CASPER AREA
METROPOLITAN PLANNING ORGANIZATION
Casper - Mills - Evansville - Bar Nunn - Natrona County

TOOLE DESIGN

BICYCLE AND PEDESTRIAN MASTER PLAN

OCTOBER 2021 FINAL

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ACKNOWLEDGEMENTS

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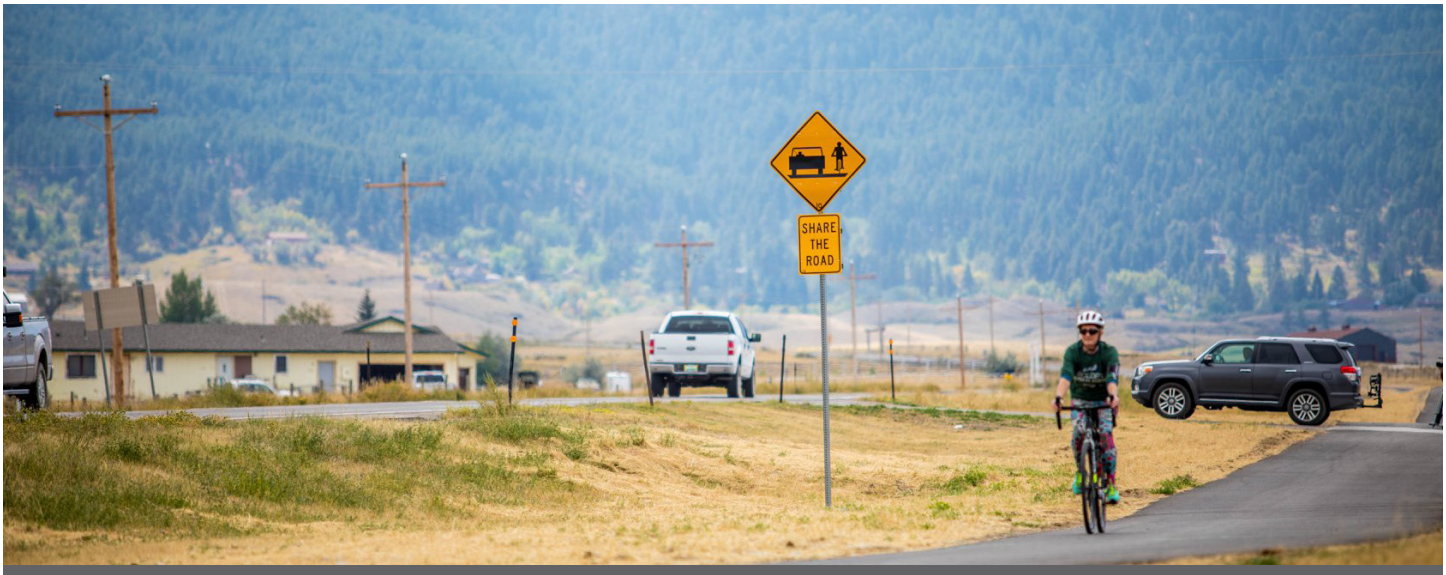
CHAPTER 01
INTRODUCTION

Introduction

The Casper Area Bicycle and Pedestrian Master Plan (Plan) is an update to the 2013 Casper Area Trails, Paths, and Bikeways Plan. The Casper Area encompasses the Cities of Casper and Mills, Towns of Bar Nunn and Evansville, and portions of Natrona County. This Plan builds on the previously recommended projects and policies while recognizing changes to the Casper area over the past eight years, evaluates progress and continued needs, and develops an actionable plan for the region's active transportation system.

Benefits of Multimodal Transportation Planning

For many years, transportation plans across the United States focused narrowly on motor vehicle travel and mitigating congestion. This approach does not include the many people who travel by walking, bicycling, and transit. Over the past decade, there has been a shift in focus toward planning for places that are walkable, bikeable, and more human-scale. This is often referred to as active transportation. For the purposes of this plan, the term active transportation generally refers to pedestrian modes such as walking and wheelchairs; bicycling; and other forms of self-propelled transportation. It encompasses trips made for any purpose including commuting, utility, school, recreation, or leisure trips. Focusing efforts and funding toward building a transportation network that makes it easy and safe to use all modes makes cities and towns stronger, more resilient, more inclusive, and healthier.



People bicycling and driving are among the many users of Casper Mountain Road (*credit: Platte River Trails Trust*).

PLAN GOALS

The Casper Area Bicycle and Pedestrian Master Plan is oriented around five key goals, which set forth a clear direction for investments in the active transportation network.

Safety and Comfort: reduce the number and severity of crashes involving pedestrians and bicyclists by providing ***safe mobility options*** that are comfortable to all, regardless of age or ability.

What does it mean to have safe mobility options?

For people walking, this means having high-quality sidewalks and safe crossing opportunities. For people biking, this means having bicycle facilities with context-appropriate separation from motor vehicles.

Community: Foster a culture of respect and responsibility for all road users and promote awareness of active transportation routes and options through education, and encouragement programs.

Connectivity: Increase the viability and convenience of walking and biking by providing intuitive and well-connected bicycle and pedestrian networks that increase direct access to schools, trails, transit, and other important destinations.

Equity: Provide equal access to bicycling and walking opportunities for all members of the community.

Increase in Non-Car Trips: Increase the percentage of walking, bicycling, and rolling trips for all purposes.

These goals offer a foundation for a transportation system that meets the needs of people of all ages and abilities. The goals serve as a guiding framework throughout the Plan and were used to facilitate the development of the Plan's recommendations to best serve Casper Area community members. These goals were informed by related adopted plans, input from Casper Area Metropolitan Planning Organization (MPO) staff, the advisory committee, partner municipalities, and industry trends.

Planning Process

The Casper Area Bicycle and Pedestrian Master Plan represents the collective efforts of MPO staff, external stakeholders, and community members to identify opportunities and barriers to expanding active mobility around the region, and the steps it will take to seize those opportunities. What follows is a brief summary of the accelerated planning process.

1 Public and Stakeholder Engagement

To ensure the Plan reflects the needs and priorities of the people throughout the Casper Area, public and stakeholder engagement invited those who live, work, and play in the region to participate in the planning process through online involvement, pop-up open houses, and stakeholder meetings.

2 Existing Conditions Evaluation

Understanding the state of active transportation in the Casper Area today began with an evaluation of who lives in the region, how we currently travel, and what physical and programmatic infrastructure is in place to enable easy walking and bicycling. This evaluation considered previous and ongoing planning efforts as well as travel patterns, crash trends, and potential demand for walking and bicycling.

3 Recommendations development

The Plan recommends both bikeway and sidewalk infrastructure projects, as well as policies and programs to improve and expand active mobility throughout the region. These recommendations represent a long-term vision for the active transportation network for the Casper Area. MPO staff, alongside member cities and towns, should revisit and adapt these recommendations periodically to address changing needs and transportation conditions.

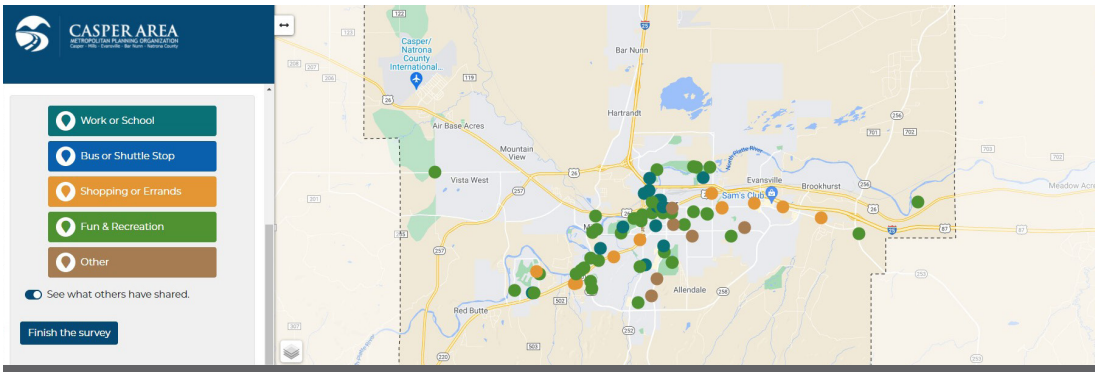
Community members were engaged in plan development.

4 Prioritization

In addition to establishing bikeway and sidewalk networks, the Plan scores and ranks project recommendations, informing Plan implementation. Prioritization gives weight to those projects that best serve community needs and values in the near-term and helps the MPO allocate public resources most effectively.

5 Implementation Strategy

Finally, the Plan sets out a roadmap for near-term action to catalyze progress toward the long-term vision for bicycling and walking. The implementation strategy provides guidance for what to do, when, and by whom to realize a more walkable and bikeable transportation future.



An online map survey was one method of engaging public input in the plan.

Public Engagement

The Casper Area is comprised of people living in, working in, and visiting the cities of Casper and Mills, the towns of Evansville and Bar Nunn, and the unincorporated communities within Natrona County connecting them. To ensure that the Bicycle and Pedestrian Plan reflects the needs and priorities of the community, the planning process included a series of public and stakeholder engagement activities. Because community engagement was conducted on an accelerated timeline in keeping with the rest of the planning process, the public involvement plan prioritized gathering detailed feedback and targeting communities historically left out of planning efforts. Key engagement strategies included:

- Stakeholder Meetings with the public and private partner organizations
- An Online Map Survey that collected public comments about desired destinations and barriers for people bicycling and walking
- A Pop-Up Open House that included informational boards and collected public comments on the draft plan and current conditions
- An Outreach Station at the David Street Station Farmers' Market with informational boards and public comment collection
- Flyers and postcards distributed to community partners

Input from the public emphasized the following priorities:

The Casper Area's rich trail network was frequently called out as a revered community asset for walking and bicycling. Members of the public also highlighted key destinations to which they currently walk and bicycle, or would like to more often. These destinations included:

- Parks and trails, including Morad Park, Casper Mountain, North Platte Park, the Platte River Trail, and the Three Crowns Trail
- Downtown Casper, especially surrounding 2nd Street and David Street Station, as a work and play destination
- Grocery and general retail locations, including stores on CY Avenue and 2nd Street

Community members consistently cited motor vehicle speeds, long distances between crossings, and large arterials streets or highways as the major barriers to walking and bicycling throughout the Casper Area. Among the most commonly cited locations with barriers were included:

- 12th and 13th Streets
- South Poplar Street
- Beverly Street / Bryan Stock Trail
- Wyoming Boulevard

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CHAPTER 02
EXISTING CONDITIONS

Existing Conditions

To establish an understanding of existing conditions for bicycling and walking in the Casper Area, the planning process included a review and analysis of pertinent information related to previous plans, existing policies and programs, resident demographics, and existing transportation networks.

Related Plans

The Casper Area has a strong planning foundation that has informed many of the recommendations contained in the Bicycle and Pedestrian Plan. Several themes emerged from existing plans, as presented in the following table. These themes influenced the development of this Plan from the creation of its goals to the development of the project recommendations and implementation strategy.

Table 1: Major Goal Themes from Related Plans

Plan	Equity	Safety	Access	Mobility	Supportive Culture	Economy	Design Guidance	Land Use
LRTP: Connecting Crossroads (2019)	✓	✓	✓	✓	✓	✓	✓	✓
Comprehensive Plan: Generation Casper (2017)	✓	✓	✓	✓	✓	✓		✓
Casper Safe Routes to School (2011)	✓	✓	✓	✓	✓		✓	
Wayfinding Master Plan (2020)				✓	✓		✓	
Casper Area Trails, Paths, and Bikeway Plan (2013)	✓	✓	✓	✓	✓	✓	✓	

Demographics

The Casper Area's demographics are quite similar to Wyoming as a whole (Table 2). The city itself is home to a population of 57,931 people, while the Metropolitan Statistical Area (MSA) has a population of 79,858. The MSA has grown at a rate of 5.8% between 2010 and 2019. Wyoming's population growth is a bit lower at 2.7% and the United States' population growth is a bit higher at 6.3%. The Casper Area's median income is slightly lower than that of Wyoming and the United States at $60,550.

Table 2: Casper, WY Area Population Demographics Compared to Wyoming and United States. Source: US Census Bureau

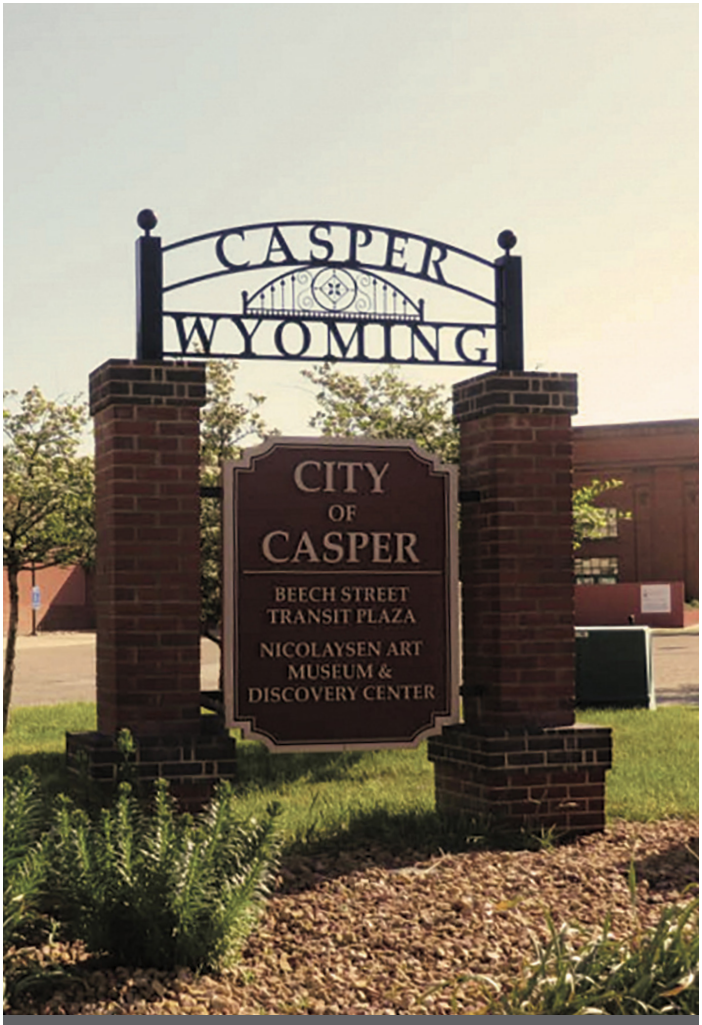
	Casper, WY MSA	Wyoming	United States
Population (2019)	79,858	578,759	328,239,523
Population Growth (2010 – 2019)	5.8%	2.7%	6.3%
Median Household Income (2015 – 2019)	$60,550	64,049	$62,843

David Street Station

The Casper Area's population is not as racially and ethnically diverse as Wyoming's or the United States'. 94% of Casper residents identify as being White, with the next largest demographic being those who identify as Hispanic or Latino at 8.6% (Table 3).

Table 3: Casper, WY Area Race and Hispanic Origin Compared to Wyoming and United States. Source: US Census Bureau

Race and Hispanic Origin	Casper, WY MSA	Wyoming	United States
White alone	94.2%	92.5%	76.3%
Black or African American alone	1.2%	1.3%	13.4%
American Indian and Alaska Native alone	1.1%	2.7%	1.3%
Asian alone	0.6%	1.1%	5.9%
Native Hawaiian and Other Pacific Islander alone	0.2%	0.1%	0.2%
Two or More Races	2.2%	2.2%	2.8%
Hispanic or Latino	8.4%	10.1%	18.5%



Downtown Casper

A family walking on the Platte River Trail

Commute Patterns

According to the 2018 American Community Survey 5-Year Estimate, 84% of Casper residents drive alone to work (Figure 1). 9% of residents carpooled and very few took other modes. The mean travel time to work in Casper is 15 minutes. Casper's small size and relatively short mean travel time to work create an ideal environment for a more walkable, bikeable, and transit-friendly city. With better infrastructure for walking and bicycling, fewer residents may rely on driving to work and other destinations.

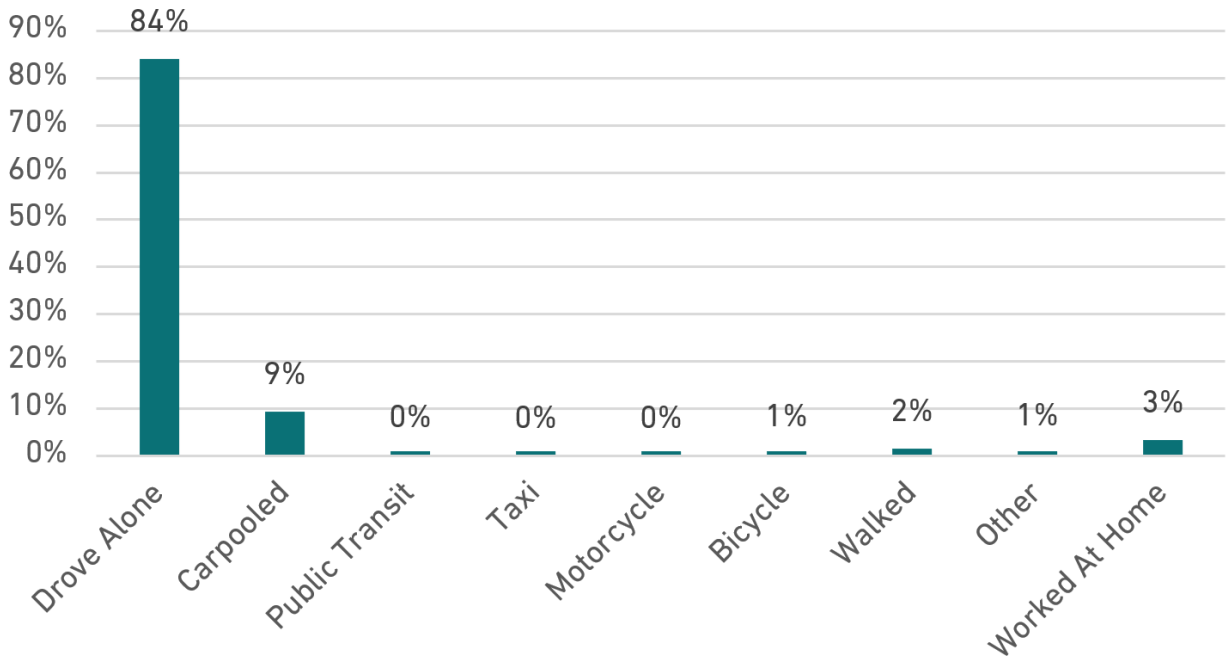


Figure 1: Casper, WY Area Means of Travel to Work. Source: American Community Survey 2018

Existing Infrastructure

Bikeway Network

The Casper Area is home to a vast network of pathways (trails) for people walking and bicycling. There are currently 47 miles of improved (paved) trails and 4 miles of unimproved (unpaved) trails in the Casper Area. Conversely, there are only 8.9 miles of on-street bike lanes in the region.

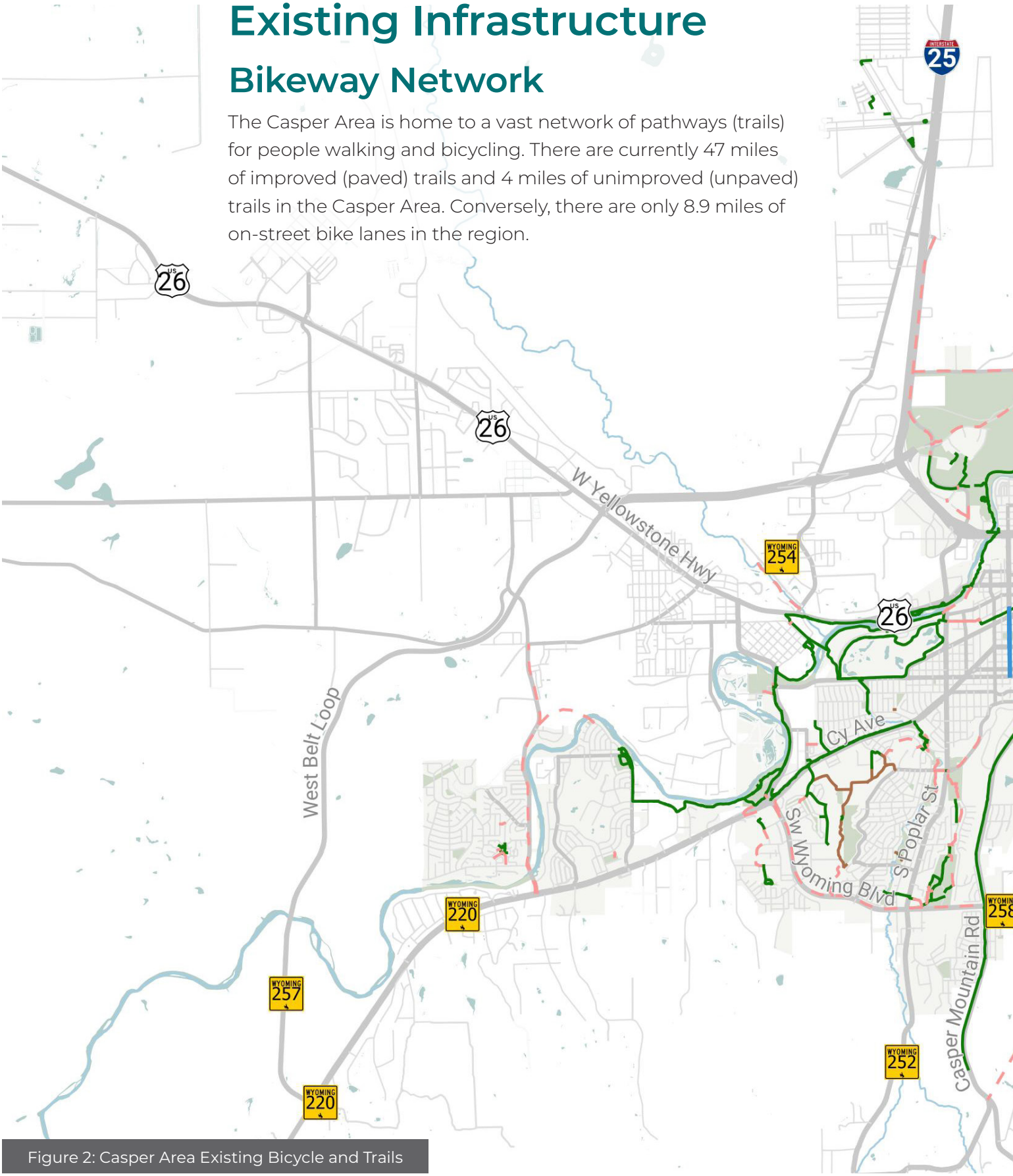
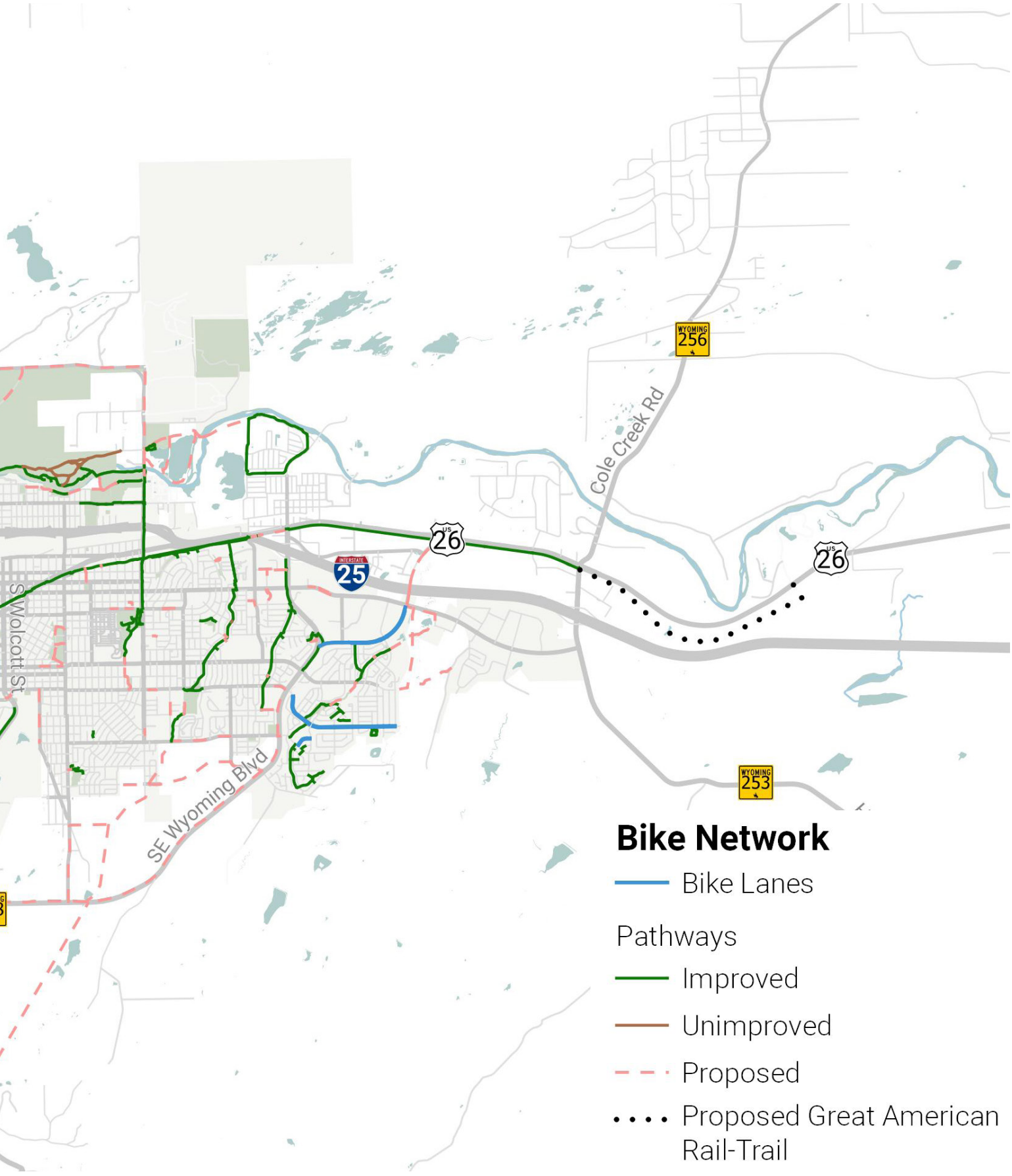


Figure 2: Casper Area Existing Bicycle and Trails


WYOMING 256
Cole Creek Rd
US 26
INTERSTATE 25
US 26
S Wolcott St
SE Wyoming Blvd
WYOMING 253
Bike Network
Bike Lanes
Pathways
Improved
Unimproved
Proposed
Proposed Great American Rail-Trail

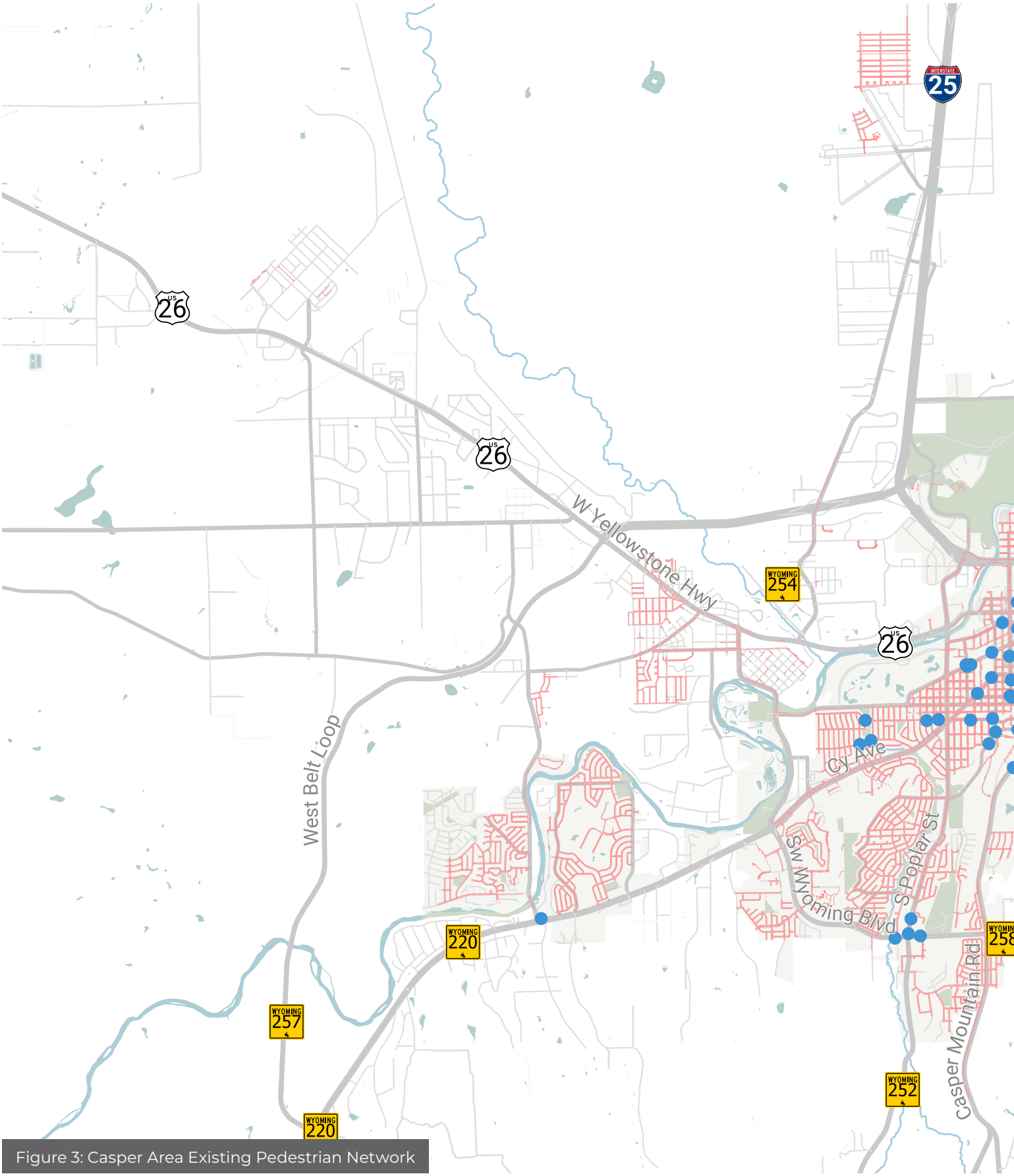
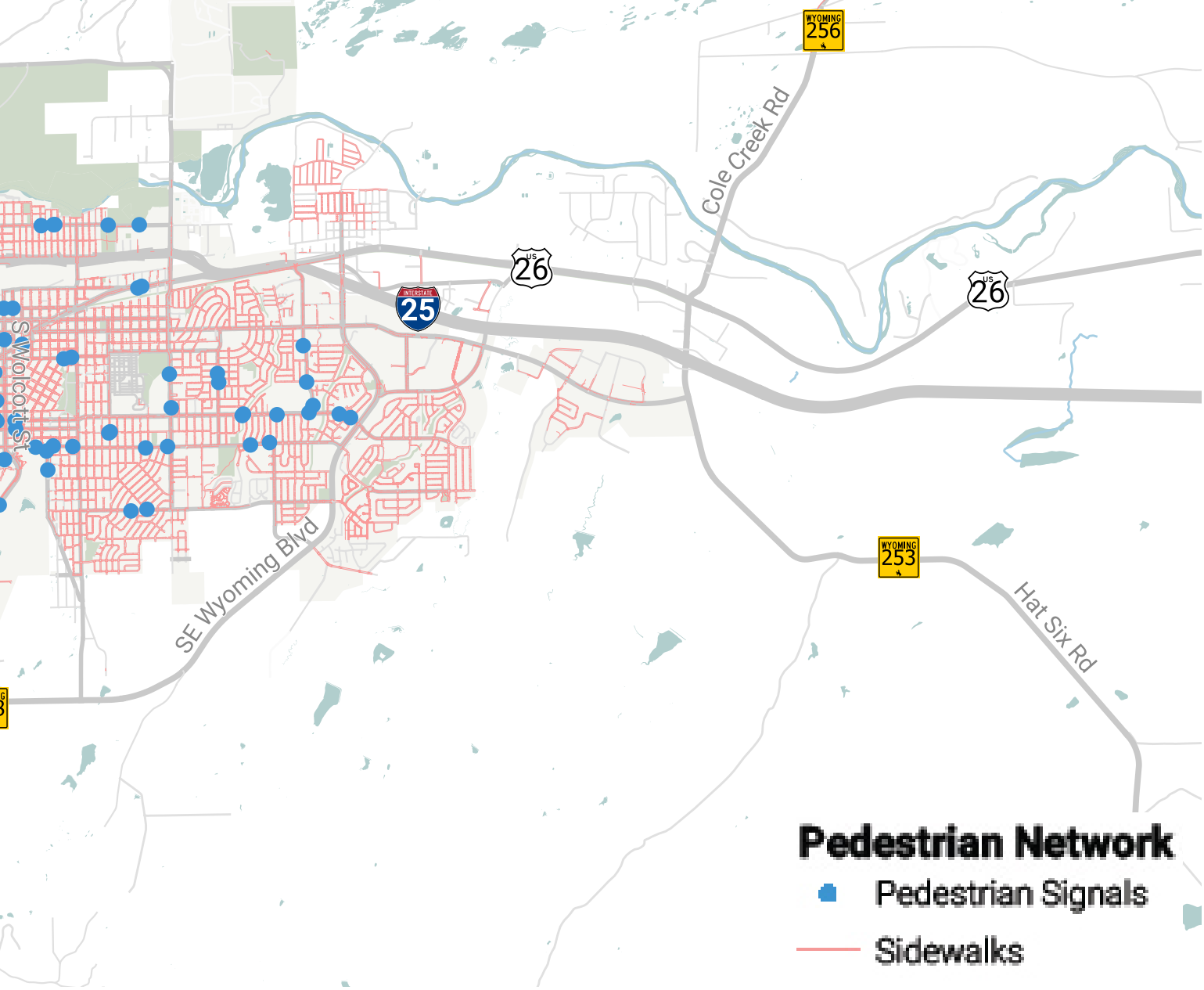


Figure 3: Casper Area Existing Pedestrian Network

Pedestrian Network

Within the City of Casper, the sidewalk network is mostly built out and well-connected (Figure 3). Numerous pedestrian signals help people safely cross busy streets, and access to the transit network (Figure 4) is easy and comfortable. A few residential neighborhoods in town lack sidewalks, and these could be opportunities for improvement. In addition, the roadway network outside of Casper's boundary is mostly without sidewalks. In some cases, such as residential streets with lower speeds and traffic volumes, this may offer an acceptable pedestrian environment, functioning similarly to a shared street. In other cases, when streets have higher speeds and volumes, a lack of sidewalk makes it much more difficult for people to walk for transportation or recreation in these areas. This Plan's Recommendations chapter includes projects to improve the sidewalk and trail networks in the outer reaches of the Casper Area.



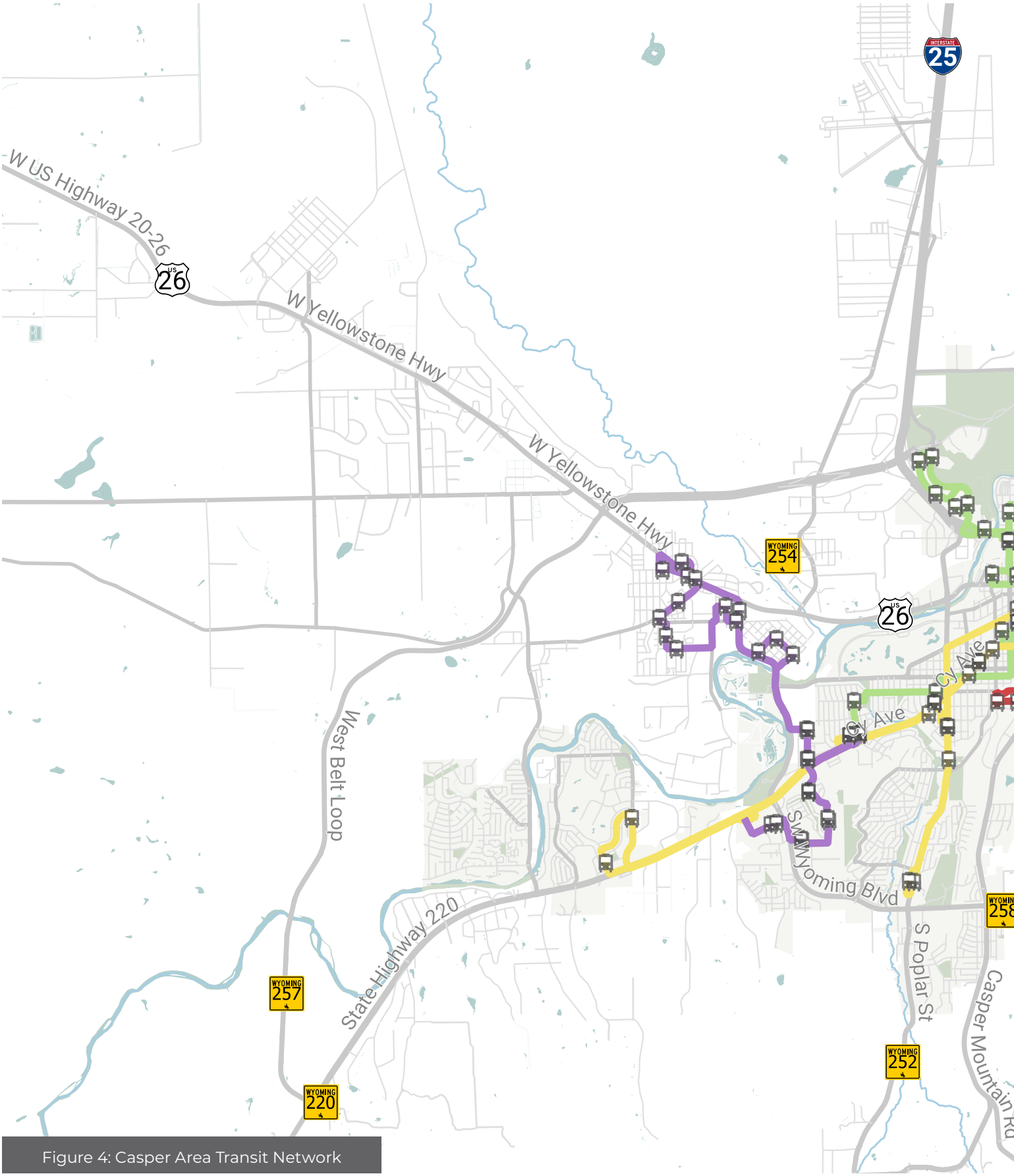
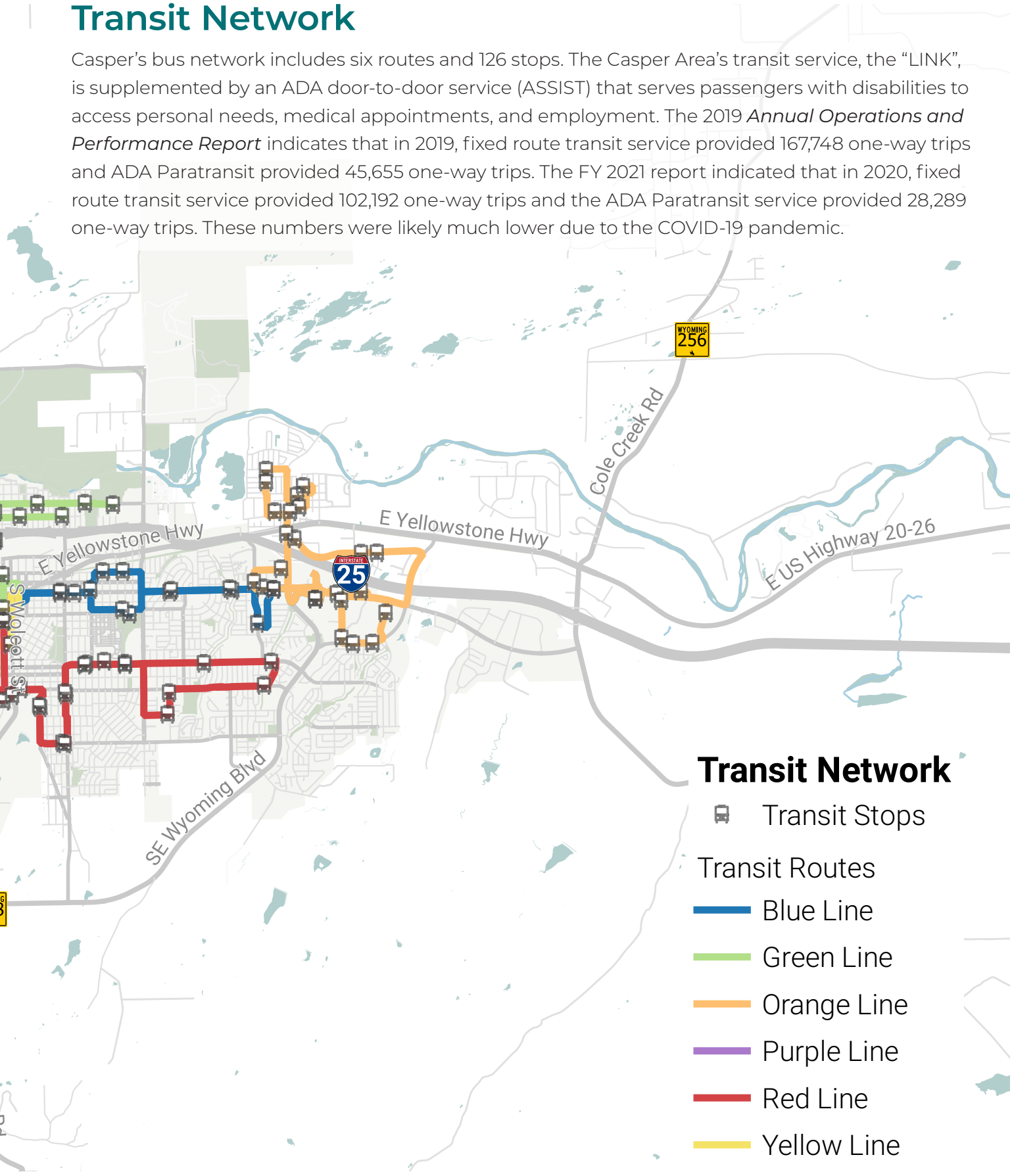


Figure 4: Casper Area Transit Network

Transit Network

Casper's bus network includes six routes and 126 stops. The Casper Area's transit service, the "LINK", is supplemented by an ADA door-to-door service (ASSIST) that serves passengers with disabilities to access personal needs, medical appointments, and employment. The 2019 *Annual Operations and Performance Report* indicates that in 2019, fixed route transit service provided 167,748 one-way trips and ADA Paratransit provided 45,655 one-way trips. The FY 2021 report indicated that in 2020, fixed route transit service provided 102,192 one-way trips and the ADA Paratransit service provided 28,289 one-way trips. These numbers were likely much lower due to the COVID-19 pandemic.



Safety

Fatal and Injury Crashes

Based on data collected by the Wyoming Department of Transportation, there were 2,135 reported crashes between January 2015 and December 2020 where at least one person was injured or killed, 26 of which resulted in fatalities (Figure 5). The highest density of crashes occurred on busy highways and major streets in Casper's core. The intersections with the highest density of crashes include:

- SE Wyoming Blvd and E 2nd St
- S Beverly St and E 2nd St
- N Center St and E 1st St
- N Poplar St and W 1st St
- S Poplar St and Cy Ave
- SW Wyoming Blvd and Cy Ave

Of the crashes that resulted in injuries or fatalities, 54% occurred at intersections and 46% occurred along roadways, at driveways, or at business entrances.

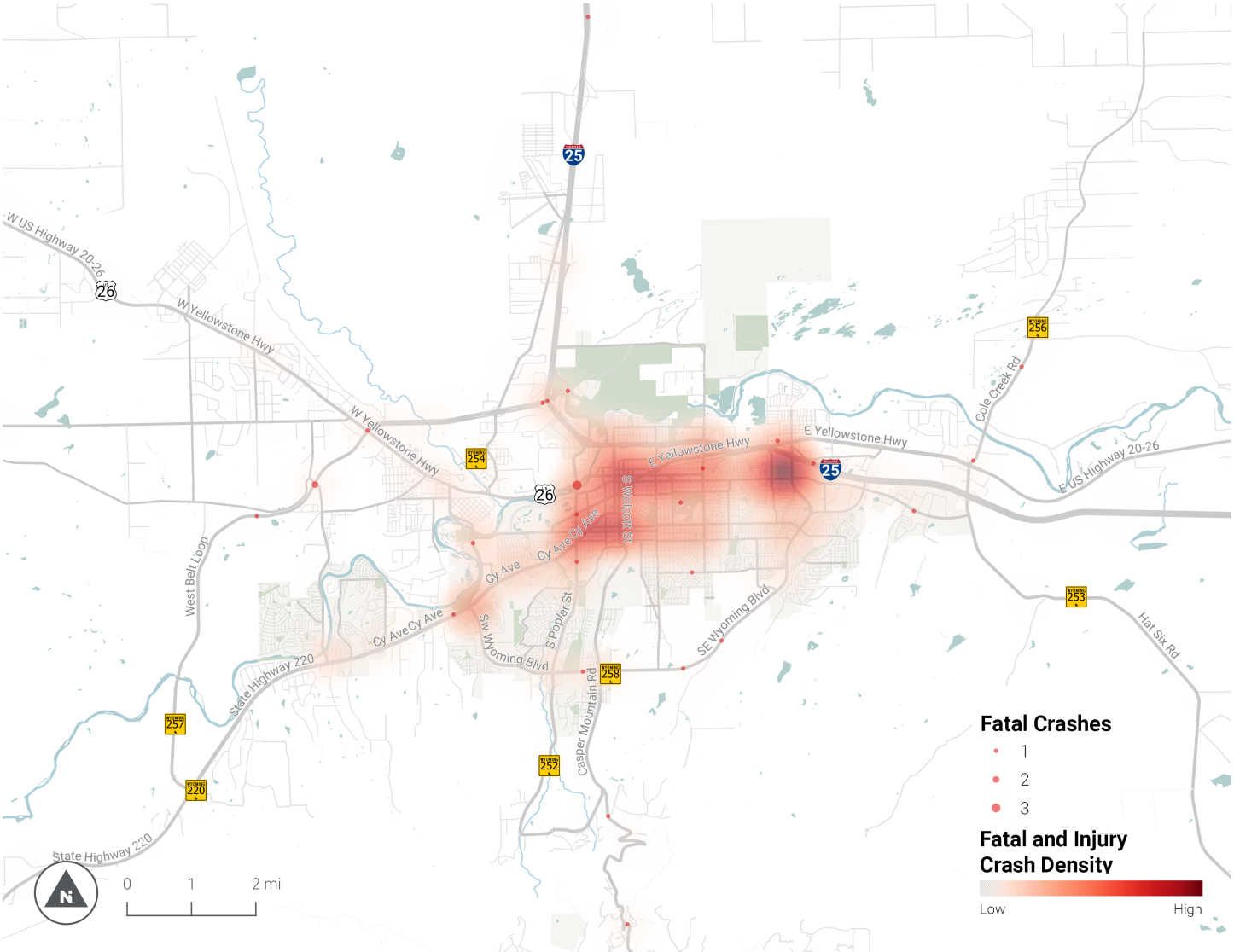


Figure 5: Fatal and Serious Injury Crashes for All Modes

Bicycle and Pedestrian Crashes

Figure 6 and Figure 7 display crashes involving people bicycling and people walking, respectively. Similar patterns can be found in these maps as in the overall fatal and injury maps with respect to the locations where crashes are occurring. This indicates a need for better bicycle and pedestrian infrastructure not only along and across busy streets, but also a need for a high-comfort network of alternative routes where people bicycling and walking don't need to interact with high volumes of fast-moving vehicles. In the period between the beginning of 2015 and the end of 2020, there were 66 total bicycle-involved crashes and 94 total pedestrian-involved crashes. Of these, zero bicyclists were killed and five pedestrians were killed.

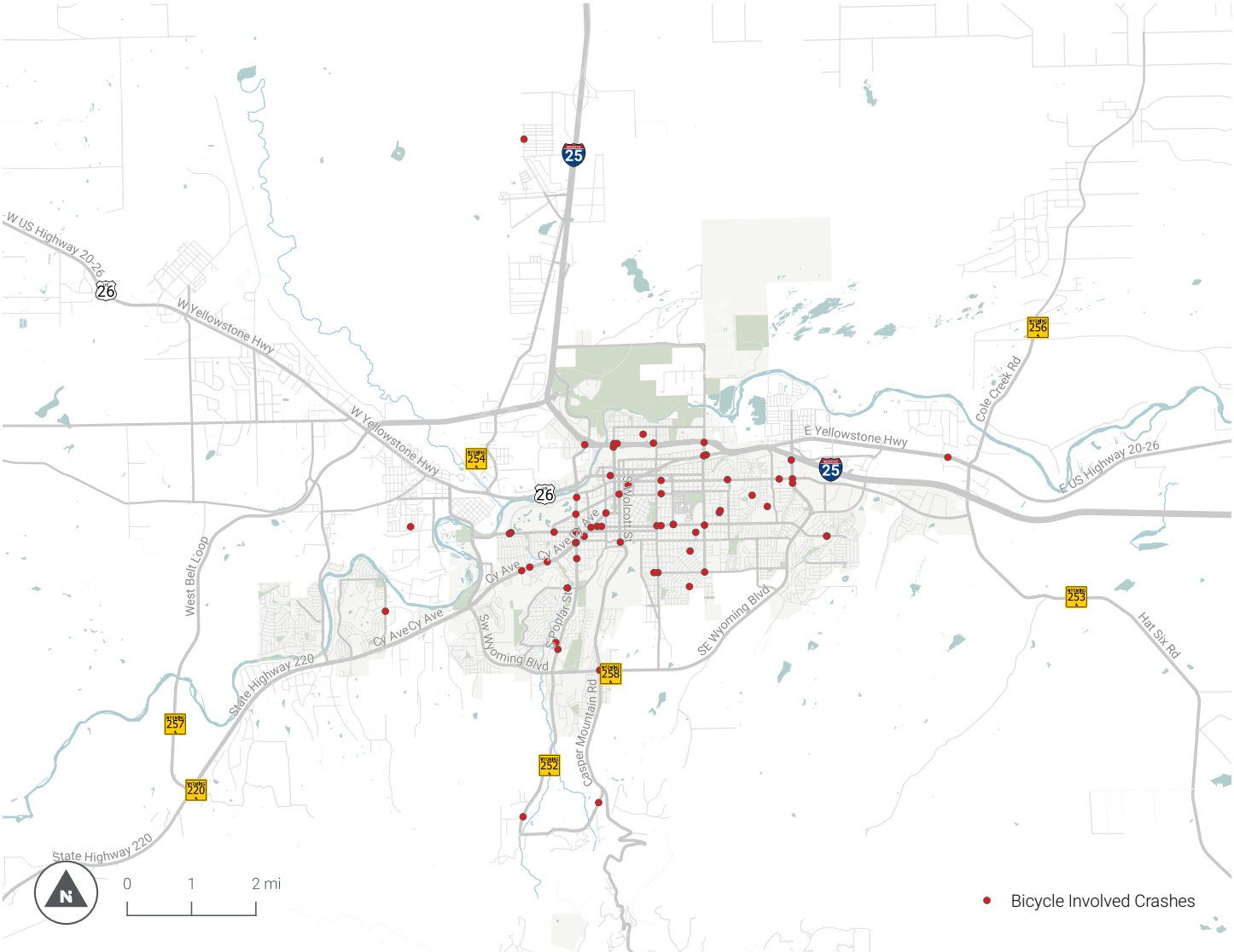


Figure 6: Crashes Involving People Bicycling

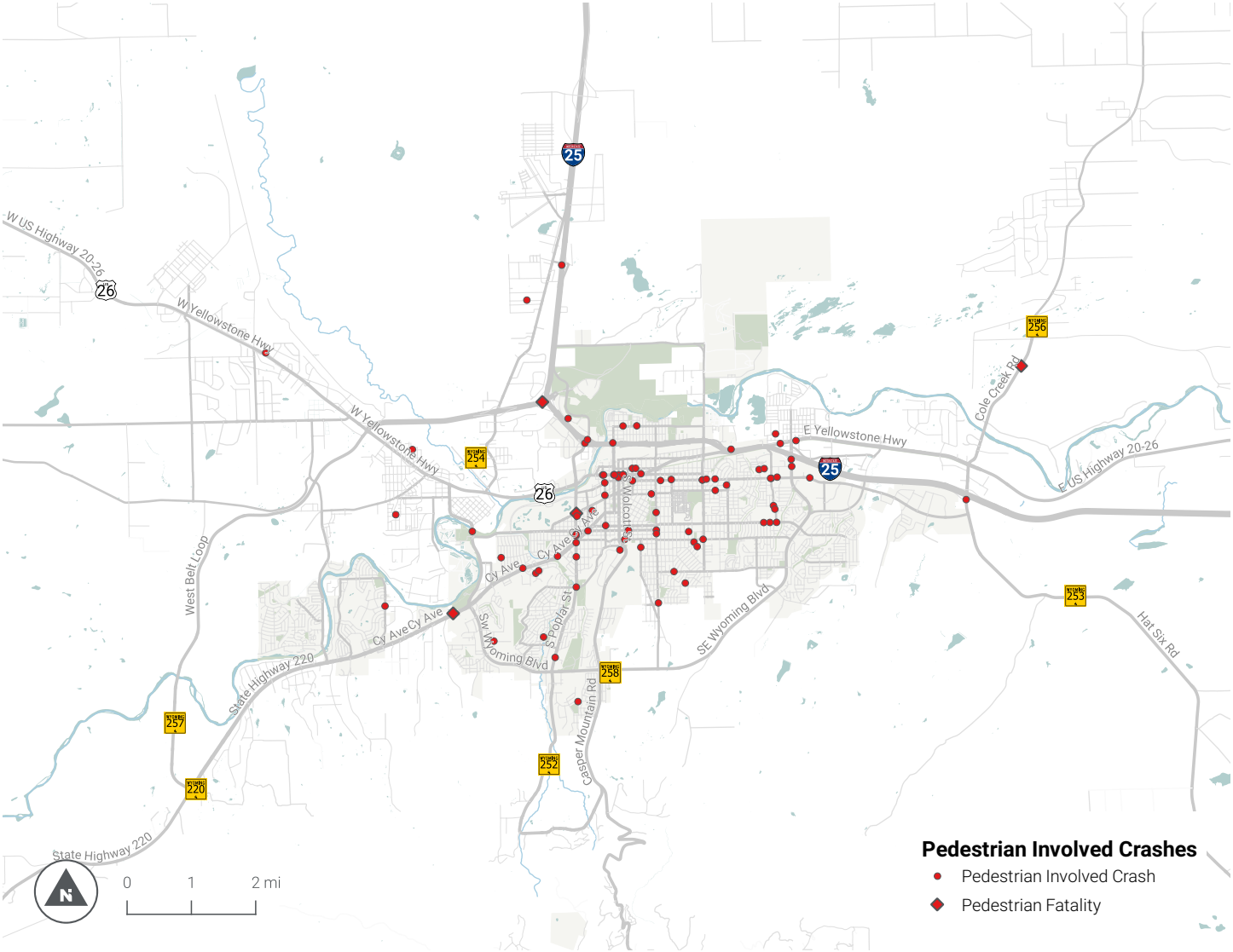


Figure 7: Crashes Involving People Walking

76% of bicycle crashes and 53% of pedestrian crashes occurred at intersections. This indicates that improvements should be made to slow vehicle speeds through intersections and to separate bicycle and pedestrian movements from vehicle movements. Leading pedestrian and bicycle signal intervals, protected left-turn signal phases, protected bicycle intersections, and curb extensions are all available design treatments that could decrease the number of crashes involving people walking and bicycling in the Casper Area. The higher instances of pedestrian crashes at non-intersection locations indicates that there may be insufficient midblock crossing opportunities and that crossing spacing for pedestrians should be more frequent. Information about some of these treatments is outlined in the Recommendations chapter (page 23).

Table 4: Bicycle and Pedestrian Crash Locations

	Four-Way Intersection	Intersection as part of an Interchange	Not an Intersection	T Intersection	Total
Bicycle-Involved Crashes	38	1	16	11	66
Pedestrian-Involved Crashes	38	4	44	8	94

16% of bicycle crashes and 36% of pedestrian crashes occurred during evening, early morning, and night time hours. This is a typical pattern due to the higher likelihood that people are walking rather than bicycling at nighttime. Better street lighting at intersections and more frequent places for people walking to cross the street safely are treatments that could be considered to reduce nighttime pedestrian crashes. 16 of the total bicycle- and pedestrian-related crashes involved alcohol or drugs.

Table 5: Bicycle and Pedestrian Crash Lighting Conditions

	Darkness Lighted	Darkness Unlighted	Dawn	Daylight	Dusk	Unknown	Total
Bicycle-Involved Crashes	4	0	1	56	4	1	66
Pedestrian-Involved Crashes	17	14	1	60	2	0	94

Casper's winter months can be quite cold, which reduces the number of people out walking and bicycling, particularly at night. This trend is also seen in the crash patterns by month. Bicycle and pedestrian crashes peak during warmer months when people are more likely to be walking and bicycling. However, the higher number of pedestrian crashes in October and November could indicate that lighting is a factor, as daylight savings typically occurs during these months, adjusting the daylight hours.

Table 6: Bicycle and Pedestrian Crashes by Month

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Bicycle-Involved Crashes	2	1	7	2	8	9	10	8	10	5	2	2
Pedestrian-Involved Crashes	5	5	8	10	6	10	3	6	6	15	11	9

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CHAPTER 03
RECOMMENDATIONS

Recommendations

Recommended Projects

This Plan's project recommendations reflect extensive stakeholder and public engagement, resident and City staff expertise, and technical data collection and analysis. Previous planning efforts, the City's Capital Improvement Plan, and City staff understanding of current and future needs also informed the development of the project recommendations.

Pedestrian Network

Today, the Casper Area's pedestrian network consists mostly of sidewalk infrastructure supported by crossing treatments and trails. As part of this Plan, the project team analyzed existing sidewalk data to identify gaps in the sidewalk network and opportunities to improve connectivity. Figure 8 shows the 605 miles of sidewalk gaps identified in the Casper Area. The Chapter 4: Implementation Strategy of this Plan presents a prioritized list of sidewalk improvement projects. Because of the extent of sidewalk gaps and the realities of funding availability, many of the low priority sidewalks gaps are unlikely to see conventional sidewalks constructed due to cost. The next section, Pedestrian Focus Areas, provides high-level recommendations to improve the pedestrian network area-wide through crossing improvements.

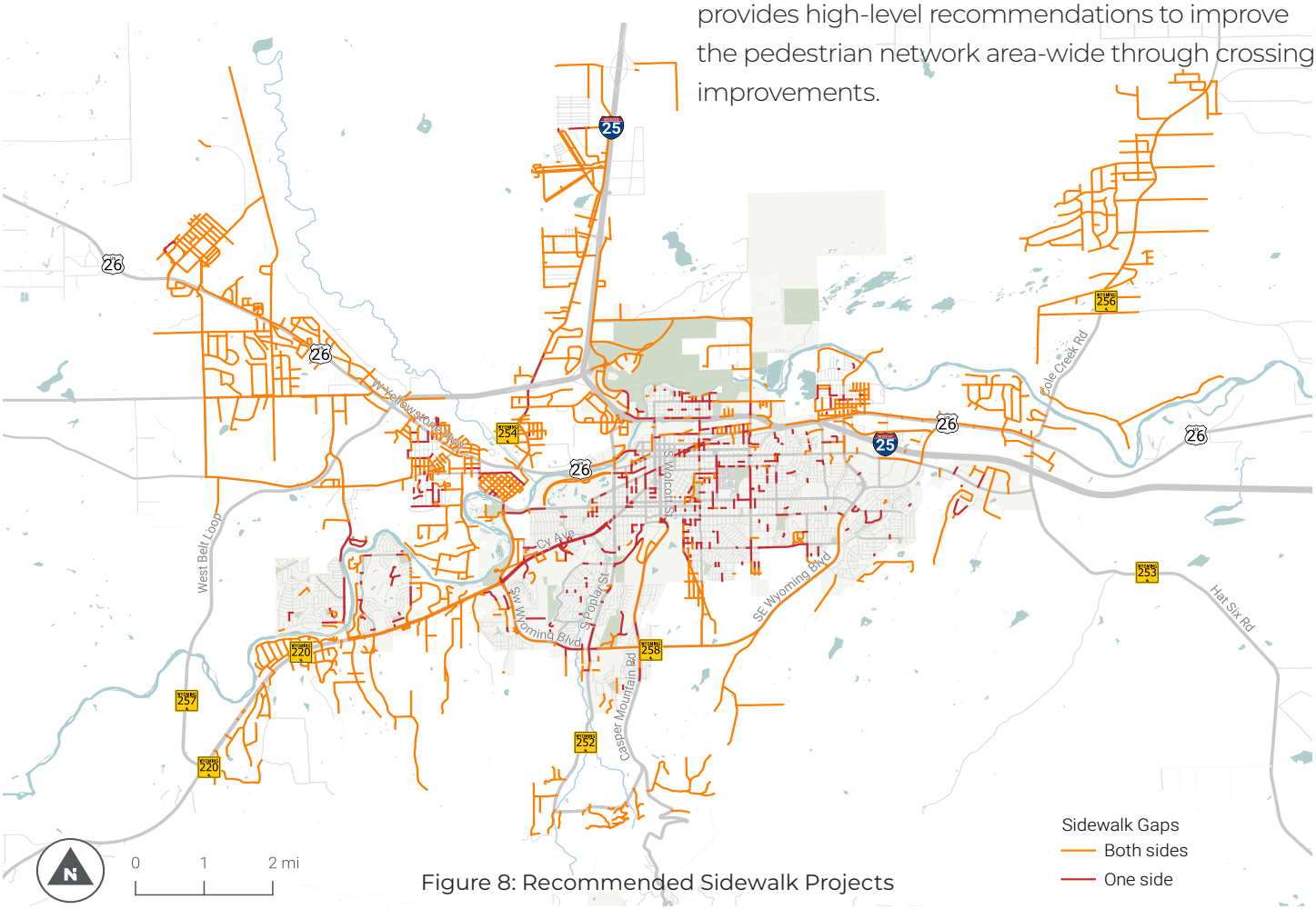

Figure 8: Recommended Sidewalk Projects

Pedestrian Focus Areas

This Plan aims to improve walkability throughout the Casper Area to ensure that those who need or want to walk can do so safely and comfortably. The pedestrian approach includes three types of areas where pedestrian improvements should be prioritized. These focus area types include schools; transit and commercial corridors; and parks and trail connections. These focus areas were chosen due to their unique characteristics that result in increased pedestrian demand and the higher likelihood that low-income populations who rely on walking and taking transit will use these types of streets. Each of these focus areas require specific treatments to enhance walkability for the types of users and trips typically seen in each context. Some of these treatments are already used in the Casper Area, but this guide provides a more targeted approach to their installation. Most of these treatments are applicable in all three focus areas and careful engineering judgement should be used to determine appropriate treatments in each context.

Schools

The Natrona County School District serves roughly 13,000 students in the Casper Area, approximately 2,600 of whom use the School District Transportation services. Improving walkability around schools and increasing the number of students who walk to school can help to establish healthy habits, reduce congestion, improve air quality, and make trips to and near schools safer for everyone. The 2011 *Casper Wyoming Safe Routes to School Plan* includes more detailed information regarding site-specific recommendations at eight selected schools, as well as a toolbox of treatments applicable to school areas, which should be used in tandem with the recommendations in this Plan.

Issues

Children are among the most vulnerable roadway users due to their inexperience, unpredictability, and small size. Extra care must be taken around school sites to ensure that students are able to walk safely not only on school grounds, but also to and from their homes and other destinations before and after school.

Applicable Design Treatments

High-Visibility Crosswalk Markings

High-visibility crosswalk markings, also referred to as continental crosswalks, should be used at all intersections in a school zone. This type of marking alerts drivers to the presence of people crossing the street and has been shown to increase yielding rates of people driving compared to parallel line markings or no markings at all. ADA-compliant curb ramps should also be installed to connect accessible routes when adding new crosswalks. School crossing guards can also augment the effectiveness of high-visibility crosswalks during school pick-up and drop-off times.

School Zone Signage

School zones should include signs that alert drivers that they are entering a space where extra caution must be taken to ensure the safety of children coming and going from school. School zone signage as well as lowered speed limits (20mph in all school zones, regardless of street type, is recommended), and school crossing signs should all be strategically placed around school property, starting two blocks from the school property in all directions.

Curb Extensions

Extending the curb beyond the sidewalk or buffer edge shortens crossing distances and increases visibility of people walking and rolling, particularly where there is on-street parking. Curb extensions are also effective tools for narrowing streets or tightening intersections to reduce motor vehicle turning speeds.

Raised Crossings

Raised crossings are used for traffic calming and to improve motorist yielding to people walking, rolling, and biking at intersections and midblock crossings. Crosswalks are elevated to reduce or eliminate the transition from the sidewalk to the street crossing. Transition aprons on each approach to the raised crossing are marked with pavement markings to alert drivers of the grade change.

Parks and Trail Connections

In many aspects, designing pedestrian improvements near parks is very similar to that of schools. Design around parks and the trail networks within them should also consider high volumes of young children and families. Frequently marked high-visibility pedestrian crossings, lower speed limits, and curb extensions are all design treatments that should be considered near parks and trail connections to roadways.

Issues

Similar to schools, extra care must be taken to provide a safe environment for children walking along and across streets near parks. Trail and paved path networks within parks must connect to the sidewalk network along adjacent roadways to create a seamless transition for people walking and bicycling to and from parks.

Applicable Design Treatments

Street Trees

Trees provide a wide range of environmental, social, and economic benefits to the area's residents, visitors, and the community. Street trees are a valuable resource that contribute to the character and ambiance of the public realm, and provide much-needed shade and heat reduction in Casper's arid, high-altitude climate. These characteristics are particularly important around parks and trails, where trees provide shade on a hot day and enhance the character of streets around parks. In addition to environmental impacts, presence of street trees can alter the perception of lane width, causing drivers to drive more carefully and slowly, which is of particular importance where children may be present near parks.

Speed Humps

Vertical deflection, including speed humps and raised crossings, are some of the most effective treatments for slowing motor vehicle speeds. These treatments can make streets less desirable to motorists so that they use more appropriate parallel streets instead. The main difference between these two elements is that the raised crossing has a flat surface and crosswalk markings denoting it as a safe place to cross the streets. Speed humps, on the other hand, are placed mid-block and have rounded tops to slow motor vehicles. While speed humps and raised crossings may be applicable to any local street that has a speeding issue, they are an excellent tool to slow motorists and provide a safe and comfortable environment around parks and trails. Raised crossings in particular should be considered at entrances to parks and where trail connections meet on-street bikeway facilities. Speed humps should only be considered if they meet the approval criteria of the City of Casper Engineering Department.

In-Street Yield to Pedestrian Signs

In-street "Yield to Pedestrian" signs are signs placed in the roadway at crosswalk locations to remind roadway users of the laws regarding the right of way at unsignalized midblock locations and intersections. They also increase awareness

and visibility of pedestrians crossing the roadway. They are often used near parks; in busy business districts; at school crossings and other locations with vulnerable populations; or where high pedestrian volumes occur in unexpected locations. In-street signs can be used in conjunction with raised crossings, advanced warning signs, and pedestrian crossing signs at crosswalks.

Transit and Commercial Corridors

Transit and commercial corridors typically have a high level of pedestrian activity. For this reason, additional infrastructure should be used in these areas to ensure that the pedestrian environment is safe, comfortable, and attractive for large volumes of pedestrians. In addition, Casper's buses are equipped with bicycle racks, creating an excellent opportunity to connect people quickly and easily using multiple modes of transportation. For this reason, connections to and from transit stops should be made safe and comfortable for bicyclists as well. Frequently spaced pedestrian crossings, streetscape enhancements, and pedestrian-scale lighting are a few examples of elements to include on these types of corridors.

Issues

The most prevalent issue on transit and commercial corridors is conflict with fast-moving motor vehicle traffic. On busy arterial and collector streets, walking can often feel uncomfortable, particularly where sidewalks lack a buffer from motor vehicle traffic and street lighting is inadequate. It may also be difficult to cross the street to get to transit stops and other destinations where traffic signals are lacking. In addition, conventional street lights are typically focused on the roadway rather than the sidewalks and approaches to marked crossings, making it difficult for motorists to see people walking or attempting to cross the street. These issues can be mitigated through careful attention to street and pedestrian walkway design.

Applicable Design Treatments

Pedestrian Crossing Spacing

On transit and commercial corridors, it is especially important to provide safe pedestrian crossings as frequently as possible. When busy roadways have crossings that are too far apart, pedestrians will often cross at unmarked and unsignalized midblock locations. For higher-speed and multilane roadways, consider enhancing crossings with Rectangular Rapid Flashing Beacons (RRFBs), Pedestrian Hybrid Beacons, or traffic signals. The following guidance should be followed when determining the spacing of marked pedestrian crossings along transit and commercial corridors. Crossings should be located:

- Within 200' of any transit stop
- Every 400' on Arterial and Collector roadways within Urban Centers (identified in Map 4-4 in Generation Casper)
- Every 1000' on Arterial and Collector roadways outside of Urban Centers, with special attention to connections to destinations along these roadways.

Median Refuge Islands

Median refuge islands provide a protected refuge space in the center of two-way streets to allow pedestrians to cross the street in two phases. Median refuge islands are particularly beneficial where crossings are long or where a person must walk across more than one lane of traffic per direction to reach the other side of the street. Islands also provide traffic calming by narrowing the roadway and creating edge friction. Where transit stops are located mid-block away from intersection crossings, median refuge islands can be used to provide direct connections between commercial centers and bus stops.

Streetscape Improvements

Streetscape improvements include signs and banners that welcome people to a certain neighborhood, benches for people to rest, street trees, and special paving or materials for the sidewalk. These types of improvements are particularly important near bus stops to provide people waiting for transit an opportunity to sit and be sheltered from inclement weather. These types of improvements can make the pedestrian environment feel comfortable and inviting, which can increase rates of walking, have a positive impact on businesses along a corridor, and add to the community character of a place.

Pedestrian-Scale Lighting

Pedestrian lighting is used to make people visible, define the street, and make people feel comfortable walking at night. Safety for people walking includes not only safety from being struck by motor vehicles, but also a feeling of personal safety from crime. Decorative pedestrian lighting can also add to a corridor's aesthetic character, particularly in commercial centers and near high-use transit stops. This type of lighting should be placed such that it illuminates the sidewalk and curb ramps and should use light poles and decorative lamps that are lower to the ground than typical street lights.

Bicycle Network

The bicycle recommendations presented in this Plan were selected to improve connectivity within Casper and between Casper and the surrounding communities, including Bar Nunn, Evansville, and Mills. The recommended network is presented in Figure 10 and incorporates a variety of bikeways to increase rider safety and comfort, including buffered bike lanes, separated bike lanes, sidepaths, and trails. Specific bikeway recommendations were developed to be easily implementable and, in most cases, fit within the existing roadway width. Bikeways that provide a greater level of separation between people bicycling and people driving (e.g., buffered bike lanes, separated bike lanes, sidepaths, and trails) were recommended where feasible to maximize network comfort and encourage ridership among people of a variety of ages and abilities. Figure 9 below describes the different bicyclist design users and what types of facilities they feel most comfortable using. This Plan aims to design bikeways that are low-stress and comfortable for the "Interested but Concerned" bicycle rider.

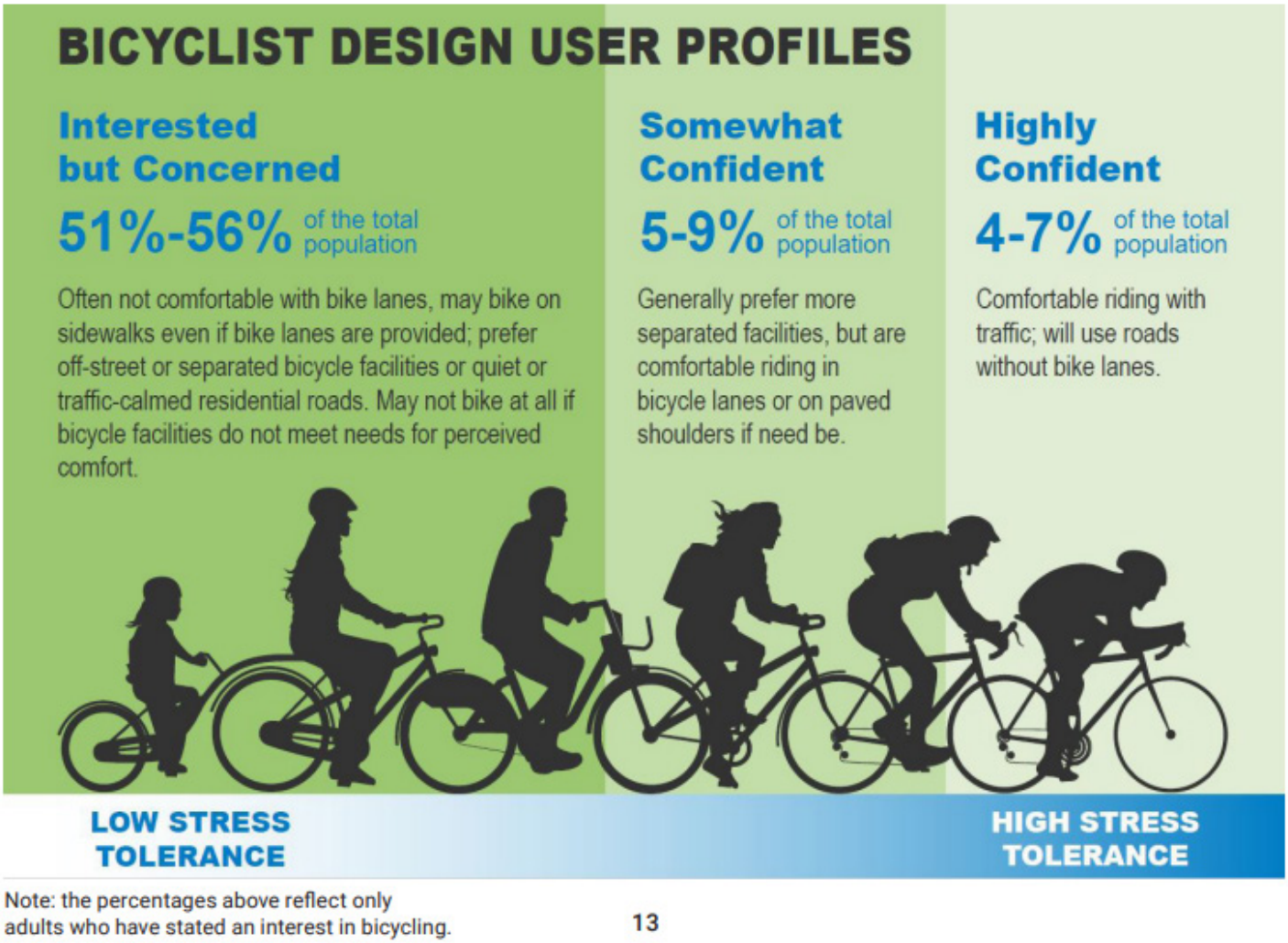

Figure 9: Bicyclist Design User Profiles. Source: Federal Highway Administration (FHWA) Bikeway Selection Guide.

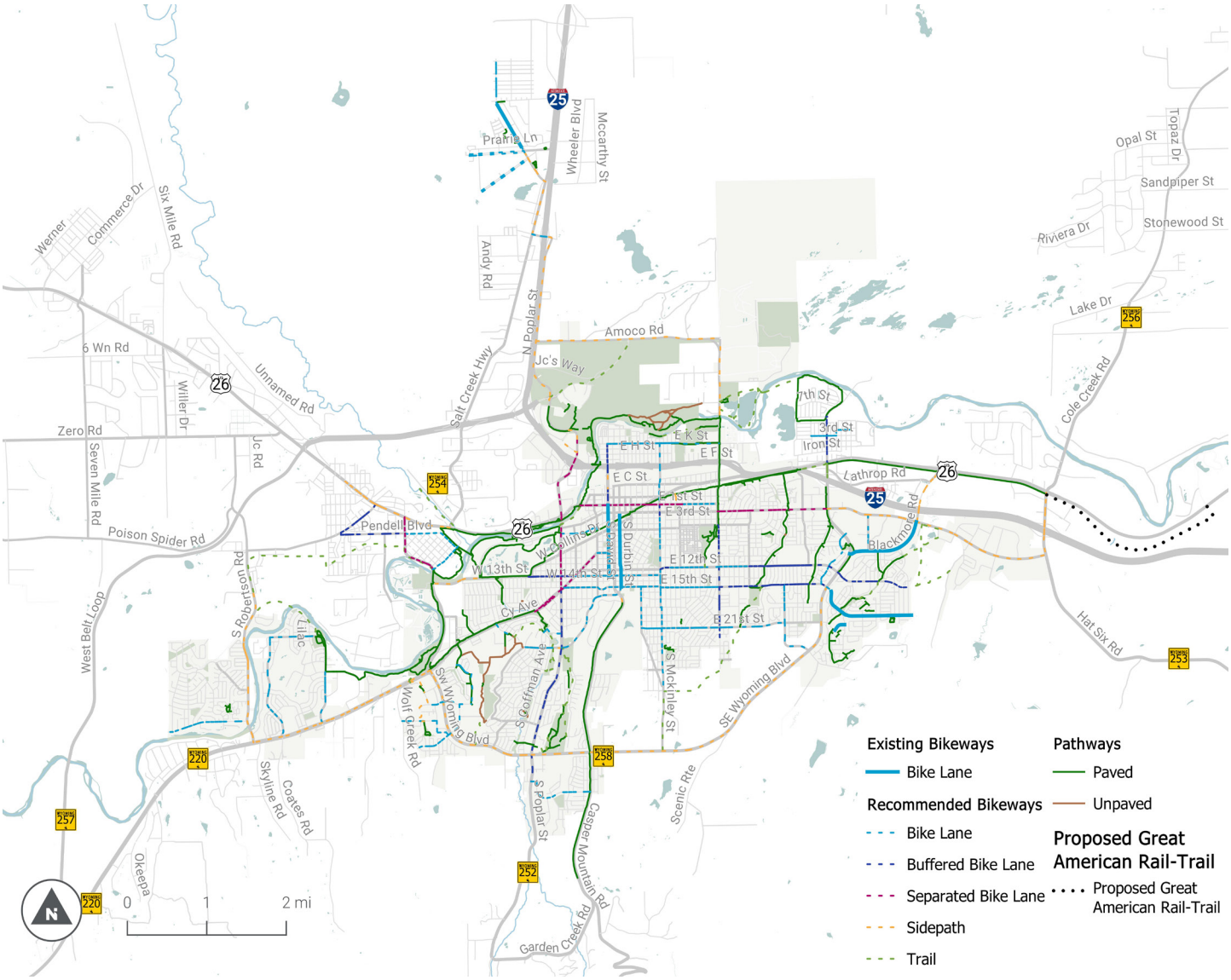

Figure 10: Recommended Bicycle Network

Recommended Bikeways

This section presents an overview of the different bikeways recommended in this Plan. In general, bikeways with a greater amount of separation between people driving and people bicycling are better suited for streets with larger traffic volumes, higher vehicle speeds, and/or where anticipated bicyclists are families or people who may not feel comfortable riding in shared traffic lanes. Resources such as the Federal Highway Administration (FHWA) Bikeway Selection Guide provide detailed parameters for selecting the right bikeway type for a given context.

Standard Bicycle Lanes

Standard bicycle lanes are striped adjacent to vehicle travel lanes and delineated by a solid white line.

Buffered Bicycle Lanes

Buffered bicycle lanes are bicycle lanes that are delineated by a hatched buffer space, in addition to the painted stripe. These bikeways provide more horizontal separation between people bicycling and people driving (or parked cars) than standard bicycle lanes.

Separated Bicycle Lanes

Separated bicycle lanes provide physical separation between people bicycling and people driving, and always include a vertical element (parked vehicles, raised concrete curbs, planters, bollards, etc.) and horizontal separation (striped buffer, landscaped areas, etc.). Separated bicycle lanes are considered a higher-comfort, lower-stress facility than standard or buffered bicycle lanes, and they are sometimes called protected bike lanes.

Sidepaths

Sidepaths are located alongside a street and provide physical separation from motor vehicles. Interactions between bicyclists and vehicles are limited to roadway crossings. Sidepaths are paved and may be used by people walking or bicycling. Due to their separation from vehicle traffic, these facilities are typically attractive to most people who bicycle and are considered the least stressful type of facility for the average rider.

Trails

Trails provide physical separation from motor vehicles and frequently are developed within independent rights-of-way (e.g., adjacent to rivers, within railroad or utility corridors, etc.) Trails are used by people walking or bicycling and may be paved or unpaved. Where frequent bicycle use is anticipated, trails should be paved.

Figure 11: Example of a Standard Bicycle Lane (top), Buffered Bicycle Lane (second), Separated Bicycle Lane (third), and Sidepath (bottom)

Recommended Plans, Policies, and Programs

While it is important to build sidewalks, improved crossings, new bikeways, and other projects to create a connected active transportation network, it is equally important that the Casper Area has plans, policies, and programs that encourage bicycling, walking, and taking transit. This table of recommendations identifies key things that the Casper MPO and its partners can do, in tandem with building out the recommended networks, to encourage safe bicycling and walking in the region. Table 7 includes a responsible entity and suggested timeframe for implementation, depending on urgency and available resources.

Table 7: Recommended Plans, Policies, and Programs

Recommendation	Description	Responsibility	Timeframe
Integrate Bicycle and Pedestrian Safety education into public outreach and messaging campaigns	As the multimodal network in the Casper Area continues to be built out and improved, information should be provided to remind roadway users of how to interact safely with each other. The Casper MPO should develop online and print materials that promote safe driving, walking, and biking.	Casper MPO	Short-term (0-5 years)
Develop and maintain a map of Casper Area bicycle facilities	As the recommended bicycle network gets built out, development of a comprehensive bicycle map will encourage more people to bicycle by providing them with information to make more informed route choices. This map should be available in print and online format and should be compatible with mobile devices.	Casper MPO	Short-term (0-5 years)
Provide wayfinding signage on the recommended bicycle network	Wayfinding signs provide information about destinations, direction, and distance to help bicyclists determine the best routes to take to major destinations. Signs provide on-the-ground information that helps bicyclists understand and use the on-street and trail network without the use of a map. Directional signs also provide additional messaging to motorists to expect bicycles on the roadway. The presence of signs encourages bicycling on designated corridors because users feel the signs will direct them to the best route for getting to their destination.	Casper MPO	Short-term (0-5 years)
Provide convenient and secure bicycle parking	The provision of end of trip facilities such as bicycle parking is a key component of making bicycling a viable and convenient mode of transportation. Neglecting to provide convenient and secure bicycle parking discourages people from biking, and it also can result in bicycles being parked in areas in which they may interfere with traffic or pedestrian movement. A MPO program should be established to require and encourage businesses and multi-family developments to install bicycle parking. This should be coupled with bicycle parking design guidelines to ensure that new bicycle parking spaces are user-friendly.	Casper MPO	Short-term (0-5 years)
Establish a bicycle and pedestrian advisory committee	Bicycle and/or pedestrian advisory committees are often established to aid in the implementation of bicycle facilities or studies. They serve as an intermediary between the City/MPO and groups in the broader community that are concerned with walking and biking conditions. Such a committee should be invited to review roadway projects, provide input to the City/MPO on bicycling and pedestrian issues, and periodically reevaluate priorities. The committee should be comprised of people of varied ages, cultural backgrounds, gender, and skill/experience levels, and have equitable geographical distribution across the region.	Casper MPO	Short-term (0-5 years)

Recommendation	Description	Responsibility	Timeframe
Establish performance measures	Establishing performance measures allows for regular assessment of the effectiveness of bicycle and pedestrian projects, policies, and practices. Developing these measures will permit the creation of routine progress reports, which can inform periodic adjustments to the Plan. Examples of performance metrics can include crash rates, rates of bicycling and walking to work, or completion of recommendations in this Plan. Establishing such a reporting mechanism is also a way of communicating with stakeholders to show the impact of their public investment.	Casper MPO	Short-term (0-5 years)
Utilize national best practices in bicycle and pedestrian designs	Look to national standards such as the various National Association of City Transportation Officials (NACTO) design guides and the FHWA's guidance on designing bicycle and pedestrian infrastructure as projects are designed and constructed	Casper MPO, local jurisdictions	Short-term (0-5 years)
Explore solutions to completing the sidewalk network, such as low-cost walkways	Explore solutions such as implementing low-cost walkways to build out the pedestrian network more quickly than what would otherwise be possible. Barriers or buffers may be used as a more affordable interim approach to seperate pedestrians from vehicular traffic.	Casper MPO, local jurisdictions	Short-term (0-5 years)
Deliver Bicycle and Pedestrian Education through Safe Routes to School programming and partnerships	In 2011, the Casper Area MPO developed a Safe Routes to School report that provides specific recommendations for improving physical walking and biking conditions around eight schools, as well as policy and program recommendations to encourage safe walking and bicycling to and from school. The City of Casper should continue to make infrastructure safety improvements near all Casper schools while also working with the school district to educate students on the rules of the road and safe walking and biking practices.	City of Casper and Casper Area Schools	Mid-term (6-10 years)
Collect bicycle and pedestrian count data	A systematic approach to collecting short-duration and long-duration pedestrian and bicyclist counts can help the MPO understand active transportation travel patterns and make informed decisions for maintenance and capital projects. This information can be used to define benchmarking for measuring results of citywide efforts to improve network infrastructure and Transportation Demand Management (TDM) efforts to encourage walking and bicycling.	Casper MPO	Mid-term (6-10 years)
Update Design Standards to reflect best practices	Update the City's design standards to reflect national best practices and to improve the consistency, quality, and application of pedestrian and bicycle facility design. Include details that encourage pedestrian-friendly transit facilities and guidelines to maximize street tree planting.	Casper MPO	Mid-term (6-10 years)
Develop pedestrian crossing guidelines	Create pedestrian crossing standards and guidelines that specify where and how pedestrian crossings should be added throughout the city. Coordinate with the SRTS program on this task.	Casper MPO	Mid-term (6-10 years)
Hire an active transportation coordinator	Hire a transportation planner or engineer to focus on coordinating and implementing active transportation projects.	Casper MPO	Long-term (11-15 years)

Recommendation	Description	Responsibility	Timeframe
Initiate a neighborhood traffic calming program	Develop a neighborhood traffic calming program so that the City/ MPO can add traffic calming on local streets with speed and volume issues.	Casper MPO	Long-term (11-15 years)
Collaborate with state and local partners to complete the Great American Rail-Trail	The Great American Rail-Trail is a cross-country multi-use trail that is currently in development between Washington, D.C. and Washington state. Collaborate with state and local partners to complete the extent of the trail that falls within the footprint of the Casper Area MPO.	Casper MPO	Long-term (11-15 years)
Integrate Casper Area Bicycle and Pedestrian Plan into future planning efforts	Ensure that when other planning efforts are conducted, such as the update of long-range planning documents, that the recommendations and outcomes of this Plan are integrated within them. This will help make sure that these recommendations are intertwined with the City's future planning efforts.	Casper MPO, City of Casper	Ongoing
Incorporate bicycle and pedestrian facilities into existing maintenance policies and programs	Regular maintenance of bicycle and pedestrian facilities not only demonstrates commitment to supporting walking and biking, but also helps to ensure that these facilities are safe and attractive for existing and potential users. Full integration of on-road bicycle facilities into routine roadway maintenance means bicycle facilities are kept free of debris, pavement markings are visible, the pavement is in good condition, and bike lanes and paths are kept free of snow. Maintenance costs should be factored into all improvements, but particularly into off-road facilities where there are fewer opportunities to leverage routine roadway maintenance.	City of Casper	Ongoing
Identify easy-win projects through regularly scheduled repaving	When roadways are repaved, there is often potential opportunity to implement bikeways with restriping. The list of paving projects should be checked regularly for opportunities to implement the recommended bikeway network. Additionally, the list of bikeway projects should be checked regularly for opportunities to inform the repaving project list.	Casper MPO, City of Casper	Ongoing
Investigate outside funding sources for bicycle and pedestrian infrastructure	Continue to explore additional funding sources for bicycle and pedestrian improvements. Some options to explore include bonds, grants, and developer fees.	Casper MPO	Ongoing

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CHAPTER 04 IMPLEMENTATION STRATEGY

Implementation Strategy

Prioritization Framework

Because it is not feasible or practical to construct all the proposed bicycle and sidewalk projects immediately, the project team developed a prioritization framework to help determine which projects are most impactful and important for the community and therefore should be implemented first.

To this end, the project team prioritized bicycle and sidewalk projects based on a set of criteria to determine which projects may provide the greatest benefit based on the Plan's goals. These goals include safety and comfort, connectivity, increase in non-car trips, community, and equity. Measurable criteria were developed for each goal, with the exception of community, which is not easily measured with quantitative data. The criteria in Table 8 were used to score each project according to the goals.

One or more quantitative measures were developed for each question posed by the criteria in Table 8 to prioritize bicycle and sidewalk projects. These measures, along with the details of how scores were calculated for each measure, are included in Appendix A. After each project was scored, projects were sorted into High-, Medium-, and Low-Priority tiers.

Complete maps and lists of all the bicycle and sidewalk projects, organized by priority, can be found in Appendices B and C, respectively.

Table 8: Prioritization Criteria and Plan Goals

Criteria	Safety and Comfort	Connectivity	Increase in Non-Car Trips	Equity	Community
Does the project improve comfort for bicyclists and/or pedestrians?	✓		✓		*Not easily assessed with available data*
Does the project address a location with a history of bicycle or pedestrian crashes?	✓		✓		
Does the project enhance network connectivity?		✓	✓		
Does the project support areas where people are most likely to bicycle/walk?			✓		
Does the project serve those with limited transportation options?				✓	
Does the project serve a key destination?			✓		

High-Priority Bicycle Projects

Figure 12 provides a map of the prioritized bicycle projects, and Table 9 lists the bicycle projects identified as High-Priority projects. These High-Priority projects represent roughly 1/3 of the total number of projects identified through this planning process. Of the 91 miles of bikeways proposed by this Plan, 28 miles of those scored as High-Priority, 33 miles as Medium-Priority, and 30 miles as Low-Priority. The Implementation Timeframe section of this chapter includes a possible timeframe for implementing all bicycle projects.

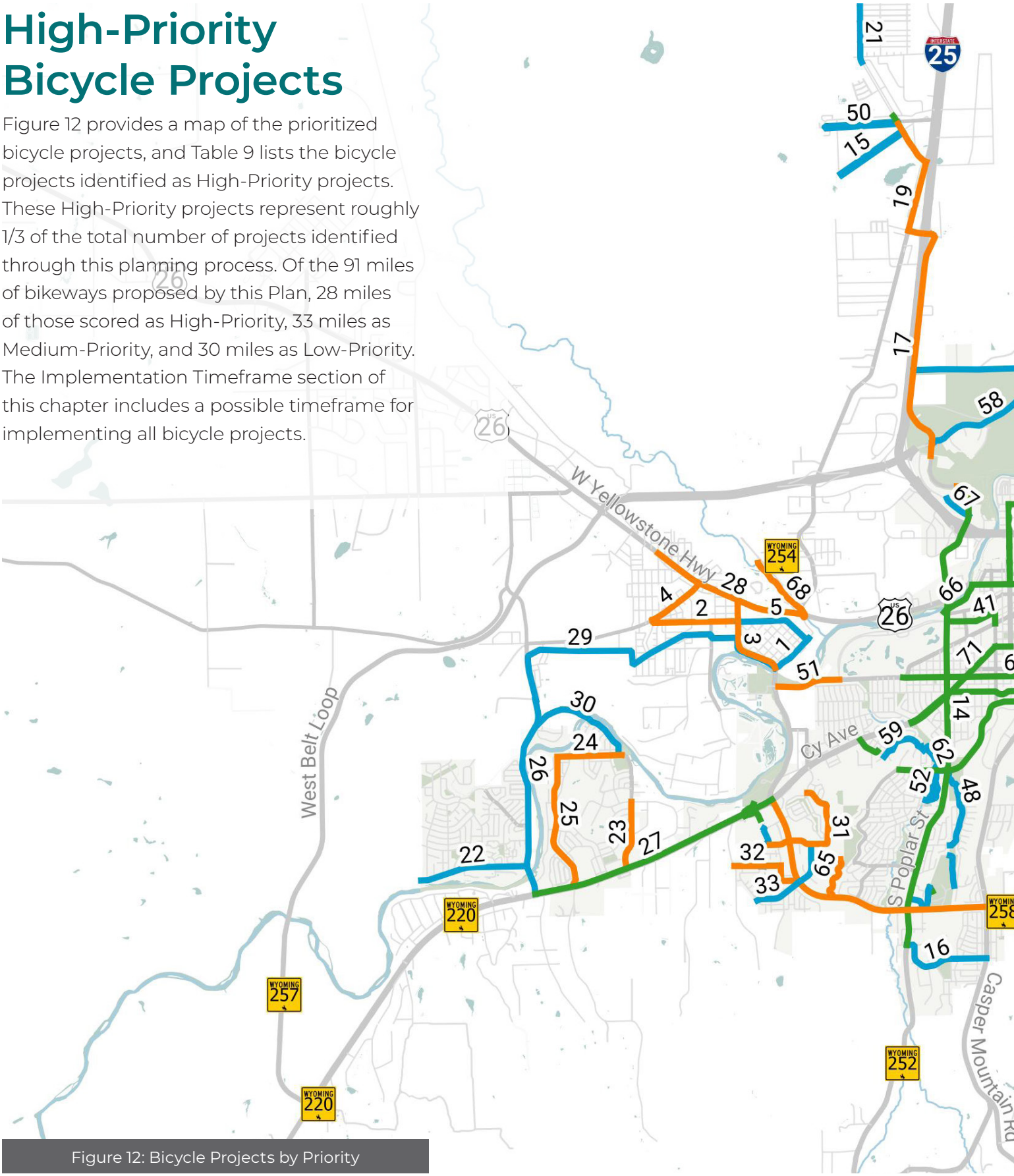
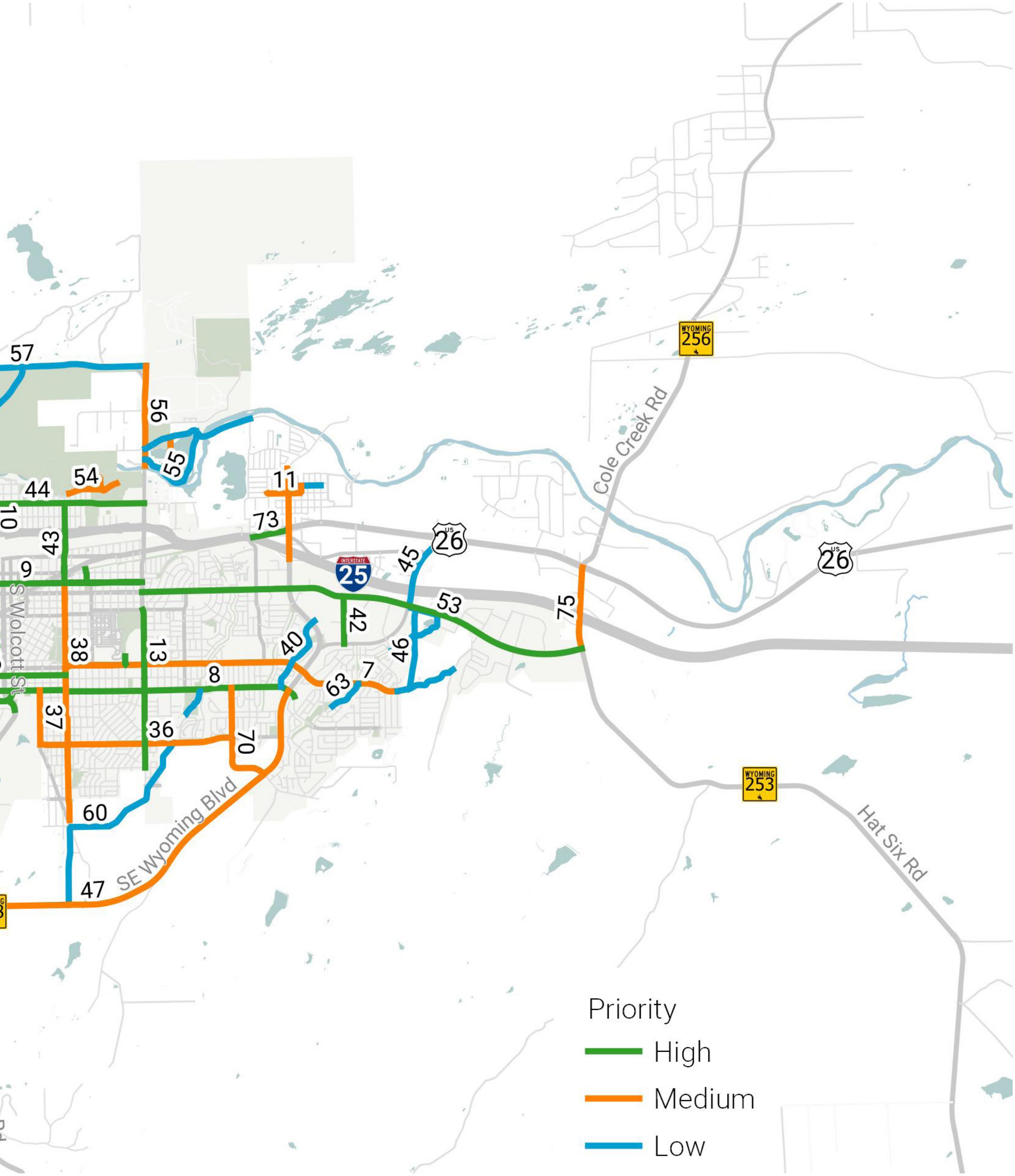


Figure 12: Bicycle Projects by Priority


57
56
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54
44
10
11
73
43
9
S Wolcott St
26
45
25
53
75
26
42
38
13
40
46
8
7
63
37
36
70
60
47
SE Wyoming Blvd
Cole Creek Rd
256
253
Hat Six Rd
Priority
High
Medium
Low

Table 9: High-Priority Bicycle Projects

Project ID	Corridor	From Street	To Street	Facility Recommendation	Implementation Method	Total Score
74.1	W 9th St	S Ash St	S Center St	Bike Lane	Remove Parking (Both Sides)	40.99
76.1	N Center St	W D St	W B C St	Sidepath	New Construction	36.08
10.1	N Center St	W K St	W F St	Buffered Bike Lane	Lane Narrowing	31.75
10.2	N Center St	W F St	W D St	Buffered Bike Lane	Lane Removal	
10.3	N Center St	W B C St	E 1st St	Buffered Bike Lane	Lane Removal	
72.1	Highland Path (Proposed)	E 12th St	S Lowell St	Trail	New Construction	31.7
43.1	N Mckinley St	E K St	E 1st St	Bike Lane	Lane Narrowing, Remove Parking (Both Sides), Remove Parking (One Side)	26.81
61.1	Yesness Boardwalk (Proposed)	West Yesness Pond	Yesness Park (Existing)	Trail	New Construction	26.55
9.1	E 1st St, W 1st St	Platte River Parkway	S Wilson St	Separated Bike Lane	Lane Removal	25.27
9.2	E 1st St	N Wilson St	N Beverly St	Bike Lane	Remove Parking (One Side)	
49.1	Casper Mountain Road	Campus Dr	College Dr	Sidepath	New Construction	24.73
64.1	Conwell Walk	Casper Rail Trail	N Melrose St	Sidepath	Widen Existing Facility	24.29
44.1	E K St	N Center St	N Elma St	Bike Lane	Remove Parking (One Side)	24.2
44.2	E K St	N Elma St	Bryan Stock Trl	Bike Lane	Lane Narrowing	
73.1	Casper Rail Trail, Casper Rail Trail (Proposed)	S Curtis St	Interstate I-25	Trail	New Construction	23.74
66.1	Old Yellowstone District (Proposed), Platte River Commons (Proposed)	Platte River Parkway (Existing)	N/A	Trail	New Construction	23.01
6.1	W 13th St	W Collins Dr	CY Avenue	Buffered Bike Lane	Lane Narrowing	22.97
6.2	E 13th St, W 13th St	CY Avenue	S Mckinley St	Bike Lane	Remove Parking (Both Sides)	
71.1	CY Avenue	S Poplar St	S Ash St	Separated Bike Lane	Lane Removal	
71.2	CY Avenue	S Poplar St	Bellaire Dr	Separated Bike Lane	Lane Removal	22.85
71.3	CY Avenue	Bellaire Dr	S Poplar St	Separated Bike Lane	Lane Removal	
69.1	Audubon Path (Proposed)	Mountain Plaza Path	Morad Bypass (Existing)	Trail	New Construction	21.96
69.2	Mountain Plaza Path (Proposed)	Audubon Path	N/A	Sidepath	New Construction	
20.1	Antelope Dr	Prairie Ln	Sunset Blvd	Bike Lane	Lane Narrowing	21.34
41.1	W Midwest Ave, S Ash St	King Blvd	W Collins Dr	Bike Lane	Lane Narrowing	21.33

Project ID	Corridor	From Street	To Street	Facility Recommendation	Implementation Method	Total Score
27.1	CY Avenue	SW Wyoming Blvd	S Robertson Rd	Sidepath	New Construction	20.86
14.1	S Poplar St	CY Avenue	W 50th St	Buffered Bike Lane	Lane Narrowing	20.5
14.2	N Poplar St, S Poplar St	Big Horn Rd	CY Avenue	Separated Bike Lane	Lane Removal	
14.3	N Poplar St	N/A	Big Horn Rd	Separated Bike Lane	Lane Removal	
42.1	Landmark Dr	E 2nd St	Blackmore Rd	Bike Lane	Lane Narrowing	20.42
13.1	S Beverly St	E 4th St	E 15th St	Buffered Bike Lane	Lane Removal	19.77
13.2	S Beverly St	E 15th St	E 24th St	Buffered Bike Lane	Lane Narrowing	
35.1	W 25th St	Belmont Rd	College Dr	Bike Lane	Lane Narrowing	19.29
35.2	College Dr	W 25th St	S Wolcott St	Bike Lane	Lane Narrowing	
35.3	College Dr	E 15th St	S Wolcott St	Bike Lane	Lane Removal	
53.1	E 2nd St	S Beverly St	SE Wyoming Blvd	Separated Bike Lane	Lane Removal	19.1
53.2	E 2nd St	SE Wyoming Blvd	Hat Six Rd	Sidepath	New Construction, Widen Existing Facility	
34.1	W Coffman Ave	CY Avenue	Skyridge	Bike Lane	Lane Narrowing	19.02
8.1	W 15th St, E 15th St	CY Avenue	S Mckinley St	Bike Lane	Lane Narrowing	18.93
8.2	E 15th St	S Mckinley St	S Beverly St	Bike Lane	Lane Narrowing	
8.3	E 15th St	S Beverly St	SE Wyoming Blvd	Buffered Bike Lane	Lane Narrowing	
8.4	Centennial Hills Blvd	SE Wyoming Blvd	Centennial Ct	Bike Lane	Lane Narrowing	

High-Priority Sidewalk Projects

Figure 13 provides a map of the prioritized sidewalk projects, and Table 10 lists the top 25 highest-priority projects. This project list reflects sidewalk gaps to be completed. Of the 605 miles of sidewalk gaps identified by this Plan, 206 miles of those scored as High-Priority, 220 miles as Medium-Priority, and 180 miles as Low-Priority. The Implementation Timeframe section of this chapter includes a possible timeframe for implementing all sidewalk projects.

Complete maps and lists of all the bicycle and sidewalk projects, organized by priority, can be found in Appendices B and C, respectively.

Sidewalk gaps are categorized as having a gap either on one side of the street or both sides of the street.

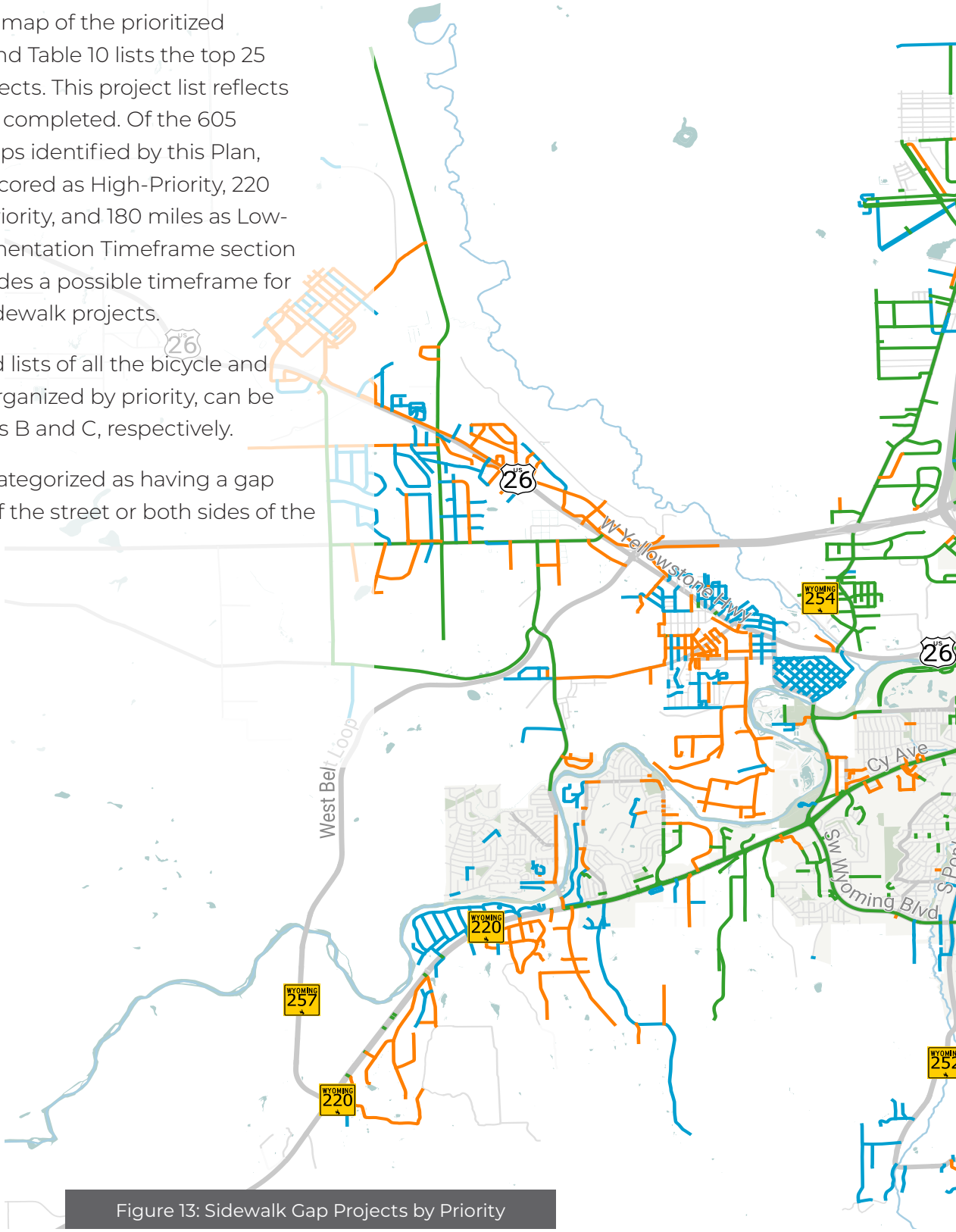

Figure 13: Sidewalk Gap Projects by Priority

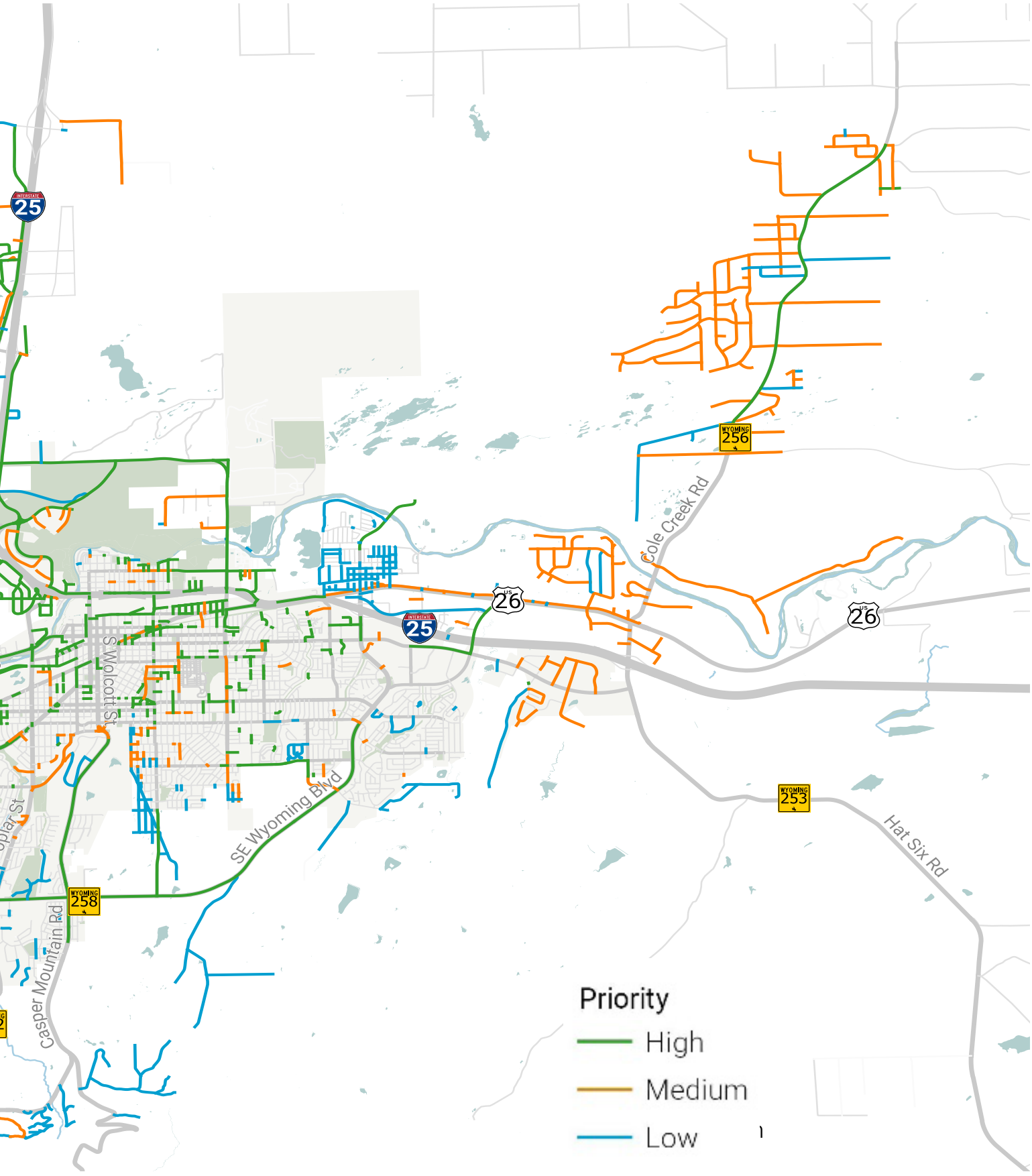
25
WYOMING 256
Cole Creek Rd
US 26
25
US 26
S Wolcott St
SE Wyoming Blvd
WYOMING 253
Hat Six Rd
WYOMING 258
Casper Mountain Rd
Priority
High
Medium
Low

Table 10: Top 25 Highest Priority Sidewalk Gap Projects

Project ID	Name	Category	Total Score
488	E M St	one side	37.66
718	S Montana Ave	one side	35.06
722	E 2nd St	one side	30.93
588	S Poplar St	one side	29.99
538	N Poplar St	one side	29.79
703	N Forest Dr	both sides	29.31
545	W 1st St	one side	28.92
553	S Poplar St	both sides	28.44
975	Westridge Dr	both sides	28.3
547	W Yellowstone Hwy	one side	28.28
572	W 15th St	one side	28.25
571	Westridge Ln	both sides	28.12
720	S Nebraska Ave	one side	27.49
496	N Center St	one side	27.21
555	W 1st St	both sides	27.19
714	E 4th St	one side	26.49
583	W 12th St	one side	26.42
713	Missouri Ave	both sides	25.98
687	S Nebraska Ave	one side	25.73
712	Missouri Ave	one side	25.61
758	E Yellowstone Hwy	both sides	25.54
630	S Mckinley St	both sides	25.43
705	N Forest Dr	one side	25.35
568	W 15th St	both sides	25.28
93	S Magnolia	one side	25.24

Implementation Timeframe

After defining project priorities, the project team applied a funding and implementation lens to provide a realistic road map for implementation. The resulting implementation timeframe integrates funding constraints and high-level assumptions about project costs (discussed in further detail below) as well as MPO staff knowledge of other factors that cannot be measured quantitatively.

Table 11 provides planning-level opinions of probable cost for project types in this Plan. These cost opinions are based on average bid prices from the Wyoming Department of Transportation (WYDOT), 2020 dollars, where they were available and are supplemented by data from other localities. Assumptions reflected in the cost opinions are detailed in Appendix D. The opinions of probable cost were developed by identifying major pay items and establishing rough quantities to determine a rough order of magnitude cost. Additional pay items have been assigned approximate lump sum prices based on a percentage of the anticipated construction cost. These costs reflect a 30% contingency for restriping projects including design costs, and a 40% contingency for capital projects and widening roadways including design and engineering costs. The contingencies cover items that are undefined or are typically unknown early in the planning phase of a project.

Capital projects, which include paving new trails and side paths and building new sidewalks, incorporate items for ADA ramps and driveway rebuilds at varying frequencies. Larger intersection modification costs were removed from the individual facilities and are separately accounted for to account for the varying frequency of intersections along corridors. Cost opinions do not include easement and right-of-way acquisition; utility relocations; permitting, inspection, or construction management; special site remediation, escalation, or the cost for ongoing maintenance. The overall cost opinions are intended to be general and used only for planning purposes. Toole Design Group, LLC makes no guarantees or warranties regarding the cost estimate herein. Construction costs will vary based on the ultimate project scope, actual site conditions and constraints, schedule, and economic conditions at the time of construction. Additional information regarding unit costs for these facilities is included in Appendix D.

Table 11: Bicycle and Pedestrian Facility Planning-Level Opinions of Probable Cost

Facility Type	Planning-Level Opinion of Probable Cost (per mile)
Trail	$1,030,000
Sidepath	$1,780,000
Sidewalk	$980,000
Convert sidewalk to sidepath	$1,370,000
Bike Lane – Restriping	$170,000
Bike Lane – Widening	$1,160,000
Buffered Bike Lane – Restriping	$170,000
Separated Bike Lane – Restriping	$280,000
Separated Bike Lane – Widening	$1,270,000
Intersection Modification	$300,000 (per intersection)

The Implementation Timeframe, in the tables that follow, reflects prioritization results sorted into short-term (0-5 years) and mid-term (5-10 years), and timeframes for implementation. For bicycle projects, long-term vision (10+ years) timeframes are included in Table 12. For pedestrian projects, long-term vision timeframes can be found in Appendix C. Because there is so much uncertainty involved in anticipating funding levels and priorities beyond a ten-year time frame, the long-term vision projects should be re-assessed when this plan is updated (ideally within the next ten years). The details in Table 11 were incorporated to form the basis of the implementation timeframe along with the assumption that approximately $25 million dollars will be available for bicycle and sidewalk project implementation over a five year period (with approximately 2/3 used for new construction projects and 1/3 used for resurfacing projects).[1]

Projects were assigned funding priority based on the results of prioritization, where higher scoring projects would be implemented first, and lower scoring projects implemented later. With projects split between new construction and resurfacing, and sorted by prioritization score, their budgets were considered against the allocated funding amount for each five-year period. Because the implementation sorting is handled separately among the two distinct funding categories, as well as the nature of varying project costs and funding progressions, some higher-priority projects may be placed into the medium and long term implementation time frames. This table does not present a rigid framework and is intended to serve as a guide for the MPO. On occasion, it may be expedient to implement longer-term projects earlier based on opportunities that arise or shifts in community needs.

Bicycle Project Implementation Timeframe

Table 12: Implementation Strategy (Bicycle Projects)

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
74.1	W 9th St	S Ash St	S Center St	Bike Lane	Remove Parking (Both Sides)	High	Short
76.1	N Center St	W D St	W B C St	Sidepath	New Construction	High	Short
10.1	N Center St	W K St	E F St	Buffered Bike Lane	Lane Narrowing	High	Short
10.2	N Center St	W F St	W D St	Buffered Bike Lane	Lane Removal	High	Short
10.3	N Center St	W B C St	E 1st St	Buffered Bike Lane	Lane Removal	High	Short
72.1	Highland Path (Proposed)	E 12th St	Private Access	Trail	New Construction	High	Short
43.1	N Mckinley St	E K St	S Mckinley St	Bike Lane	Lane Narrowing, Remove Parking (Both Sides), Remove Parking (One Side)	High	Short
61.1	Yesness Boardwalk (Proposed)	West Yesness Pond	Yesness (Existing)	Trail	New Construction	High	Short

1 Annual funding levels were determined based on a high-level review of available recent funding allocations for bicycle and pedestrian infrastructure in the City of Casper, the Town of Evansville, and the Town of Bar Nunn. Specific information on general funding allocations for bicycle and pedestrian infrastructure were not available for the City of Mills and Natrona County. For the purposes of crafting the implementation timeframe, intersection modification costs were applied to each signalized intersection along a corridor. If two facilities met at the same signalized intersection, the higher priority project was allocated the full intersection modification cost.

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
9.1	E 1st St, W 1st St	Platte River Pkwy	N Wilson St	Separated Bike Lane	Lane Removal	High	Short
9.2	E 1st St	S Wilson St	N Beverly St	Bike Lane	Remove Parking (One Side)	High	Short
49.1	Casper Mountain Rd	Mountain Rd	College Dr	Sidepath	New Construction	High	Short
44.1	E K St	N Center St	N Elma St	Bike Lane	Remove Parking (One Side)	High	Short
44.2	E K St	N Elma St	Bryan Stock Trl	Bike Lane	Lane Narrowing	High	Short
6.1	W 13th St	W Collins Dr	CY Ave	Buffered Bike Lane	Lane Narrowing	High	Short
6.2	E 13th St, W 13th St	CY Ave	S Mckinley St	Bike Lane	Remove Parking (Both Sides)	High	Short
71.1	CY Ave	S Poplar St	S Ash St	Separated Bike Lane	Lane Removal	High	Short
71.2	CY Ave	S Poplar St	Bellaire Dr	Separated Bike Lane	Lane Removal	High	Short
71.3	CY Ave	Bellaire Dr	S Poplar St	Separated Bike Lane	Lane Removal	High	Short
20.1	Antelope Dr	Prairie Ln	Sunset Blvd	Bike Lane	Lane Narrowing	High	Short
41.1	S Ash St, W Midwest Ave	King Blvd	W Collins Dr	Bike Lane	Lane Narrowing	High	Short
64.1	Conwell Walk	Casper Rail Trail	N Melrose St	Sidepath	Widen Existing Facility	High	Medium
73.1	Casper Rail Trail	S Curtis St	US Interstate I-25	Trail	New Construction	High	Medium
14.1	S Poplar St	CY Ave	Marks Way	Buffered Bike Lane	Lane Narrowing	High	Medium
14.2	S Poplar St, N Poplar St	Big Horn Rd	CY Ave	Separated Bike Lane	Lane Removal	High	Medium
14.3	N Poplar St	Crossroads Park	Big Horn Rd	Separated Bike Lane	Lane Removal	High	Medium
42.1	Landmark Dr	E 2nd St	Blackmore Rd	Bike Lane	Lane Narrowing	High	Medium
13.1	S Beverly St	E 4th St	E 15th St	Buffered Bike Lane	Lane Removal	High	Medium
13.2	S Beverly St	E 15th St	E 24th St	Buffered Bike Lane	Lane Narrowing	High	Medium
35.1	W 25th St	Belmont Rd	S Poplar St	Bike Lane	Lane Narrowing	High	Medium
35.2	College Dr	S Poplar St	S Wolcott St	Bike Lane	Lane Narrowing	High	Medium
35.3	College Dr	E 15th St	Casper Mountain Rd	Bike Lane	Lane Removal	High	Medium
34.1	W Coffman Ave	CY Ave	Skyridge	Bike Lane	Lane Narrowing	High	Medium
66.1	Old Yellowstone District (Proposed), Platte River Commons (Proposed)	Platte River Pkwy (Existing)		Trail	New Construction	High	Long
69.1	Audubon Path (Proposed)	Mountain Plaza Path	Morad Byp (Existing)	Trail	New Construction	High	Long

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
69.2	Mountain Plaza Path (Proposed)	Audubon Path		Sidepath	New Construction	High	Long
27.1	CY Ave	SW Wyoming Blvd	State Highway 220	Sidepath	New Construction	High	Long
53.1	E 2nd St	S Beverly St	SE Wyoming Blvd	Separated Bike Lane	Lane Removal	High	Long
53.2	E 2nd St	SE Wyoming Blvd	Hat Six Rd	Sidepath	New Construction, Widen Existing Facility	High	Long
8.1	W 15th St, E 15th St	CY Ave	S Mckinley St	Bike Lane	Lane Narrowing	High	Long
8.2	E 15th St	S Mckinley St	S Beverly St	Bike Lane	Lane Narrowing	High	Long
8.3	E 15th St	S Beverly St	Centennial Hills Blvd	Buffered Bike Lane	Lane Narrowing	High	Long
8.4	Centennial Hills Blvd	SE Wyoming Blvd	Centennial Ct	Bike Lane	Lane Narrowing	High	Long
36.1	E 21st St	Oakcrest Ave	S Mckinley St	Bike Lane	Remove Parking (Both Sides)	Medium	Long
36.2	E 21st St	S Mckinley St	Kingsbury Dr	Bike Lane	Lane Narrowing	Medium	Long
7.1	E 12th St	S Mckinley St	S Washington St	Buffered Bike Lane	Lane Narrowing	Medium	Long
7.2	E 12th St	S Washington St	Country Club Rd	Bike Lane	Lane Removal	Medium	Long
7.3	E 12th St	Country Club Rd	Carriage Ln	Buffered Bike Lane	Lane Removal	Medium	Long
7.4	E 12th St	Carriage Ln	Elkhorn Valley Dr	Buffered Bike Lane	Lane Removal	Medium	Long
17.1	N Poplar St	Wilkins Cir	Crossroads Park	Sidepath	Widen Existing Facility	Medium	Long
17.2	N Poplar	US Interstate I-25	N Poplar St	Sidepath	Widen Existing Facility	Medium	Long
51.1	W 13th St	SW Wyoming Blvd	King Blvd	Sidepath	New Construction	Medium	Long
24.1	Riverbend Rd	Indian Paintbrush	Platte View Bluffs Park	Bike Lane	Lane Narrowing	Medium	Long
75.1	Hat Six Rd	E Yellowstone Hwy	E 2nd St	Sidepath	New Construction	Medium	Long
11.1	Texas St, 3rd St	Copper Ave	4th St	Bike Lane	Remove Parking (One Side)	Medium	Long
11.2	6th St, Curtis St, V A Cemetery Rd	Evansville	3rd St	Buffered Bike Lane	Lane Narrowing, Remove Parking (Both Sides)	Medium	Long

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
11.3	Curtis St	3rd St	E Yellowstone Hwy	Buffered Bike Lane	Lane Narrowing	Medium	Long
11.4	S Curtis St	E Yellowstone Hwy	US Interstate I-25	Trail	New Construction	Medium	Long
23.1	Paradise Dr	Magnolia	CY Ave	Bike Lane	Lane Removal	Medium	Long
31.1	Talon Dr, Jordan Dr, Central Dr	Pheasant Dr	Patriot Dr	Bike Lane	Lane Narrowing	Medium	Long
55.5	Long Lake (Proposed)			Trail	New Construction	Medium	Long
56.1	Bryan Stock Trail	Bryan Stock Trl	Amoco Rd	Sidepath	New Construction	Medium	Long
32.1	W 38th St	Wolf Creek Rd	Aspen Pl	Bike Lane	Remove Parking (One Side)	Medium	Long
32.2	Aspen Pl, Sweetbrier St	W 38th St	Eagle Dr	Bike Lane	Remove Parking (Both Sides)	Medium	Long
38.1	S Mckinley St	E 1st St	E 3rd St	Buffered Bike Lane	Lane Narrowing	Medium	Long
38.2	S Mckinley St, E 21st St, E 18th St	E 3rd St	Allendale Blvd	Bike Lane	Remove Parking (One Side)	Medium	Long
68.1	Caspar Creek Path (Proposed)		Platte River Pkwy (Existing)	Trail	New Construction	Medium	Long
19.1	Antelope Dr	Sunset Blvd	Salt Creek Hwy	Sidepath	New Construction	Medium	Long
19.2	Salt Creek Hwy	Howard St	Antelope Dr	Sidepath	New Construction	Medium	Long
70.1	Kingsbury Dr, Country Club Rd	E 15th St	Outer Dr	Bike Lane	Lane Narrowing	Medium	Long
18.1	Howard St	Salt Creek Hwy	US Interstate I-25	Bike Lane	Lane Narrowing	Medium	Long
28.1	W Yellowstone Hwy	N 3rd Ave	Salt Creek Hwy	Sidepath	Widen Existing Facility	Medium	Long
4.1	Poison Spider Rd	S 4th Ave	W Yellowstone Hwy	Buffered Bike Lane	Lane Narrowing	Medium	Long
3.1	SW Wyoming Blvd	W Yellowstone Hwy	First St	Separated Bike Lane	Lane Removal	Medium	Long
54.1	E M St (Proposed)	Riverview Park	North Casper Park	Trail	New Construction	Medium	Long
54.2	Wells Park (Proposed)	E M St	Soccer Complex (Existing)	Trail	New Construction	Medium	Long
54.3	North Casper Park (Proposed)	E M St	Platte River Pkwy (Existing)	Trail	New Construction	Medium	Long
65.1	Mesa 6 (Proposed)	Outer Dr	Mesa Path (Existing)	Trail	New Construction	Medium	Long

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
25.1	Indian Paintbrush	Larkspur	CY Ave	Bike Lane	Remove Parking (Both Sides)	Medium	Long
2.1	Pendell Blvd, S 4th Ave	Poison Spider Rd	SW Wyoming Blvd	Buffered Bike Lane	Lane Narrowing	Medium	Long
47.1	SE Wyoming Blvd	E 15th St	Country Club Rd	Sidepath	New Construction	Medium	Long
47.2	SE Wyoming Blvd	S Mckinley St	Country Club Rd	Sidepath	New Construction	Medium	Long
47.3	SE Wyoming Blvd, SW Wyoming Blvd	S Poplar St	S Mckinley St	Sidepath	New Construction	Medium	Long
47.4	SW Wyoming Blvd	CY Ave	S Poplar St	Sidepath	New Construction	Medium	Long
37.1	Oakcrest Ave	E 15th St	E 21st St	Bike Lane	Lane Narrowing	Medium	Long
57.1	Amoco Rd	N Poplar	Bryan Stock Trail	Sidepath	New Construction	Low	Long
63.1	Newchurch Goen (Proposed)	Newchurch (Existing)	Vista Ridge	Trail	New Construction	Low	Long
39.1	W 23rd St, Odell Ave	S Coffman Ave	S Poplar St	Bike Lane	Lane Narrowing	Low	Long
45.1	Blackmore Rd	E 2nd St	Casper Rail Trail	Sidepath	New Construction	Low	Long
52.1	W 25th St	S Poplar St	Garden Creek Greenway	Sidepath	New Construction	Low	Long
52.2	Adams Greenway (Proposed)	S Coffman Ave	W 25th St	Trail	New Construction	Low	Long
52.3	Adams Greenway Alt (Proposed)	Adams Greenway	Adams Greenway	Trail	New Construction	Low	Long
26.1	S Robertson Rd	Private Access	State Highway 220	Sidepath	New Construction, Widen Existing Facility	Low	Long
67.1	Werner Ct	N Poplar St	Wilkins Cir	Sidepath	New Construction	Low	Long
59.1	Grandview Pl (Proposed), Grandview (Proposed)	Mesa Path (Existing)	Odell Ct (Existing)	Trail	New Construction	Low	Long
30.1	River Park (Proposed)	Platte River Pkwy (Existing)	Robertson Rd	Trail	New Construction	Low	Long
30.2	Mountain Plaza Path (Proposed)	Wolf Creek Path (Existing)	Private Dr	Sidepath	New Construction	Low	Long
21.1	Antelope Dr	Mcmurry Blvd	Zuni Trl	Bike Lane	Lane Narrowing	Low	Long
60.1	Sage Path (Proposed)	Outer Dr	E 21st St	Trail	New Construction	Low	Long
60.2	Sage Path (Proposed)	15th St (Existing)		Trail	New Construction	Low	Long

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
1.1	First St	SW Wyoming Blvd	Platte River Pkwy	Bike Lane	Lane Narrowing	Low	Long
62.2	Garden Creek Greenway (Proposed)	W 25th St	Nancy English Park	Trail	New Construction	Low	Long
33.1	Eagle Dr	Fox	SW Wyoming Blvd	Bike Lane	Lane Narrowing	Low	Long
33.2	Eagle Dr	Talon Dr	SW Wyoming Blvd	Bike Lane	Lane Removal	Low	Long
55.1	Long Lake (Proposed), Bryan Stock Trail (Proposed)	Bryan Stock Trl		Trail	New Construction	Low	Long
55.2	Long Lake (Proposed), Knife River (Proposed)		Evansville (Existing)	Trail	New Construction	Low	Long
55.3	Long Lake (Proposed)			Trail	New Construction	Low	Long
55.4	Long Lake (Proposed)	Bryan Stock Trail		Trail	New Construction	Low	Long
12.1	4th St	Texas St	Evans St	Bike Lane	Remove Parking (One Side)	Low	Long
48.1	S Mike Sedar Park (Proposed), Sedar Draw (Proposed), Sedar Draw (Proposed)	Yesness (Existing)	W 25th St	Trail	New Construction	Low	Long
48.2	West Yesness Pond (Proposed)	Yesness Park Rd	Yesness (Existing)	Trail	New Construction	Low	Long
48.3	Cresthill School (Proposed)	Yesness (Existing)		Trail	New Construction	Low	Long
48.4	Yesness (Proposed)	Lake Rd		Trail	New Construction	Low	Long
29.1	Mills Bike and Pedestrian Trail (Proposed)	First St	Robertson Rd	Trail	New Construction	Low	Long
15.1	Palomino Ave	Trails End	Antelope Dr	Bike Lane	Lane Narrowing	Low	Long
15.2	Palomino Ave	Trails End	Antelope Dr	Bike Lane	Lane Narrowing	Low	Long
50.1	Sunset Blvd	Antelope Dr	Antelope Dr	Bike Lane	Lane Narrowing	Low	Long
40.1	Carriage Ln	E 15th St		Bike Lane	Lane Narrowing	Low	Long
58.1	East Rd (Proposed)	N Poplar	Amoco Rd	Trail	New Construction	Low	Long

Project ID	Name	From	To	Facility Recommendation	Implementation Method	Prioritization Group	Implementation Time Frame
5.1	Pendell Blvd, Northwestern Ave	SW Wyoming Blvd	First St	Bike Lane	Lane Narrowing	Low	Long
46.1	E 2nd St (Proposed)	Betty Way	Blackmore Rd	Trail	New Construction	Low	Long
46.2	Elkhorn Valley (Proposed)	E 2nd St	Elkhorn Valley Dr	Trail	New Construction	Low	Long
46.3	Elkhorn Crossing (Proposed)	Access Rd	Elkhorn Valley	Trail	New Construction	Low	Long
46.4	Elkhorn Valley (Proposed)	Vista Ridge	Betty Way	Trail	New Construction	Low	Long
22.1	Trevett Ln		S Robertson Rd	Bike Lane	Lane Narrowing	Low	Long
16.1	Goodstein Dr, Marks Way	S Poplar St	Casper Mountain Rd	Bike Lane	Lane Removal	Low	Long

Sidewalk Gap Project Implementation Timeframe

Table 13: Implementation Strategy (Sidewalk Gap Projects)

Project ID	Name	Category	Prioritization Group	Implementation Time Frame
488	E M St	one side	High	Short
718	S Montana Ave	one side	High	Short
722	E 2nd St	one side	High	Short
588	S Poplar St	one side	High	Short
538	N Poplar St	one side	High	Short
703	N Forest Dr	both sides	High	Short
545	W 1st St	one side	High	Short
553	S Poplar St	both sides	High	Short
975	Westridge Dr	both sides	High	Short
547	W Yellowstone Hwy	one side	High	Short
572	W 15th St	one side	High	Short
571	Westridge Ln	both sides	High	Short
720	S Nebraska Ave	one side	High	Short
496	N Center St	one side	High	Short
555	W 1st St	both sides	High	Short
714	E 4th St	one side	High	Short
583	W 12th St	one side	High	Short
713	Missouri Ave	both sides	High	Short
687	S Nebraska Ave	one side	High	Short
712	Missouri Ave	one side	High	Short
758	E Yellowstone Hwy	both sides	High	Short

Project ID	Name	Category	Prioritization Group	Implementation Time Frame
630	S Mckinley St	both sides	High	Short
705	N Forest Dr	one side	High	Short
568	W 15th St	both sides	High	Short
93	S Magnolia	one side	High	Short
696	S Walsh Dr	one side	High	Short
619	W B C St	one side	High	Short
719	E 4th St	both sides	High	Short
627	S Park St	both sides	High	Short
532	N Poplar St	both sides	High	Short
715	E 3rd St	one side	High	Short
518	Salt Creek Pky	both sides	High	Short
697	Medicine Bow St	one side	High	Short
44	CY Ave	both sides	High	Short
63	SW Wyoming Blvd	both sides	High	Medium
519	Salt Creek Hwy	one side	High	Medium
640	Access Rd	both sides	High	Medium
621	E C St	both sides	High	Medium
281	Salt Creek Hwy	both sides	High	Medium
249	W 13th St	both sides	High	Medium
644	N Melrose St	one side	High	Medium
57	Outer Rd	one side	High	Medium
37	Eagle Dr	one side	High	Medium
586	CY Ave	one side	High	Medium
641	N Mckinley St	both sides	High	Medium
709	N Pennsylvania Ave	one side	High	Medium
664	Private Dr	both sides	High	Medium
39	Aspen Pl	one side	High	Medium
686	Odell Pl	one side	High	Medium
650	Burlington Ave	one side	High	Medium
440	Salt Creek Hwy	both sides	High	Medium
476	E F St	both sides	High	Medium
478	E F St	one side	High	Medium
544	Pronghorn St	both sides	High	Medium
600	E 11th St	both sides	High	Medium
699	SE Wyoming Blvd	both sides	High	Medium

Conclusion

The Casper Area has great potential to create an intuitive and inviting active transportation network. Its vast trail network and community support for trails create an opportune backbone for connected walking and bicycling networks. These existing strengths will help the Casper Area achieve the goals set forth in this plan, which include safety and comfort; connectivity; increase in non-car trips; equity; and community.

This Plan outlines steps to take in order to achieve these goals, including;

- A planned network of 91 miles of bikeways, including 17 miles that can be built in the next five years
- A planned network of 605 miles of sidewalks, including 16 miles that can be built in the next five years
- Proposed approaches for improving pedestrian safety and comfort in key contexts
- Policy and program recommendations to make it easy to build more active transportation projects and create a better environment for people walking and bicycling

Implementation of the recommendations contained in this Plan will make the Casper Area a healthier, more livable, and attractive to live, work, and visit. These investments will help the Casper Area to more efficiently and effectively use roadway space and create more options for people wishing to travel through and around the region. If the Casper Area MPO and member cities work together to implement this Plan over the coming 15 years, the Casper Area has the potential to become a great place to walk and ride a bicycle.

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BICYCLE AND PEDESTRIAN MASTER PLAN