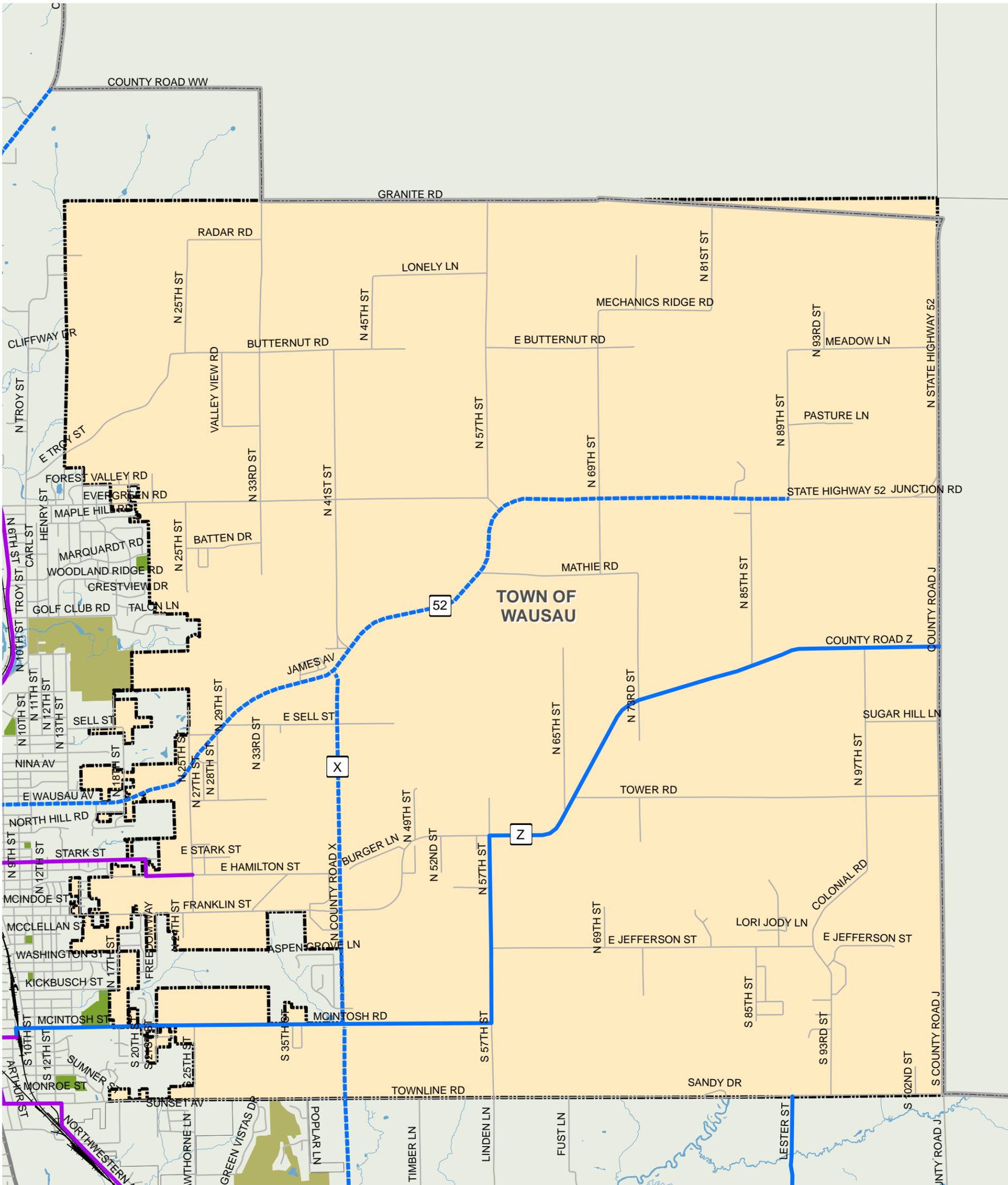
-  Town of Stettin
-  MPO Boundary
-  Park
-  Local Bike Route
-  Proposed On-Street Bike Route (Requires Improvement)
-  Proposed On-Street Bike Route



Project # 2274
January 15, 2009

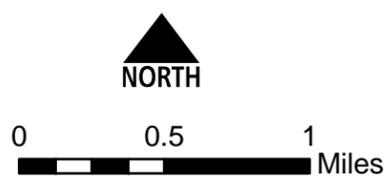
MAP #9

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF WAUSAU BICYCLE ROUTES



Legend

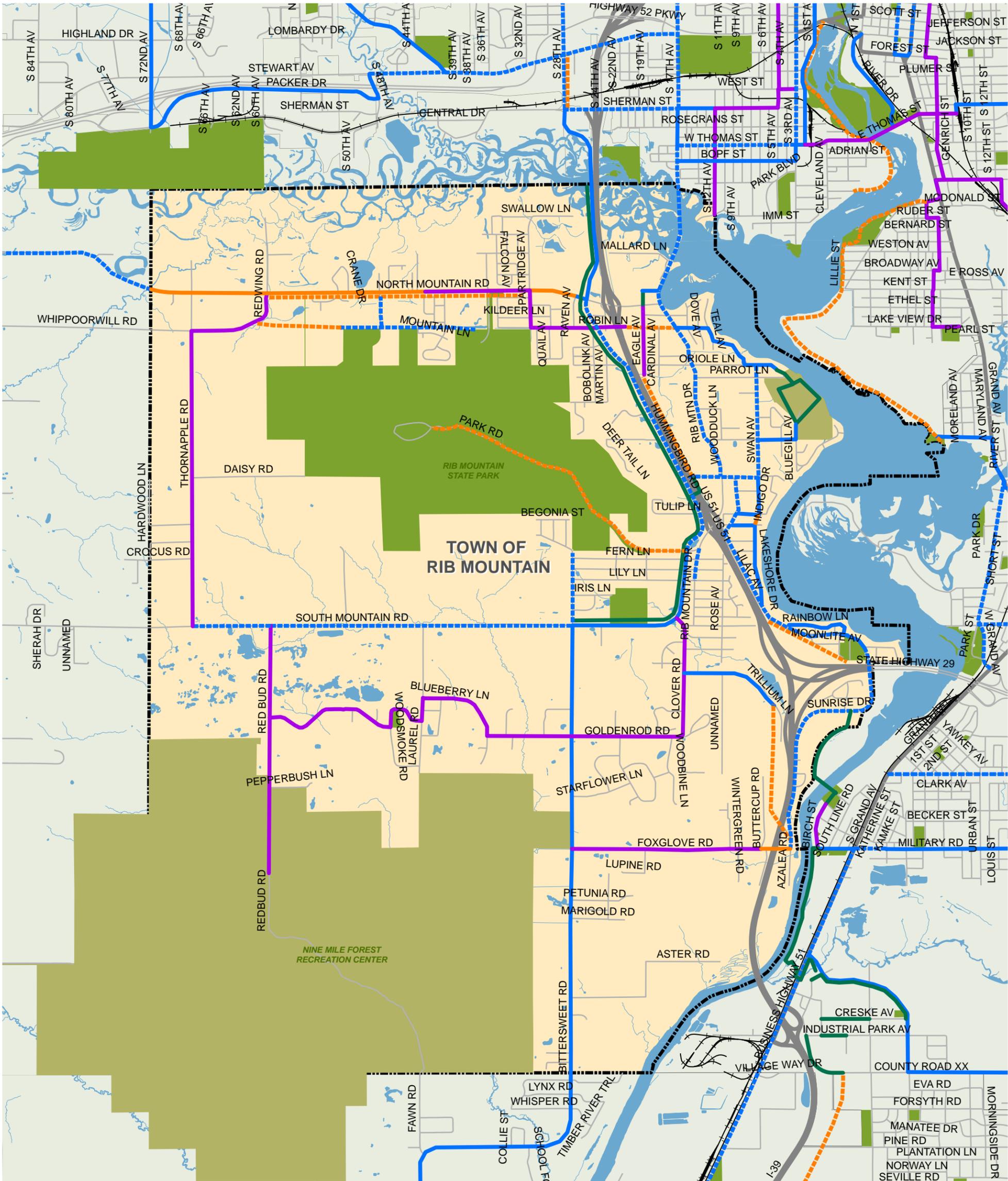
-  Town of Wausau
-  MPO Boundary
-  Park
-  Local Bike Route
-  Proposed On-Street Bike Route (Requires Improvement)
-  Proposed On-Street Bike Route



Project # 2274
January 15, 2009

MAP #10

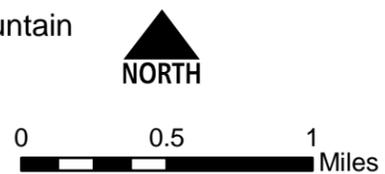
WAUSAU MPO BICYCLE & PEDESTRIAN PLAN RIB MOUNTAIN BICYCLE ROUTES



Legend

- Local Bike Route
- Proposed On-Street Bike Route
- - - Proposed On Street Bike Route (Requires Improvement)
- Existing Off-Street Path
- - - Planned Off-Street Path

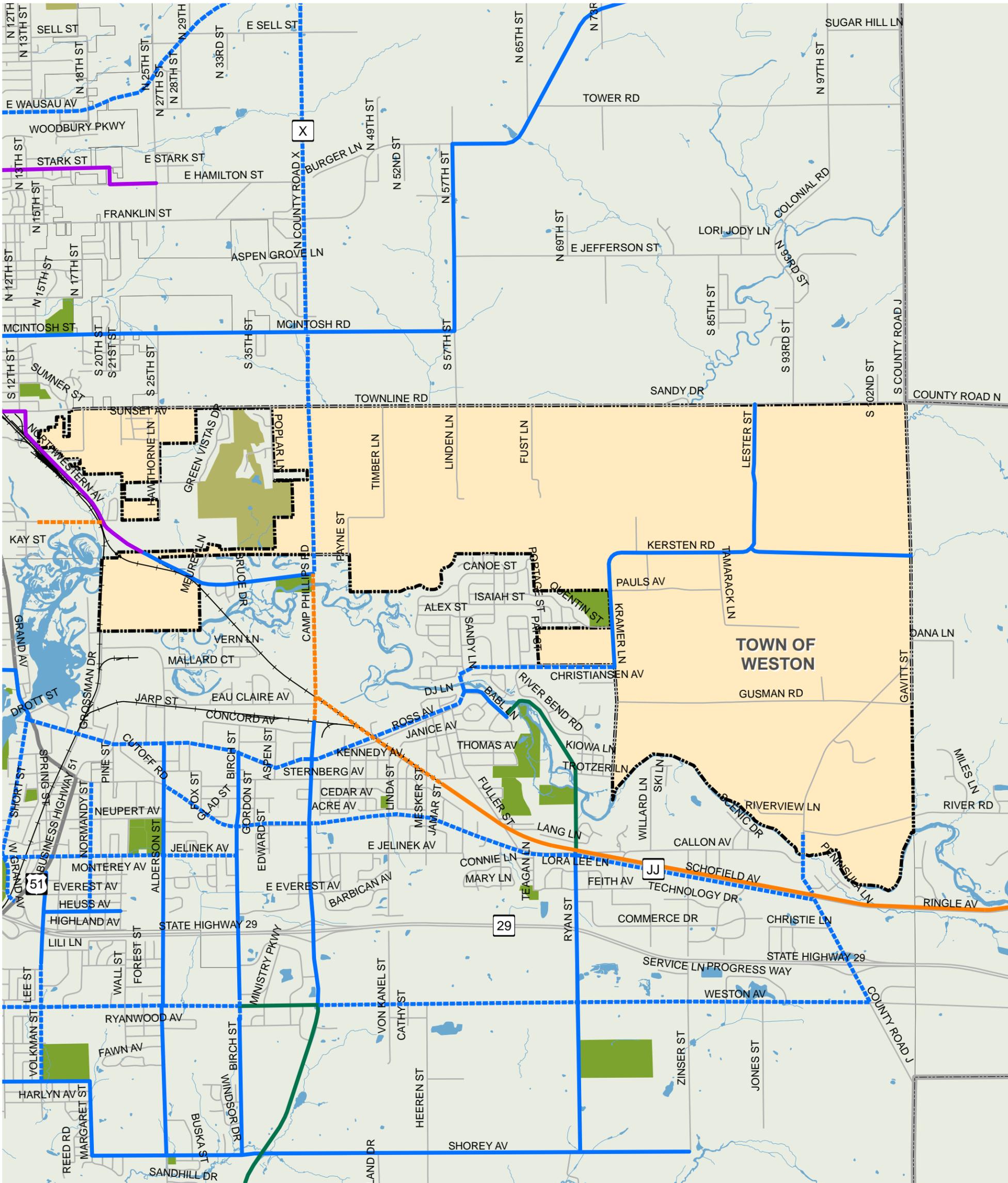
- Town of Rib Mountain
- MPO Boundary
- Park



Project # 2274
January 15, 2009

MAP #11

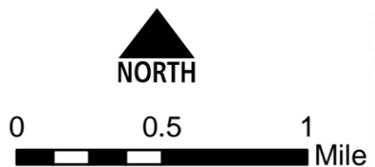
WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF WESTON BICYCLE ROUTES



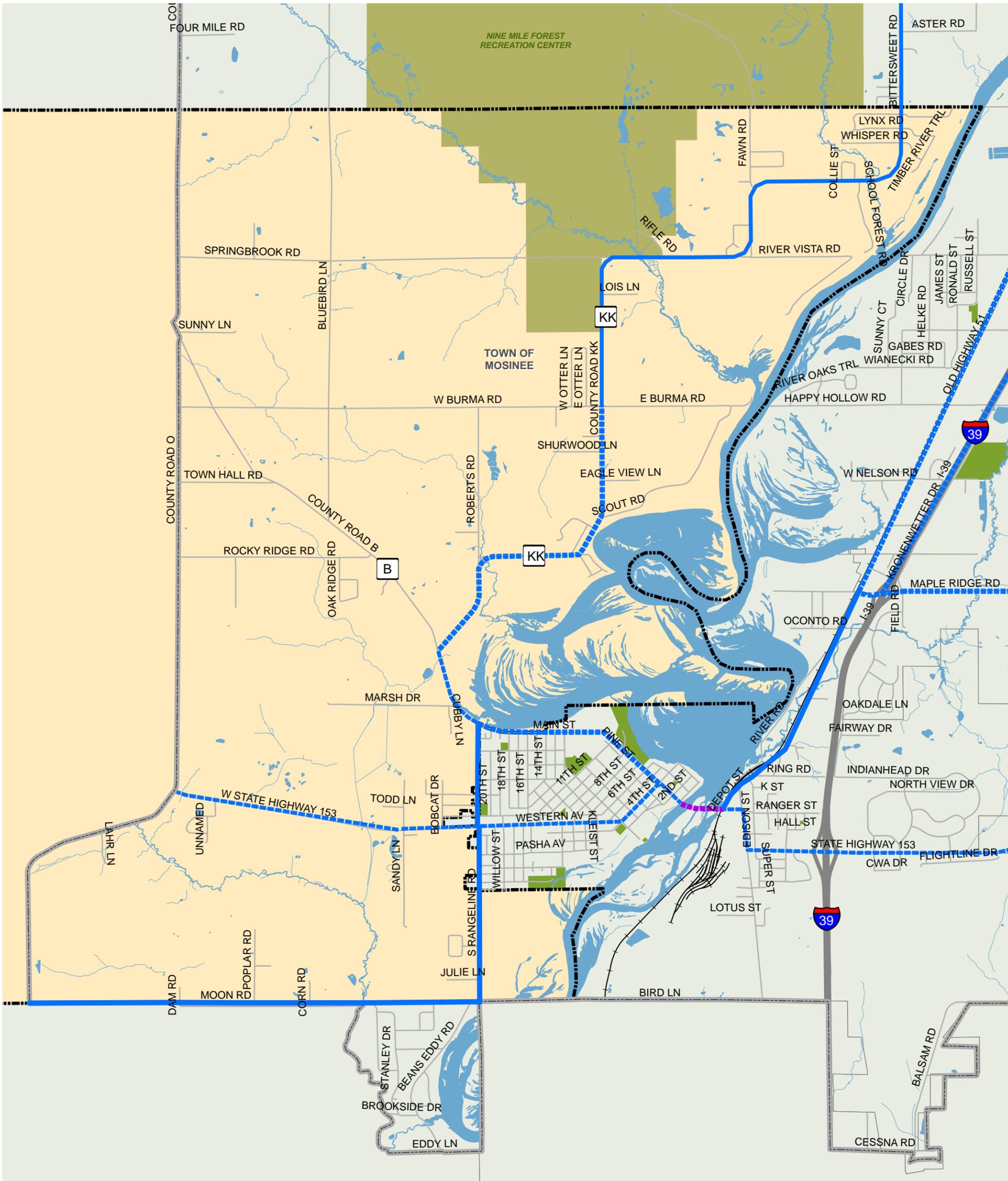
Legend

- Local Bike Route
- Proposed On-Street Bike Route
- - - Proposed On Street Bike Route (Requires Improvement)
- Existing Off-Street Path
- - - Planned Off-Street Path

- MPO Boundary
- Park
- Mountain Bay Trail
- Town of Weston

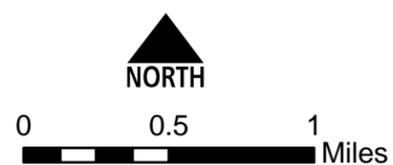


WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF MOSINEE BICYCLE ROUTES

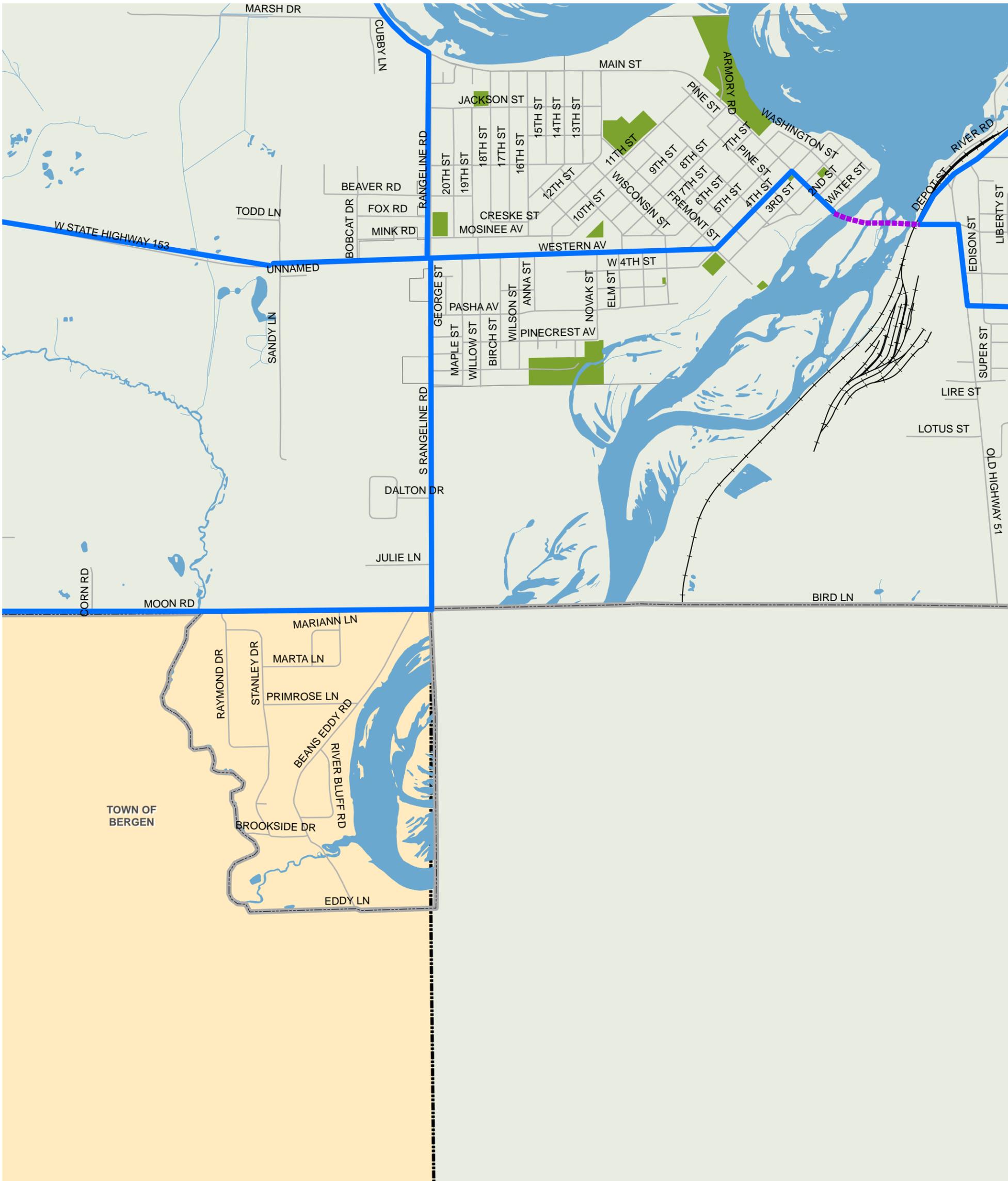


Legend

-  MPO Boundary
-  Park
-  Proposed On-Street Bike Route (Planned Improvement)
-  Proposed On-Street Bike Route
-  Proposed On Street Bike Route (Requires Improvement)
-  Town of Mosinee

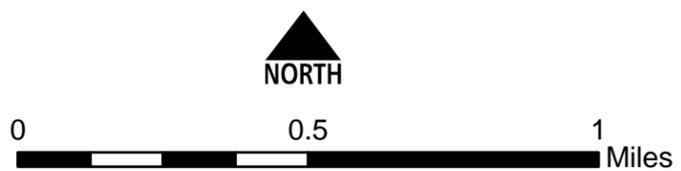


WAUSAU MPO BICYCLE & PEDESTRIAN PLAN TOWN OF BERGEN BICYCLE ROUTES



Legend

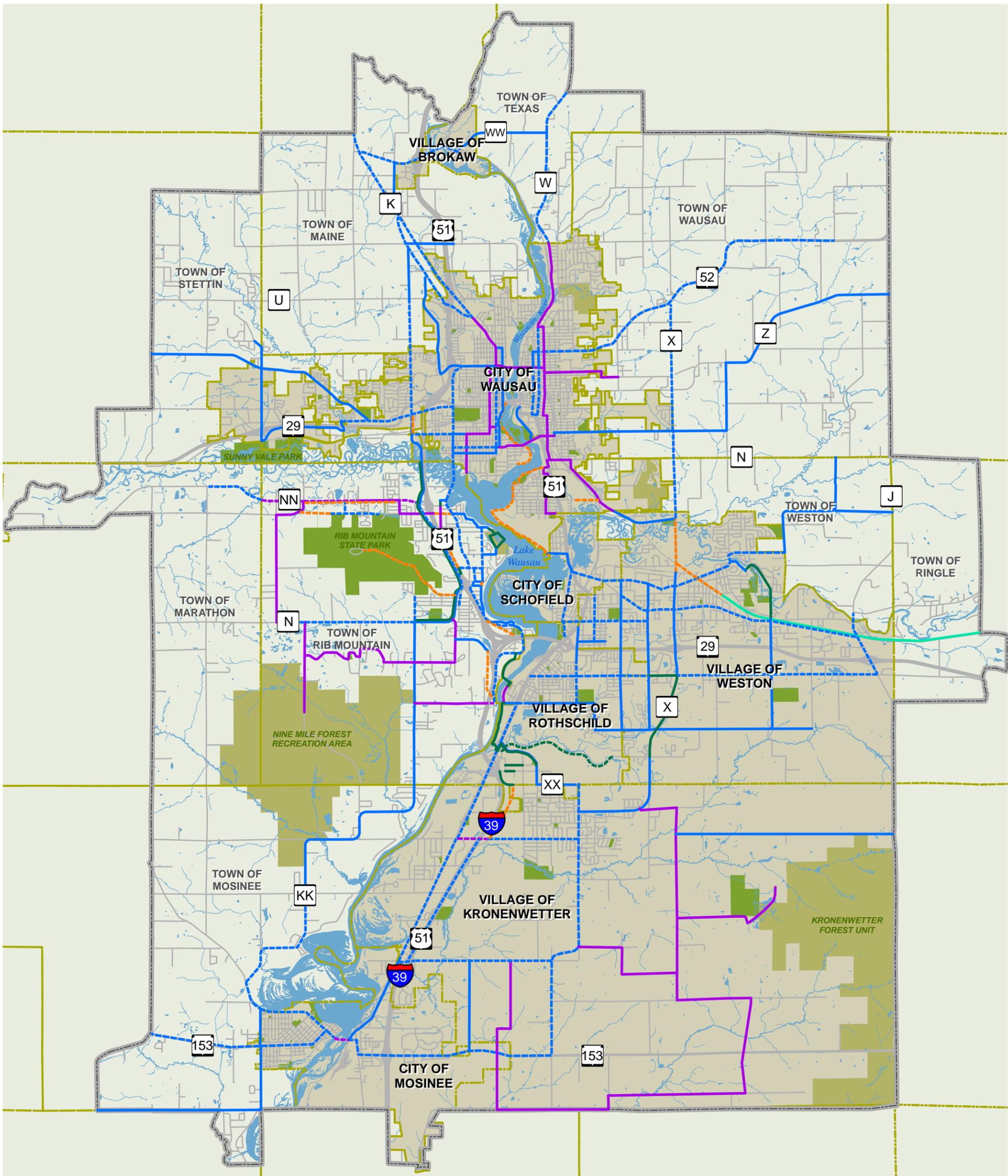
-  Town of Bergen
-  MPO Boundary
-  Park
-  Proposed On-Street Bike Route (Planned Improvement)
-  Proposed On-Street Bike Route



Project # 2274
October 8, 2008

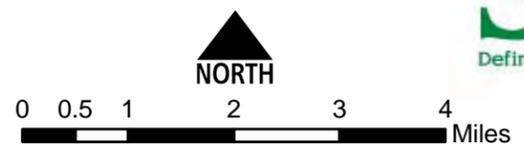
MAP #14

WAUSAU MPO BICYCLE & PEDESTRIAN PLAN BICYCLE ROUTES



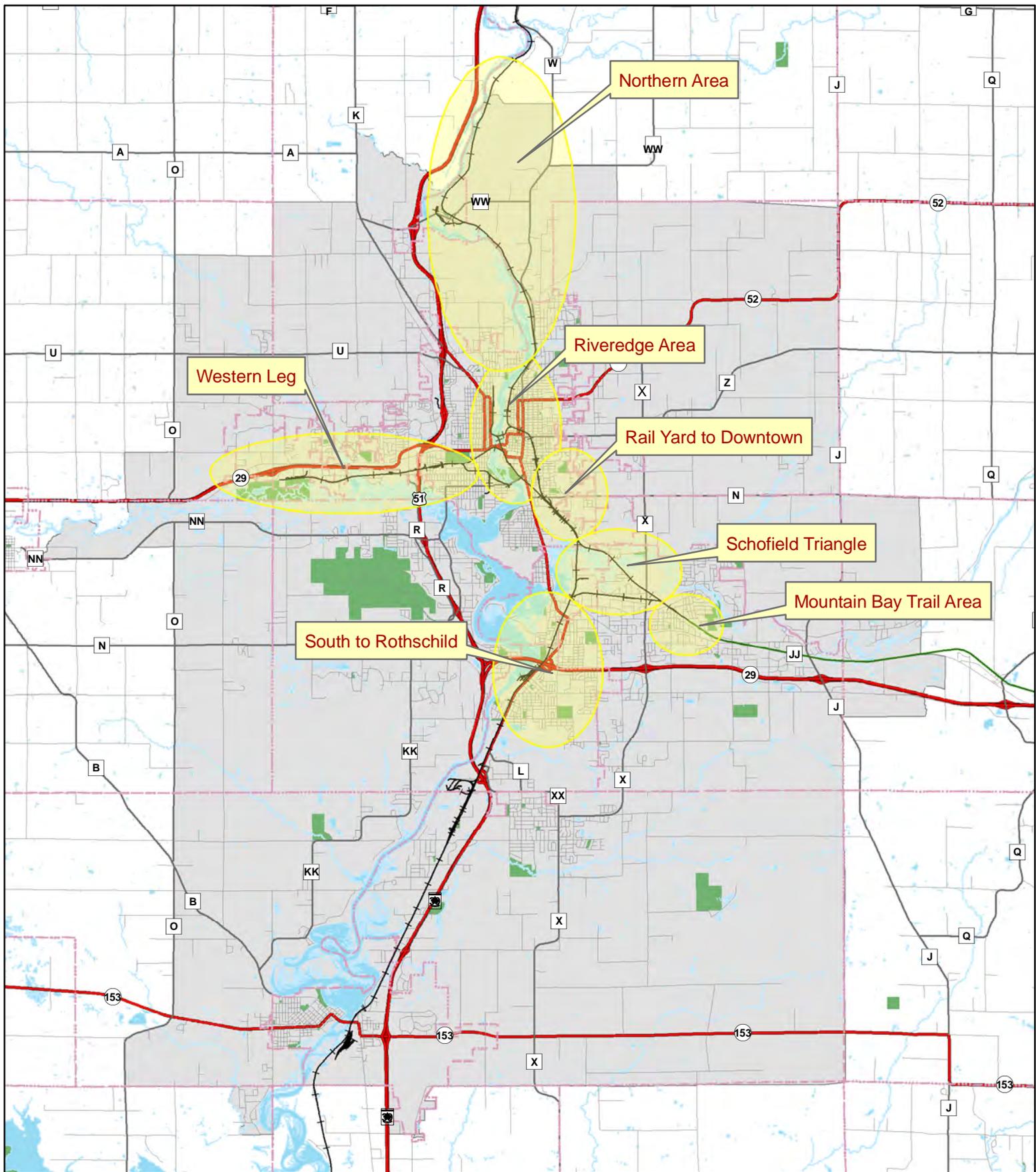
Legend

- Local Bike Route
- - - Proposed On-Street Bike Route (Planned Improvement)
- Proposed On-Street Bike Route
- - - Proposed On Street Bike Route (Requires Improvement)
- Existing Off-Street Path
- - - Proposed Off-Street Path
- - - Planned Off-Street Path
- Municipal Boundary
- MPO Boundary
- Park
- Mountain Bay Trail



Appendix E:

Rails-with-Trails and Rails-to-Trails



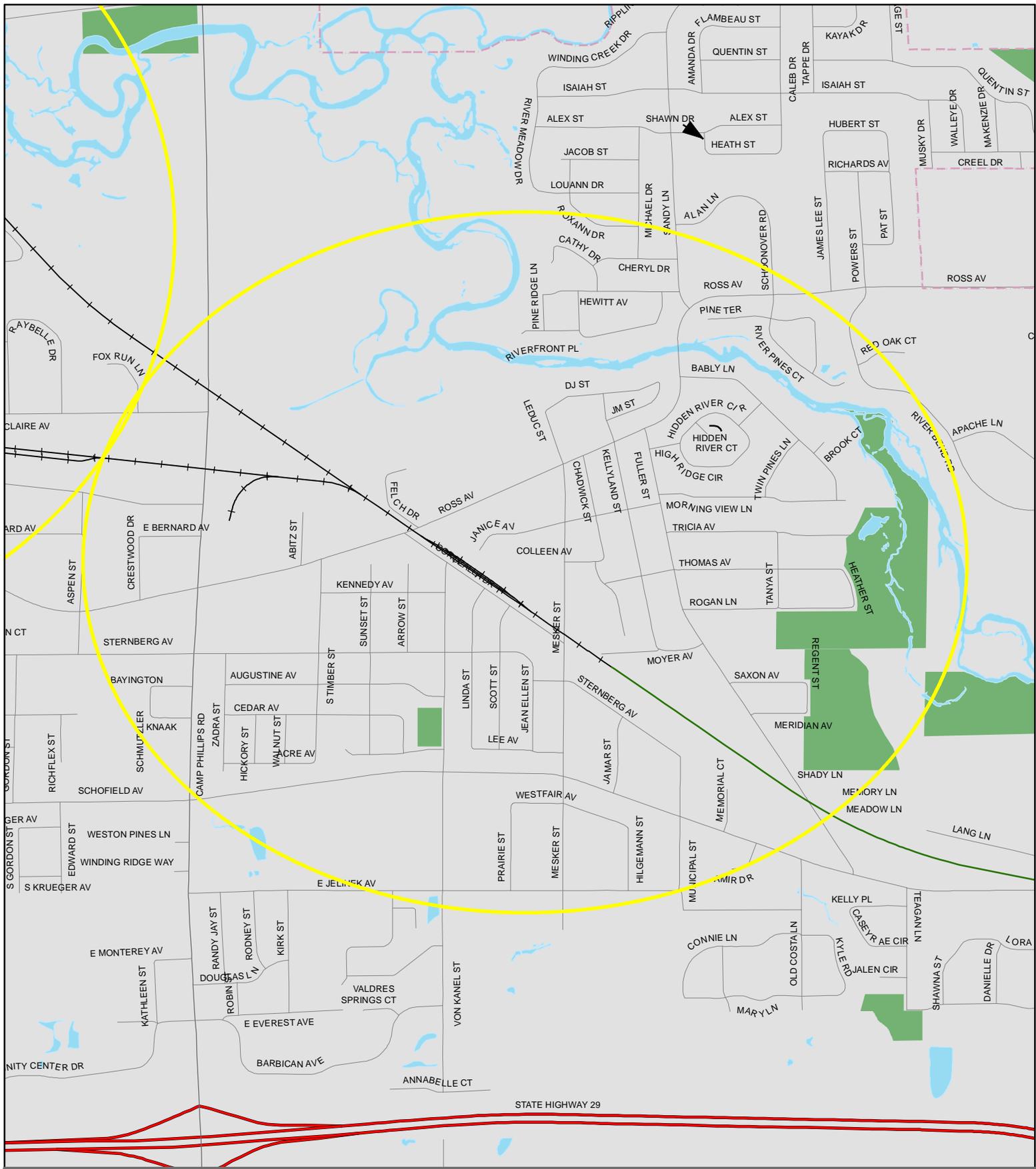
Railroad Right of Way Trails

-  Railroad
-  Local Roads
-  State & US Highways
-  MountainBay Trail
-  2002 Planning Boundary
-  Municipal Boundary
-  Parks
-  Water Areas



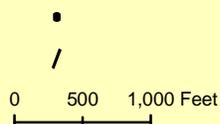
0 1.5 3 Miles

Map Created 1/17/2008
Marathon County CPZ Dept

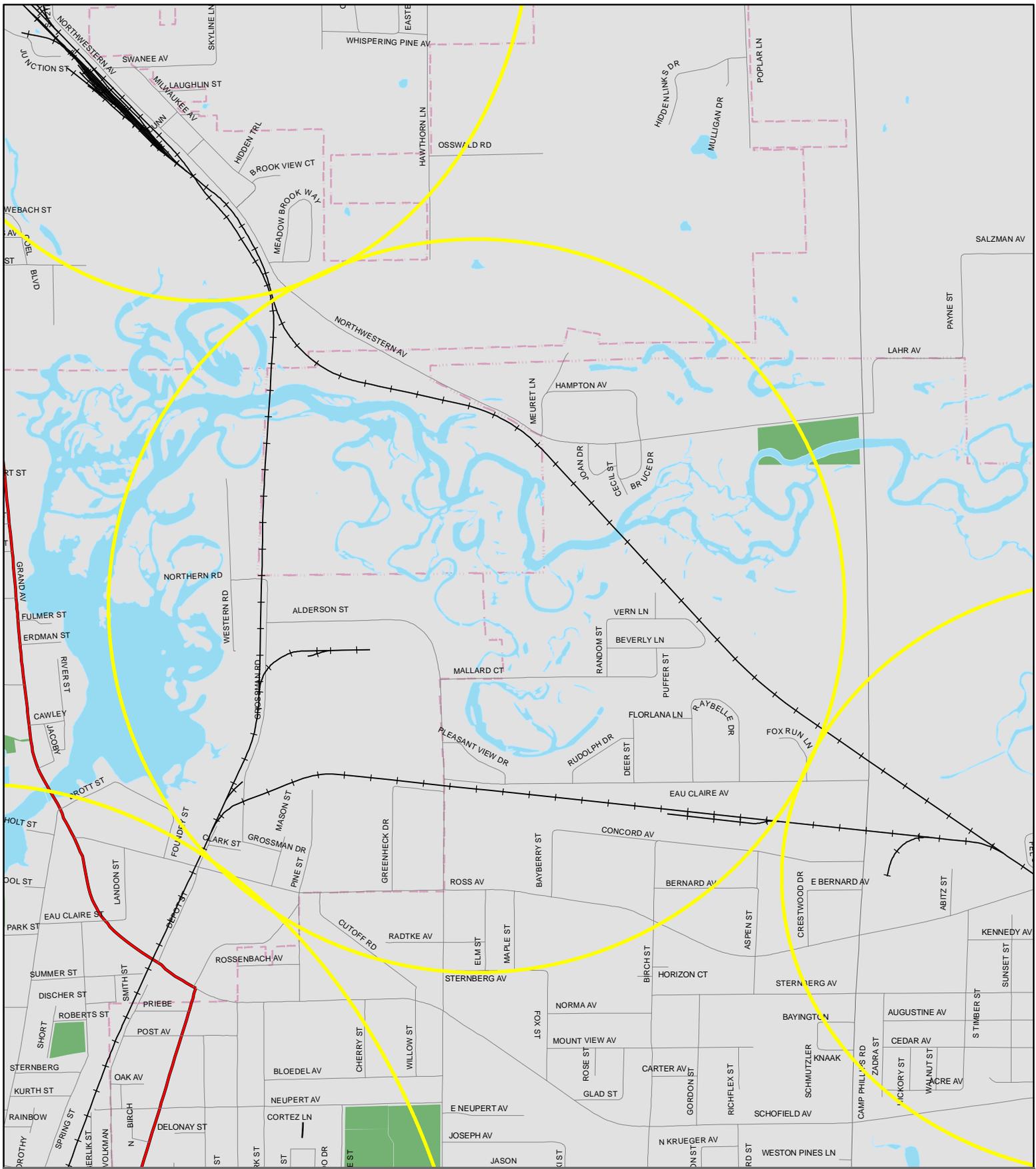


Mountain Bay Trail to Camp Phillips Rd

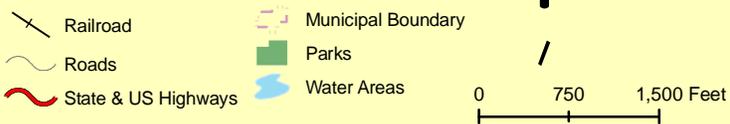
- Railroad
- Mountain Bay Trail
- Local Roads
- State & US Highways
- Municipal Boundary
- Parks
- Water Areas



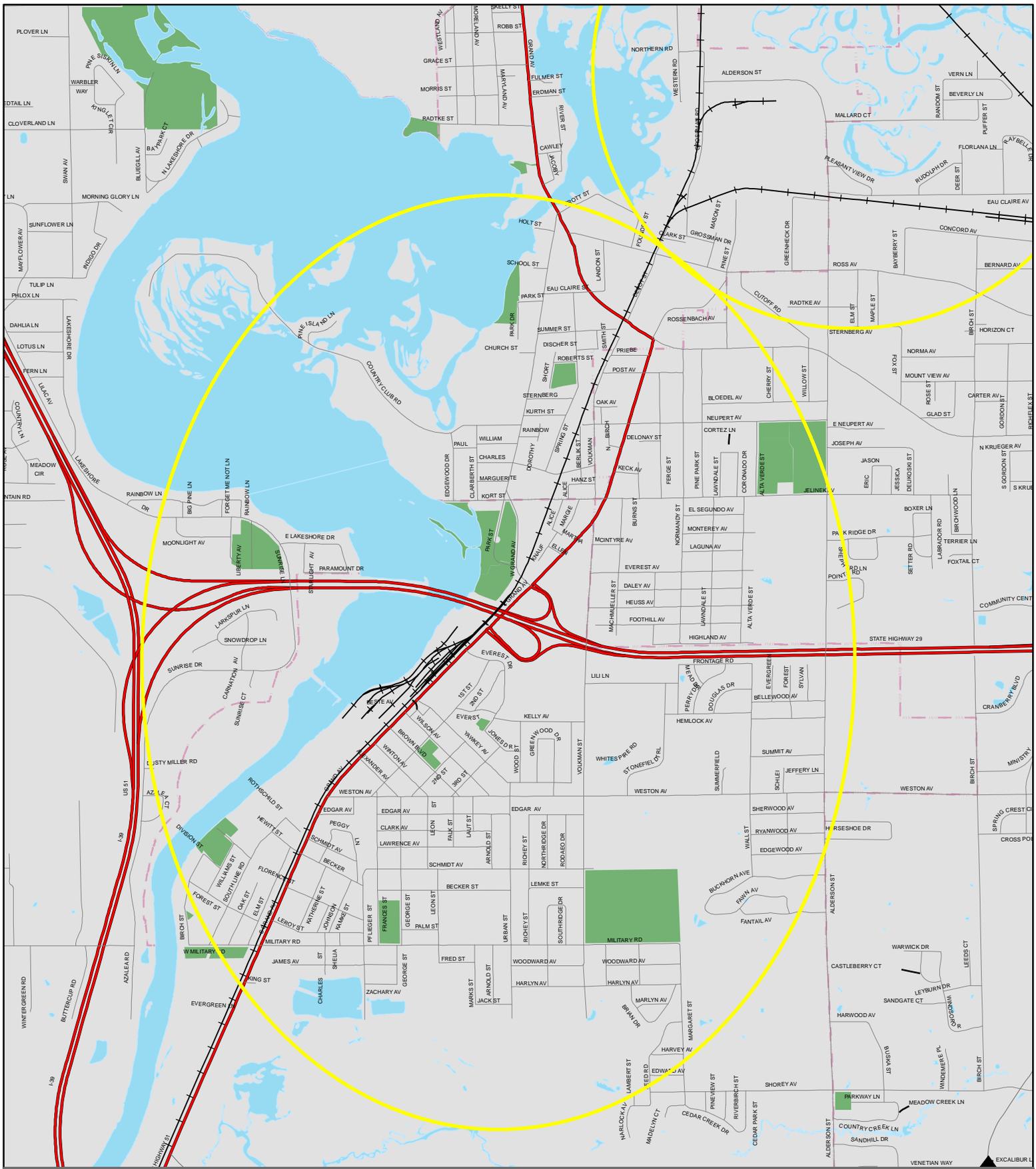
Map Created 1/17/2008
Marathon County CPZ Dept



Schofield Triangle

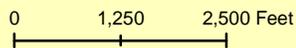


Map Created 1/17/2008
Marathon County CPZ Dept

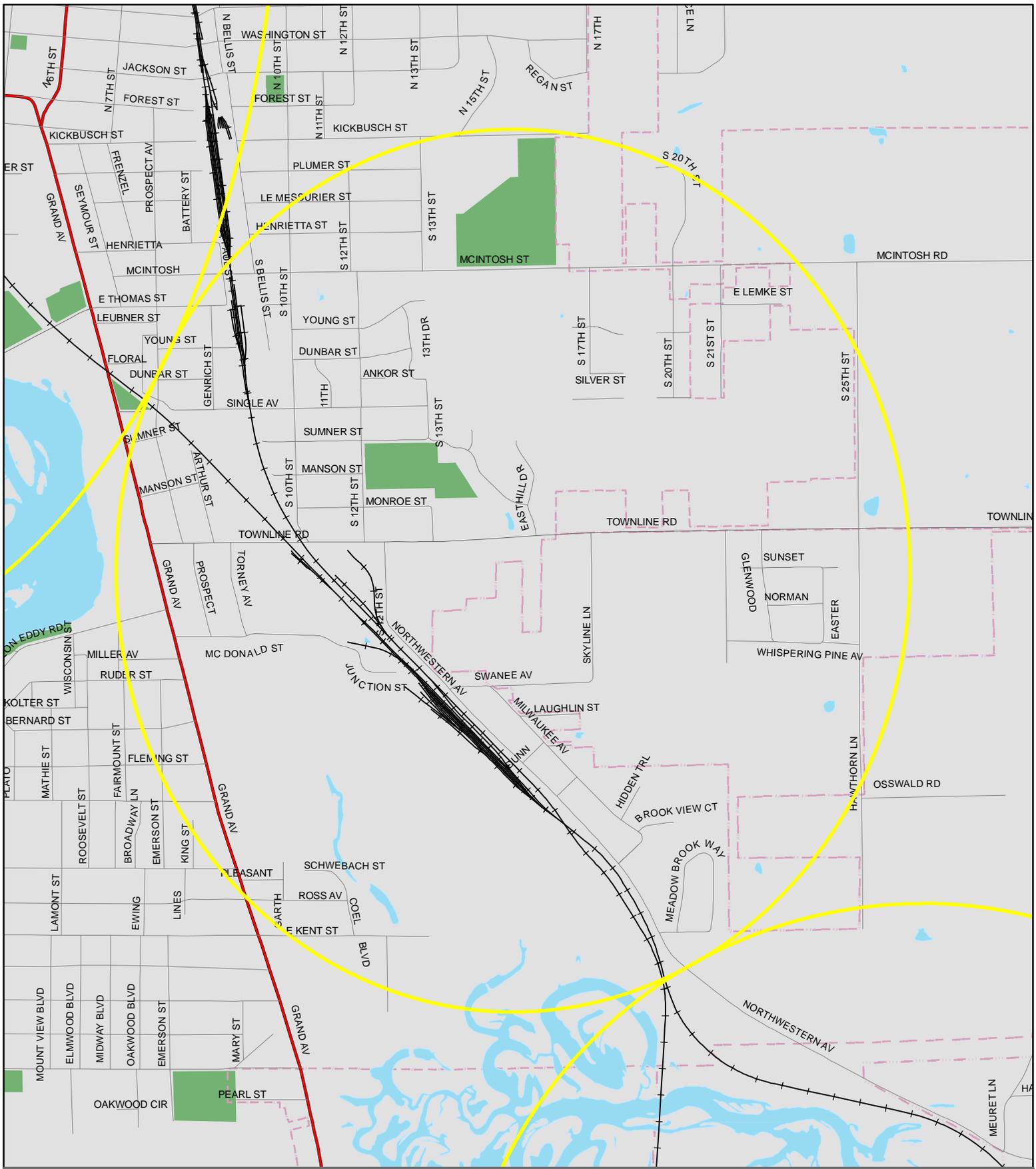


South to Rothschild

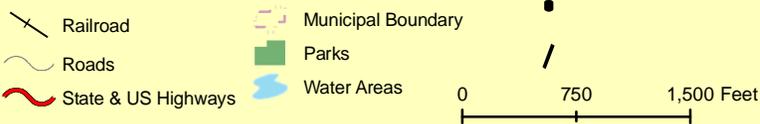
-  Railroad
-  Municipal Boundary
-  Roads
-  Parks
-  Water Areas



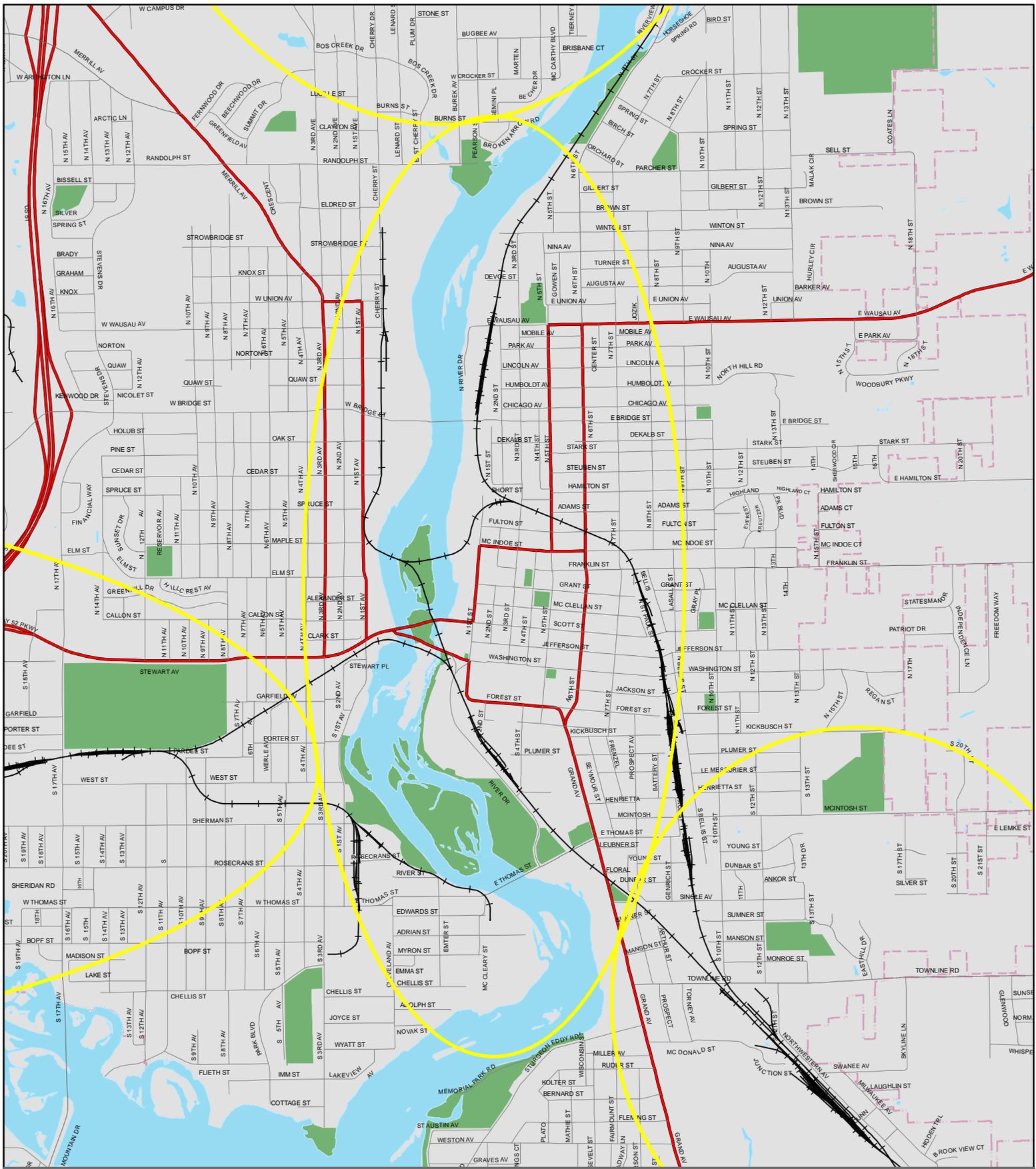
Map Created 1/17/2008
Marathon County CPZ Dept



Rail Yard to Downtown

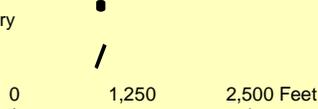


Map Created 1/17/2008
Marathon County CPZ Dept

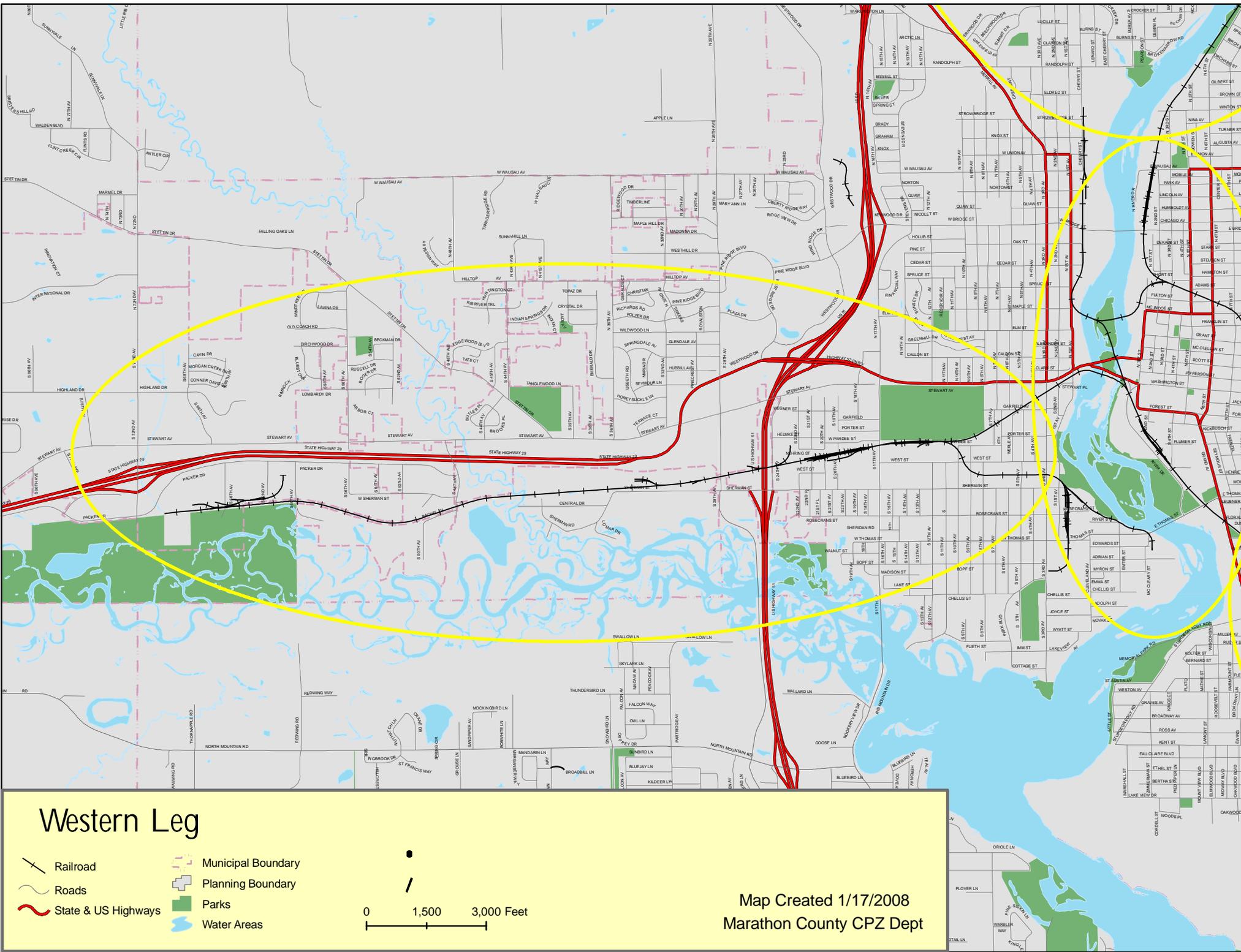


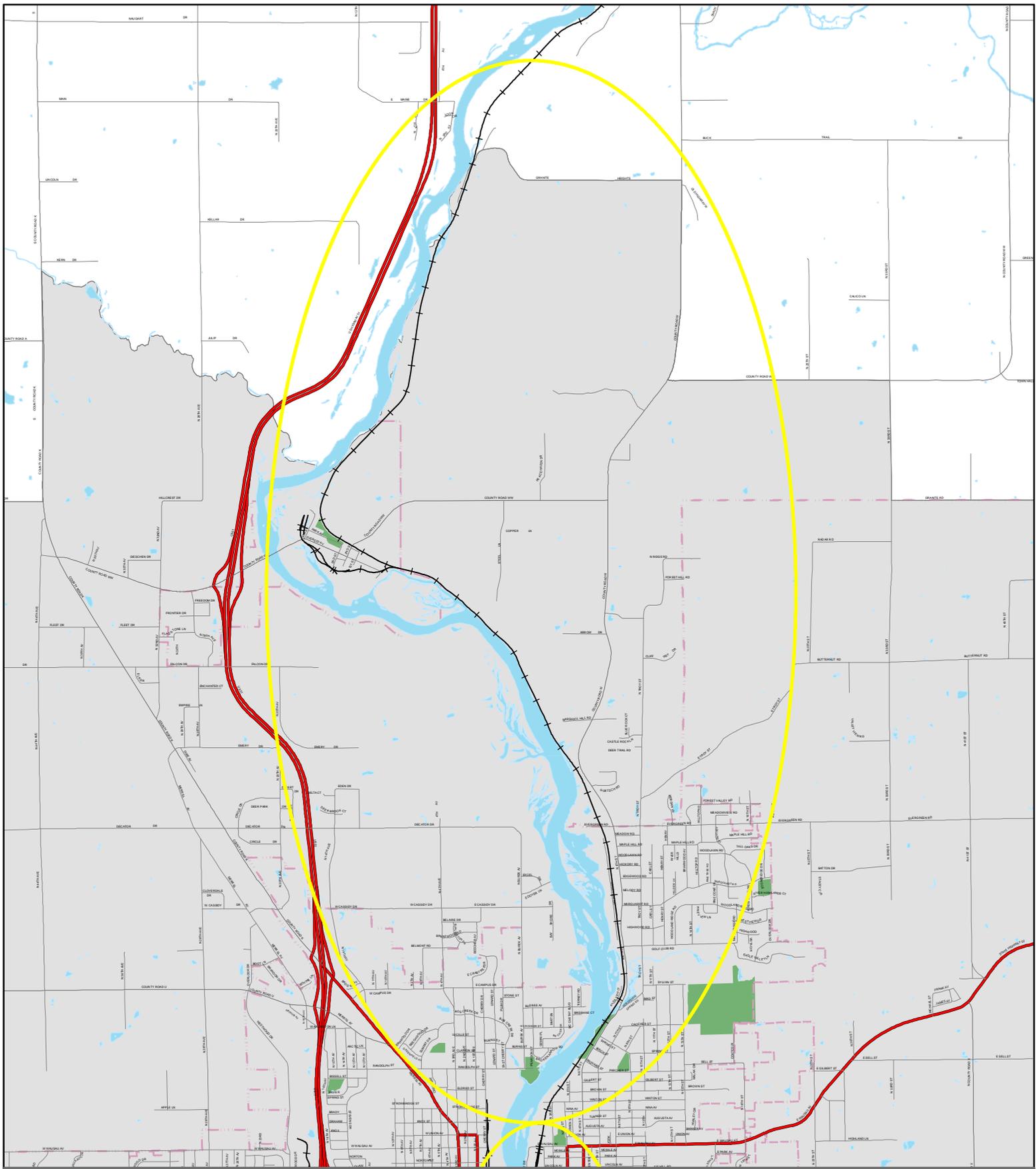
Riveredge Area

- Railroad
- Municipal Boundary
- Roads
- Parks
- State & US Highways
- Water Areas



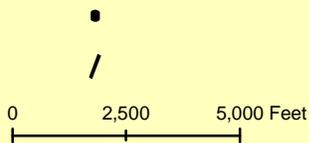
Map Created 1/17/2008
Marathon County CPZ Dept





Northern Area

-  Railroad
-  Roads
-  State & US Highways
-  Municipal Boundary
-  Planning Boundary
-  Parks
-  Water Areas



Map Created 1/17/2008
Marathon County CPZ Dept

Appendix F:

Project Sheets for Select Facilities

Appendix F: Project Sheets

The following project sheets include project descriptions, location maps (as applicable), a summary of issues and recommended improvements, comments, and design details. Additional information regarding specific roadway improvements can be found in the Implementation Table (Table 8.3). The project sheets are numbered in no particular order and were developed for discussion purposes.

Project Sheet #1 (See Map #1)

Project Title: 28th Avenue Bike Lane

Project Description

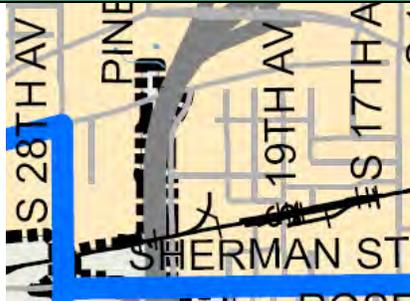
28th Avenue offers an alternative north/south route into and out of the Wausau metro area. Conditions south of Sherman St. on 28th are good for bicycling, but north of Sherman St., conditions deteriorate. Consider separate bike/ped facilities on 28th Ave. between W. Stewart Ave and Sherman St.

28th Ave is scheduled for reconstruction in 2009. The recreation trail at CTH R will be extended from Sherman to Stewart. The outside travel lane will be extended to 14' for on-street accommodation of bicycles. At Stewart the trail will cross to the east side of the road from Stewart north to 52 Pkwy on the east side of 28th Ave.



Bicyclists are forced to use sidewalks in multiple locations. These bicyclists are using the sidewalks on S. 17th Ave.

Improvements Summary



Issues:

- No clear way exists to bike north from Sherman Street from the Wausau metro area.
- Poor surface conditions and heavy traffic mark 28th Ave. north of Sherman St.
- As 28th Ave. travels south of Sherman St it links up with CTH R which is an important connection into the Rib Mountain area.

Improvement Options:

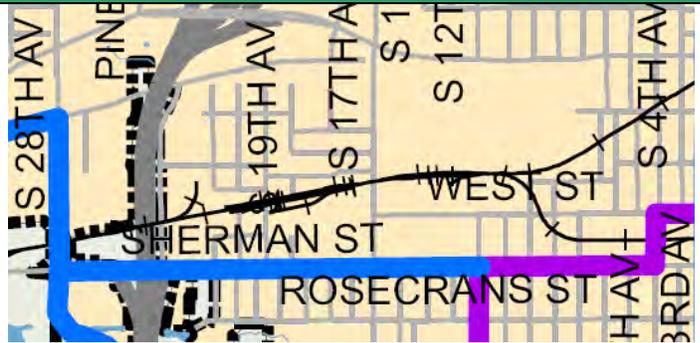
- 28th Ave is scheduled for improvement in 2009 including a recreation trail from CTH R and wide outside travel lanes. The wide curb lanes could be striped if the inside travel lanes are reduced to 11 feet. Make a formal request to WisDOT and the City of Wausau to consider reducing the inside travel lanes to 11-feet and striping the outside travel lanes.
- Add wayfinding signage to W. Stewart Ave west of 28th Ave. where an existing "Bike Route" is proposed from the town of Stettin.
- Stripe the curb lane when 28th Ave is reconstructed and include appropriate "Bike Route" signage.
- Include appropriate crosswalks from the proposed recreation trail across 28th Ave. Consider installing a pedestrian median to provide refuge at mid-crossing.

Project Sheet #2 (See Map #1)

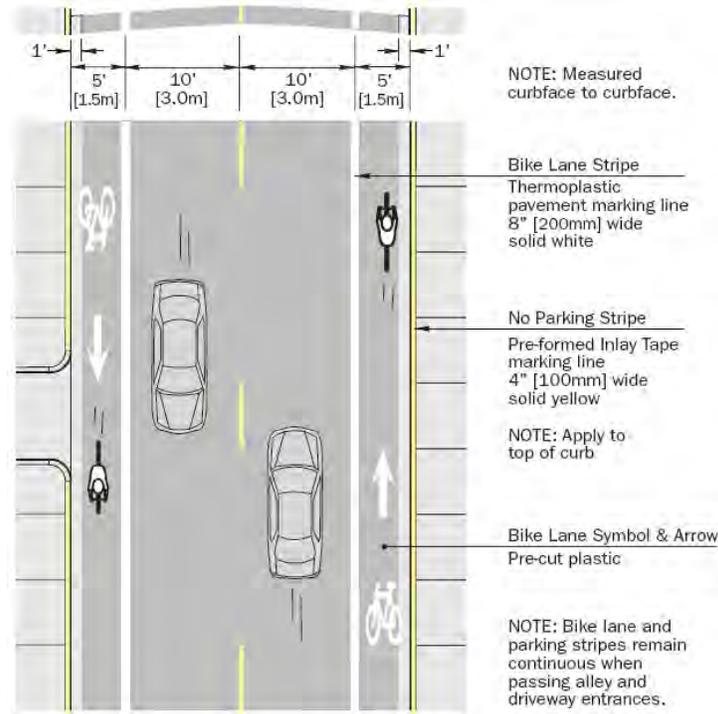
Project Title: Sherman Street Bike Lane

Project Description

Sherman Street runs parallel to Stewart Avenue, but does not handle nearly the traffic volume as Stewart Ave. It could serve as an alternative bicycle route to downtown Wausau from the west. Consider designating Sherman Street from 28th Avenue to 1st Avenue a bicycle route complete with striping and signage. The roadway is being redesigned from rural two-lane to urban four-lane. From 28th Ave to 17th Ave there will be curb, gutter and sidewalk. It will also have 14' outside lane and curb section.



Improvements Summary



Bike Lane on two-way street (City of Chicago, IL)

Issues:

- Sherman St. provides moderate bicycling conditions east of 17th Ave., but conditions for travel through the urbanized area is difficult.
- For much of the road, the right of way could facilitate the addition of a bicycle lane in each direction.

Improvement Options:

- Consider striping and signing a bicycle lane on Sherman St. according to the MUTCD from 28th Avenue to 1st Avenue. Post Bike Lane signs at the beginning of a bike lane and every one-half mile of continuous bike lane. A "Bike Route" sign should also be installed where the bike lane changes to a bike route.
- In 2010, the City plans to finish upgrading Sherman St. from a two-lane to four-lane road with a 14' outside lane including curb, gutter and sidewalk. The wide curb lanes could be striped if the inside travel lanes are reduced to 11-feet. Make a formal request to the City of Wausau to consider reducing the inside travel lanes to 11-feet and striping outside the travel lanes.

Project Sheet #3 (See Map #1)

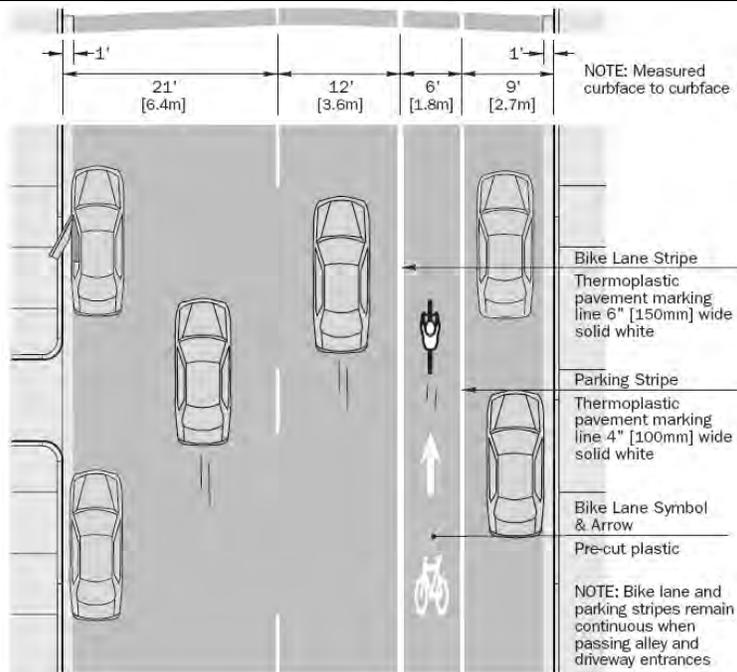
Project Title: Downtown Bike Lanes

Project Description

While 1st Avenue, 3rd Avenue, 5th Street, and 6th Street are currently one-way streets identified as moderate areas for bicycling, their condition would be greatly enhanced with the addition of marked bicycle lanes. Striped and signed bicycle lanes from Forest Street to E. Wausau Avenue should be considered on 5th and 6th Streets. From Thomas Street to Bridge Street west of the Wisconsin River on 1st and 3rd Avenues, striped and signed bicycle lanes should also be investigated.



Improvements Summary



Bike Lane on wide one-way street with parking on both sides. (City of Chicago, IL)

Issues:

- Existing two and three lane one-way streets could provide convenient bicycle access to downtown Wausau businesses and services.
- The streets currently provide no dedicated facilities for bicycle accommodation but there is adequate room to do so.

Improvement Options:

- Consider striping and signing a bicycle lane on 1st Avenue, 3rd Avenue, 5th Street, and 6th Street.

Project Sheet #4 (See Map #1) Project Title: Thomas Street Bike Lane

Project Description

Connectivity between downtown Wausau and the surrounding area is rather limited. Only three bridges provide access to downtown from the west bank of the Wisconsin River and Thomas Street is signed as a "Bike Route". To facilitate safer bicycle travel to and from the Wausau metro area, improve conditions on Thomas Street and delineate bicycle travel lanes. Pedestrian accommodation is provided on the north side of the bridge via a barrier sidewalk. Though some bicyclists utilize this facility, the width is not sufficient for two-way bicycle traffic.

Improvements Summary



Issues:

- The Thomas Street bridge over the Wisconsin River contains narrow travel lanes.

Improvement Options:

- Consider striping and signing bike lanes in each direction from 3rd Avenue to Grand Avenue, excluding the Thomas Street Bridge.
- Install "Share the Road" signage so motorists know bicyclists will be operating on the bridge. Consider advising cyclists take the full lane in winter conditions when lane widths are narrowed.
- As bridge is replaced or redecked, install bicycle lanes and sidewalks on both sides of the bridge.



Project Sheet #5 (See Map #1)

Project Title: Bridge Street

Project Description

Connectivity between downtown Wausau and the surrounding area is rather limited. The Bridge St. bridge is one of only three bridges providing access to downtown from the west bank of the Wisconsin River. To facilitate bicycle travel within and to/from the Wausau metro area, include bicycle lanes, pavement markings, and “Share the Road” signage.

Automobiles and bicyclists would have plenty of room to safely operate on eastbound side of Bridge St.



Improvements Summary



Above: proposed additional signage.

Below: existing signage.



Issues:

- Bridge St. is a major thoroughfare into and out of Wausau and is marked by busy intersections and heavy automobile traffic.
- Bridge St. may be wide enough to stripe bicycle lanes.
- There is a significant amount of traffic on Bridge St.
- It is currently signed as a “Bike Route”.

Improvement Options:

- Evaluate lane widths for construction of a bicycle lane in each direction before and after bridge. There may also be room on the bridge if lanes are remarked.
- Post “Share the Road” signage to remind motorists to share the road with bicycles on the bridge.
- As bridge is replaced or redecked, accommodate bicyclists and pedestrians with sidewalks, bicycle lanes and signage on both sides.

Project Sheet #6 (See Map #1)

Project Title: Grand Ave Alternative

Project Description

Heavily traveled, Grand Avenue provides virtually the only connection between Schofield and Wausau. Existing right-of-way has been maximally extended in all directions. To provide a bicycle route, investigate alternative bicycle routes parallel to Grand Avenue and sign accordingly.

Improvements Summary



Issues:

- Though pedestrian facilities exist, bicycle facilities on Grand Ave. are severely lacking.
- Unable to extend right-of-way for bike lane.
- The intersections of Grand Ave. and Thomas St. and Grand Ave. and Sturgeon Eddy present hazards to bicyclists.
- The Grand Ave. bridge is adequate for bicycle travel but poor conditions on either side limit its use.
- Future development plans for the airport and health care center may not provide for a multi-use trail along the river.

Improvement Options:

- Build an off-street trail adjacent to the east shore of Lake Wausau as outlined in the 1995 River Edge Master Plan. This linkage should extend from Radtke Park north to Memorial Park along the river bank. Additional opportunities exist to link in with the River Edge Trail north of E. Thomas St. if additional easements can be located west of Grand Ave and north of Sturgeon Eddy Rd.
- Per the River Edge Master Plan, connect Wisconsin River trail with pedestrian facilities that could be developed on the former Holtz-Krause Landfill and 50-acre parcel of City land on the north shore of the Eau Claire River Flowage. The River Edge Trail could also connect with the Mountain-Bay Trail.
- Promote existing bike routes around Grand Avenue including Emerson St west of Grand Ave and Prospect Ave east of Grand Ave.
- Improve on-street transition between Sturgeon Eddy Rd and Townline Rd where bicyclists need to use Grand Ave. Add signage instructing bikes to use sidewalk and ensure adequate directional signage.

Project Sheet #7 (See Map #1)

Project Title: Stewart Avenue Bike Lane

Project Description

West Stewart Avenue has become a major retail destination. Bicycle and pedestrian facilities are variable, and facilities should be continuous along Stewart Ave. to access these and other Wausau amenities. The 1996 Long Range Transportation Plan (LRTP) identified Stewart Avenue (west) from 17th Avenue to 28th Avenue as a congestion-prone street with “many access points and no pedestrian and bike facilities.” The LRTP also highlighted the confusing Stewart Avenue cul-de-sac and lack of connection to Marathon Park from Stewart Avenue. Stewart Avenue has been reconstructed and widened. Access to commercial areas is better defined, but the cul-de-sac intersection remains chaotic. Bicycle and pedestrian facilities should bridge 17th Avenue at Stewart Ave. A section of Stewart Ave from S. 28th Ave. to 48th Ave. should be posted as a bicycling route. A formal bicycle and pedestrian connection from the cul-de-sac at 17th Ave. should be installed. Long-term, the entirety of Stewart Ave should be considered as a bicycle route as street improvements are constructed to accommodate on-street bicycle travel.

Improvements Summary



Issues:

- Heavy traffic and a lack of facilities at the intersection of 17th Ave. and Stewart Ave. present significant hazards for bicyclists and pedestrians.
- Bikeways and walkways do not connect Stewart Ave. and 17th Ave. hindering access from Marathon Park to the Stewart Ave. business/retail district.
- Stewart Ave. has no shoulder or bicycle lane traveling east bound towards downtown Wausau.
- West of the STH 51 underpass, Stewart Ave. may be wide enough to accommodate bicycle lanes.

Improvement Options:

- Install bicycle route signage on Stewart Ave. between 48th Ave. and S. 28th Ave.
- Design and install a bicycle and pedestrian connection from eastern Stewart Ave. cul-de-sac to 17th Street. Install zebra stripe crosswalk connecting the cul-de-sac with Marathon Park. Perform engineering analysis to determine location of crosswalk south of the intersection. Install pedestrian crossing signs.
- Link the eastern cul-de-sac of Stewart Ave across 17th Ave to Marathon County Park. There pedestrians and bicyclists could use the existing trail along Stewart.

Project Sheet #8 (See Map #2) Project Title: Main Street Bridges

Project Description

In the city of Mosinee, the STH 153 (Main Street) high and low Wisconsin River bridges will be reconstructed in 2008 and 2009. Five-foot paved striped shoulders and a 10-foot wide sidewalk (south side) will be provided along the bridges and bridge approaches for bicycle and pedestrian accommodations.

Improvements Summary



Issues:

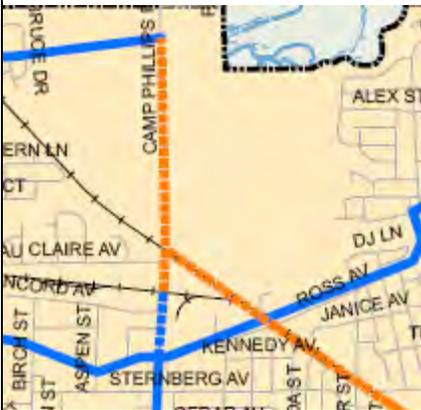
- The bridges have three-foot paved shoulders which make them adequate for biking. One five-foot sidewalk is currently provided along the south side.

Improvement Options:

- Construction as specified by WisDOT will provide sufficient on- and off-street accommodation for pedestrians and bicyclists.
- Update bridge with appropriate Bike Route signage before and after the bridge.

Project Sheet #9 (See Map #4, #6) Project Title: CTH X

Project Description



Connecting surrounding municipalities with safe bicycling facilities greatly enhances the potential to replace automobile trips with bicycle trips. Allow and facilitate bicycles on CTH X and extend the Mountain-Bay Trail. By extending the Mountain-Bay Trail to CTH X, a bike corridor will be created that links Wausau to Green Bay.

Improvements Summary

Issues:

- CTH X (Camp Phillips Road) could be a major north/south route but current conditions preclude this segment as an alternate corridor.
- With proper bicycle facilities, CTH X could connect central Wausau with the City of Schofield, the Mountain-Bay Trail, the Village of Weston, and the Town of Ringle.
- The Mountain-Bay Trail in Weston currently ends on Municipal Street. The railroad track along the trail has been abandoned from Municipal St. to Mesker St. The railroad track from Mesker to CTH X is currently not in use.
- The bridge crossing the Eau Claire River, which is structurally deficient according to WisDOT, is not suitable for cycling.

Improvement Options:

- WisDOT has approved funding for the construction of a multi-use path along the west side of Highway X from Bernard Ave. north to Northwestern Ave. connecting Weston to the City of Wausau. The local traffic authority should also consider adding 14' wide outside curb lanes in this section for bicycle accommodation.
- As upgrades occur, stripe bicycle lane.
- Extend Mountain-Bay Trail along the abandoned Canadian National rail line from to Camp Phillips Road (CTH X). Because this section of rail carries trains very infrequently, implement Rails with Trails with a paved bicycle/pedestrian path within the existing railroad right-of-way. As an alternative, abandon the railroad line from Mesker St. to CTH X and resurface as a multi-use path.
- Install multi-use paths linking Mountain-Bay Trail with Riverside School to accommodate children walking or biking to school who live in the Riverside area or along CTH J.
- Look for opportunities to connect the Mountain-Bay Trail to Marathon County Park via Thomas Street or Stewart Avenue.
- Improve CTH X from STH 153 to Northwestern Avenue, including the bridge crossing the Eau Claire River. The Camp Phillips bridge, scheduled for reconstruction in 2010, should provide bicycle lanes, striping, and signage.
- Sign all roads as bicycle routes to increase motorist awareness of bicyclists.

Project Sheet #10 (See Map #5, #6)

Project Title: Rothschild to Kronenwetter

Project Description

Connecting surrounding municipalities with safe bicycling facilities greatly enhances the potential to replace automobile trips with bicycle trips. Increase access from the bicycle and pedestrian bridge over the Wisconsin River to the street grid east of BUS 51. Also, increase access from the rural areas to Old HWY 51.

Improvements Summary



Issues:

- It is desirable to connect residential neighborhoods in Rothschild and Kronenwetter with the paper mill and other businesses.
- Path would tie into the bike/pedestrian bridge currently under construction.

Improvement Options:

- WisDOT has scheduled six-foot paved striped shoulders and a nine-foot sidewalk (north side) on the Kowalski Rd. overpass. Four-foot paved shoulders (both sides) and a nine-foot sidewalk will extend from Old 51 to Kronenwetter Dr.
- Extend W Military Rd to E Military Rd and provide bicycle and pedestrian facilities
- Post route signs through Rothschild
- Install a crosswalk across S. Grand Ave at W. Military Rd.

Project Sheet #11 (See Map #11)

Project Title: CTH N, CTH NN

Project Description

Connecting surrounding municipalities with safe bicycling facilities greatly enhances the potential to replace automobile trips with bicycle trips. Extend bicycle facilities on both CTH N & CTH NN. These county highways provide direct access between the Wausau area and town roads. Improving these roads would also allow for greater multimodal access to Rib Mountain State Park and Nine Mile Recreation Area (see previous Project Sheet).

Improvements Summary



Photo of CTH KK with improved shoulder. Improvements to CTH N should replicate these facilities on both sides of the roadway.

Issues:

- CTH N between the Towns of Rib Mountain and Marathon provides an important connection between Rib Mountain State Park and Nine Mile Recreation Area. There are not many parallel alternatives to CTH N.
- CTH N road conditions are poor with no shoulder or other provisions for bicycles.
- Retail in this area is hard to reach without an automobile.
- CTH NN (N. Mountain Road) provides good conditions east of Grouse Lane but conditions deteriorate in the rural areas in the Town of Marathon.
- Vehicle speed endanger bicyclists

Improvement Options:

- Study feasibility of constructing paved shoulders on both sides of CTH N from where paved shoulders stop just west of CTH KK to Thornapple Rd (at minimum).
- Consider adding paved shoulders on CTH NN west of Grouse Lane.
- Sign CTH N and CTH NN as bicycle routes to increase motorist awareness of bicyclists.

Project Sheet #12 (See Map #11)

Project Title: Rib Mountain State/Nine Mile Recreation Area

Project Description

Increase mountain biking opportunities in Marathon County with the expansion of Rib Mountain State Park and Nine Mile Recreation Area trail network. Investigate opportunities to connect Rib Mountain State Park and Nine Mile Recreation Area.

Improvements Summary



Rib Mountain's peak in winter (DNR)

Issues:

- West of the Wisconsin River, the County has two significant recreation areas: Nine Mile Forest & Rib Mountain State Park.
- The trail system in Rib Mountain State Park does not form a continuous loop and requires bikers to enter and exit on the same path.
- Access to Nine Mile Recreation Area requires use of segmented town roads, or CTH N which lacks adequate road shoulders west of Bittersweet Rd.

Improvement Options:

- Work with state officials to encourage development of mountain biking trails and identify access points to increase off-road access to Rib Mountain State Park.
- Improve S. Mountain Rd (CTH N) east of Thornapple Rd, and N. Mountain Rd east of Whippoorwill Rd. This would complete the loop bounded by N. Mountain Rd, CTH R, S. Mountain Rd, and Thornapple Rd and provide access to both recreation areas. Nine Mile Recreation Area would be access off S. Mountain Rd via Red Bud Rd. Sign this route with unique wayfinding signage. (See also CTH N, CTH NN Project Sheet)

Project Sheet #13 (See Map #11)

Project Title: Bike/Ped Bridge to CTH R

Project Description

Connecting surrounding municipalities with safe bicycling facilities greatly enhances the potential to replace automobile trips with bicycle trips. Facilitate bicycle access from the bicycle and pedestrian bridge over the Wisconsin River from Rothschild to CTH R and Rib Mountain State Park.

Improvements Summary



Issues:

- There is a bicycle/pedestrian bridge at Sunrise Lane that crosses the Wisconsin River connecting Rib Mountain and Rothschild, but wayfinding on the Rib Mountain side is not intuitive and is not signed.
- No clear and easily-accessible bicycle route exists from Sunrise Lane to the bicycle and pedestrian bridge east of USH 51.

Improvement Options:

- Post signage clearly directing people to the bicycle/pedestrian bridge.
- Enlarge Rib Mountain trail head area to facilitate wayfinding, clearly demarcate the bicycle/pedestrian bridge, and indicate the route from the bridge to CTH R via the underpass located near Morning Glory Ln.
- Provide alternate access to the Rib Mountain side of the bridge from Azalea Road.



USH 51 underpass linking Morning Glory Ln to CTH R

Project Sheet # 14 (See Map #13)

Project Title: CTH KK

Project Description

Connecting surrounding municipalities with safe bicycling facilities greatly enhances the potential to replace automobile trips with bicycle trips. Allow and facilitate bicycles on CTH KK & STH 153.

Improvements Summary



Issues:

- West of the Wisconsin River, the County has two significant recreation areas: Nine Mile Forest & Rib Mountain State Park.
- Bicycle access from Mosinee to Nine Mile Forest would be greatly enhanced if the portion of CTH KK from Burma Rd south to CTH B were improved.
- Heavy traffic speed on Main Street (STH 153) and poor bridges in the City of Mosinee hinder bicyclists.

Improvement Options:

- Construct paved shoulders on both sides of CTH KK from CTH B north to Burma Rd.
- Sign CTH KK and STH 153 as a bicycle route to increase motorist awareness of bicyclists. Post "Share the Road" signs.
- The Main Street bridge is scheduled for reconstruction in 2008-09 including five-foot striped shoulders and a 10-foot sidewalk on the south side. Ensure proper signage is installed to convey on- or off-street accommodation for bicycles (currently bikes are to use sidewalk).