Section 4: Active Transportation Plan

Section 4.1: Active Transportation Plan Executive Summary


RIGHT LANE
MUST
TURN RIGHT
West
15

EXECUTIVE SUMMARY

INTRODUCTION

The City of Riverside Active Transportation Plan (AT Plan) integrates walking, bicycling, and other transportation modes into a single plan that includes policies, infrastructure recommendations, and supporting programs. It identifies context specific funding sources, prioritized infrastructure projects, and implementation strategies. The AT Plan is one component of the PACT, (Pedestrian Target Safeguarding Plan, Active Transportation Plan, a Complete Streets Ordinance, and a Trails Master Plan) for Riverside.

GOALS, OBJECTIVES, AND ACTIONS

Based on priorities identified through community outreach, research of best practices, and the input of stakeholders including City staff, the following goals and their corresponding objectives and actions were developed to guide the AT Plan:

1. Economic prosperity
2. Safety
3. Socially responsible
4. Health
5. Accessible
6. Environmental Stewardship

FACILITY TYPOLOGIES

This section identifies many of the facilities and features that contribute to a safe and comfortable environment for pedestrians and bicyclists.

Pedestrian Facilities:

- Sidewalks and Paths
- Crossing Facilities
- Curb Treatments
- Beacons and Signals
- Pedestrian Support Facilities
- Traffic Calming Measures

Bicycle Facilities

- Class I Shared Use Paths
- Class II Bicycle Lanes
- Class II Buffered Bicycle Lanes
- Class III Bicycle Routes
- Class III Bicycle Boulevard
- Class IV Separated Bikeways
- Previously Planned Facilities

NETWORK RECOMMENDATIONS

This section identifies bicycle and pedestrian infrastructure and supporting amenities the City plans to implement. It includes the evaluation and approach that will determine which facilities to use in specific locations.

Pedestrian infrastructure recommendations:

- Pedestrian Spot Improvements

- Pedestrian Crossing Typologies
  - A: Signalized Intersection
  - B: Major/Minor Street
  - C: Minor/Minor Street
  - D: Trail Crossing/Mid-Block Crossing
  - E: High-Volume Pedestrian Areas
  - F: Highway Interchanges and Freeway Crossings
- Pedestrian Corridor Improvements

Bicycle infrastructure recommendations based on:

- Class
- Ward
- Where parking is allowed

Programmatic Recommendations

- Safe Routes to School
- Safe Routes to Transit
- Shared Mobility Study
- Trails Master Plan Network
- Regional Connections
- Wayfinding
- Average Daily Traffic/Vehicle Miles Traveled Benefits

FUNDING STRATEGIES

This section identifies a variety of sources to fund bicycle and pedestrian infrastructure projects, programs, and studies.

- Local and Regional Programs
- Competitive Grant Programs
- Other State Funds

PROJECT PRIORITIZATION

Project prioritization criteria will guide a strategic approach to implementing projects that best align with community goals while maximizing limited funding.

Prioritized Bicycle Projects and Prioritized Pedestrian Projects

- Tier 1: High Priority Projects
- Tier 2: Priority Projects
- Tier 3: Other Projects

IMPLEMENTATION PLAN

With limited and competitive funding, project implementation needs to be feasible, fundable, and sustainable. Projects are sorted into four implementation categories based on the combined results of two evaluations: project priority and project feasibility. Each evaluation scores projects on specific criteria.

Implementation Categories

- Short term
- Long term
- Opportunity improvements
- Low priority

The City of Riverside has over 150 miles of bikeways throughout the City. The trail network, managed by the City's Parks, Recreation and Community Services Department (PRCSD), features a variety of paved and unpaved offerings catering to the City's walking, hiking, biking, and equestrian communities.

The City's trails system plays an important role in Riverside's identity, celebrating its abundant natural resources, providing easily accessible outdoor recreational opportunities to residents, connecting neighborhoods to parks and other community resources, and offering non-motorized commuters a network for getting to and from work, school, and daily errands.

FIGURE 4-1 PEDESTRIAN RECOMMENDATIONS

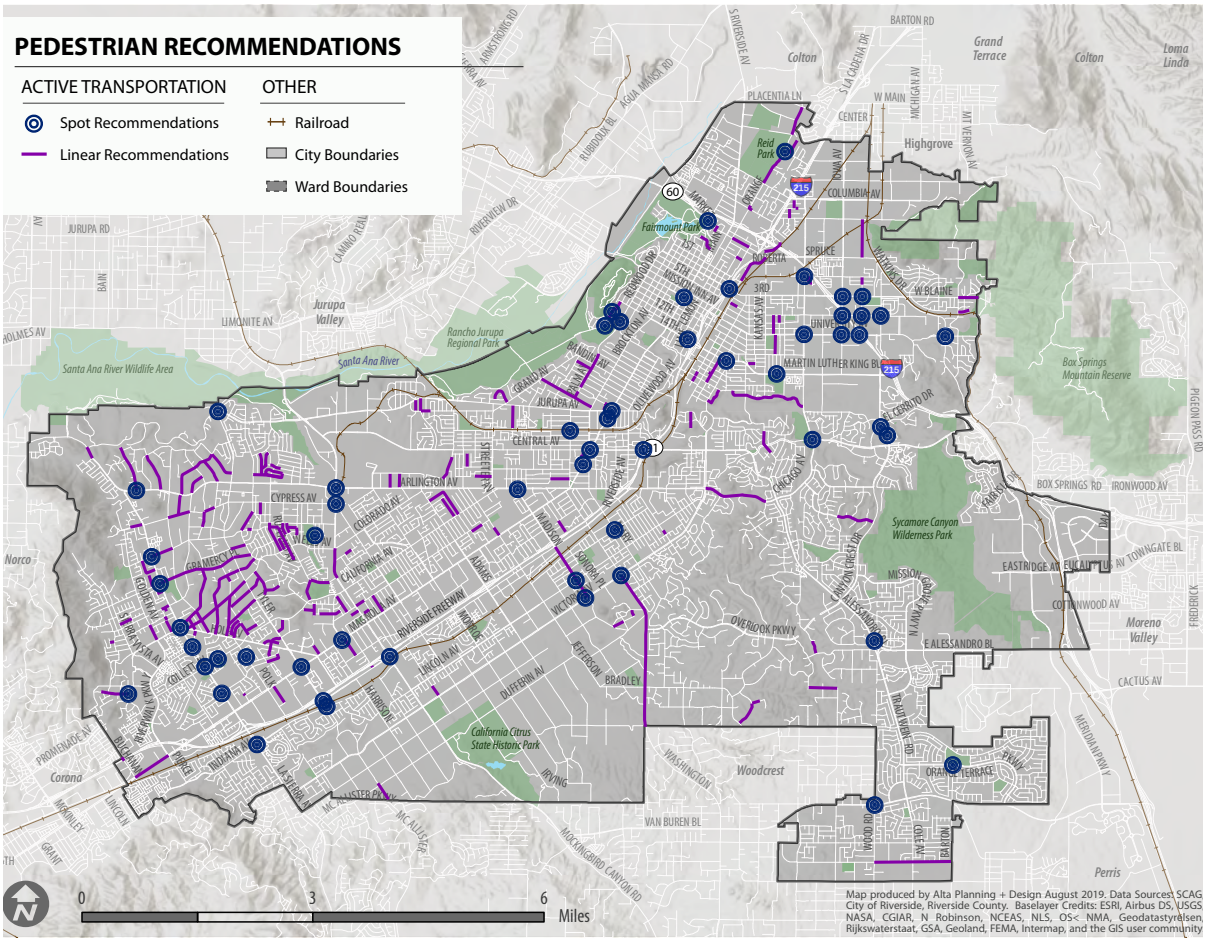
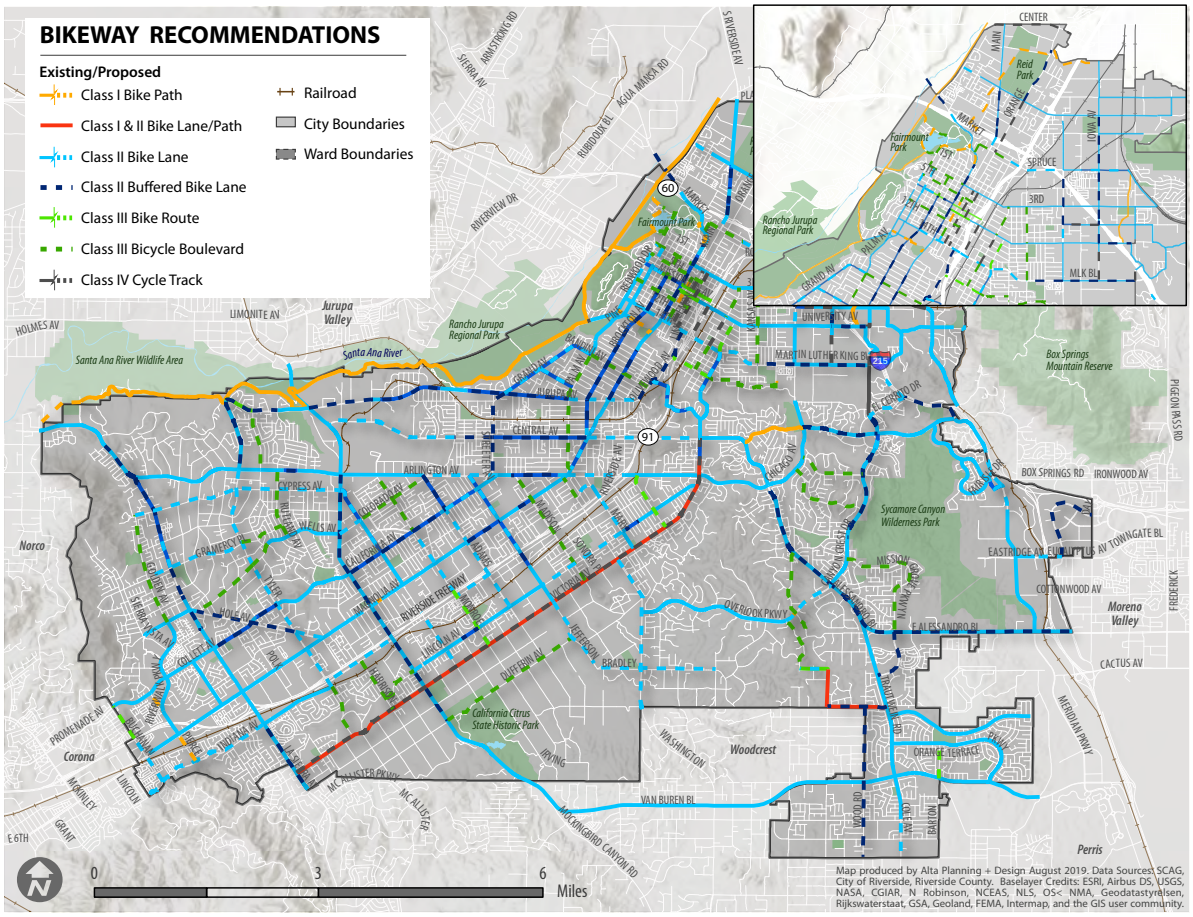


TABLE 4-1 BIKEWAY RECOMMENDATIONS MILEAGE

BIKEWAY CLASS	NAME	EXISTING (MILES)	PREVIOUSLY PLANNED (MILES)	RECOMMENDED (MILES)	UPGRADED (MILES)	TOTAL (MILES)
Class I	Shared Use Path	14.9	16.2	1.5	0.3	32.6
Class I & II	Bike Lane with Side Path	8.3	-	-	-	-
Class II	Bike Lane	122.3	48.0	40.5	2.2	210.8
Class IIB	Buffered Bike Lane	7.2	-	30.7	18.0	37.9
Class III	Bicycle Route	2.3	40.9	1.4	-	44.6
Class IIIB	Bicycle Boulevard	-	-	27.7	-	27.7
Class IV	Separated Bikeways	1.4	0.5	9.6	7.5	11.5
TOTAL		**156.4**	**105.6**	**111.4**	**28.0**	**365.0**

FIGURE 4-2 BIKEWAY RECOMMENDATIONS



Section 4.2: Introduction





The City of Riverside Active Transportation Plan (AT Plan) integrates walking, bicycling, and other transportation modes into a single plan that includes policies, infrastructure recommendations, and supporting programs, as well as identifies context specific funding sources, prioritized infrastructure projects, and implementation strategies. The AT Plan is one component of the PACT, (Pedestrian Target Safeguarding Plan, Active Transportation Plan, a Complete Streets Ordinance, and a Trails Master Plan) for Riverside. These Citywide Plans provide a framework for a multi-modal network for the City of Riverside's future bicycle and pedestrian improvement projects. Proposed plan recommendations are designed to increase safety, comfort, and accessibility for pedestrians and cyclists and ultimately expand utilization of these alternate modes of transportation. The AT Plan will guide current and future decision-makers toward a seamless and integrated active transportation network inclusive of all residents, needs, and destinations. The AT Plan's vision statement was developed in conjunction with and in support of the City of Riverside's mission [1].

1 *The City of Riverside is committed to providing high quality municipal services to ensure a safe, inclusive, and livable community.*

Vision & Goals

RIVERSIDE AT PLAN VISION STATEMENT: *RIVERSIDE WILL BE A MODEL COMMUNITY FOR MULTI-MODAL TRAVEL THAT PROVIDES SAFE AND COMFORTABLE CONNECTIONS TO COMMUNITY DESTINATIONS WHILE PROMOTING HEALTHY ACTIVE MOBILITY OPTIONS FOR ALL AGES AND ABILITIES.*



Sustainable Riverside: triple bottom line approach to sustainability.

The goals for the AT Plan were identified based on community input, the existing conditions analysis, and discussions with stakeholders and City staff. The goals are intertwined within each section of the AT Plan and drive all the recommendations.

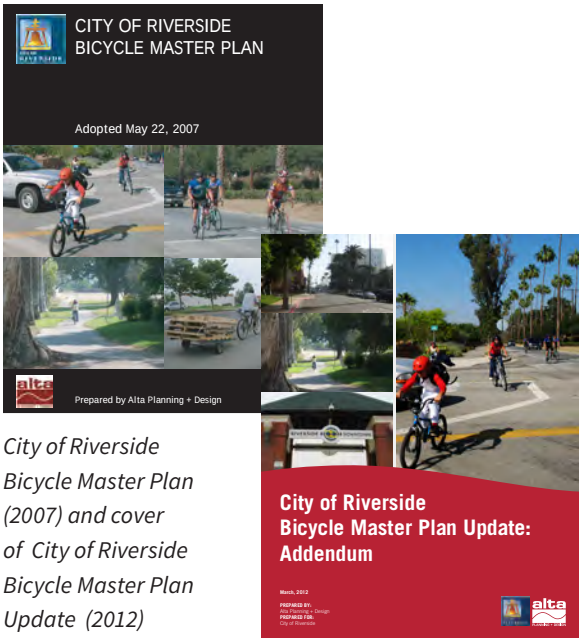
- Healthy - Promote citywide and regional transportation goals through investments in active transportation that create a culture of walking and biking.
- Economic Prosperity - Create an interconnected recreation and transportation network linking on-street facilities with existing trails, employment and commercial centers.
- Safety- Improve safety, reduce collisions, and create comfortable corridors for walking and biking in Riverside.
- Accessible - Enhance access to community destinations (parks, schools, work, libraries, shopping areas and community centers) and transit (Metrolink stations).
- Environmental Stewardship - Reduce Vehicle Miles Traveled (VMT) by developing an active transportation network that is a viable alternative to vehicle travel.
- Socially Responsible - Promote equitable and socially responsible investment across Riverside that bolsters community resilience.

Context and History

The Riverside Active Transportation Plan builds upon the foundation of the City's 2007 Bicycle Master Plan and 2012 Bicycle Master Plan Update: Addendum. In the past 10 years, new innovations in bicycle infrastructure design have been approved by the California Department of Transportation (Caltrans) and implemented throughout California. The Federal Highway Administration (FHWA) has developed new pedestrian measures tied to improving the safety of people walking and biking. Across the country, different campaigns and movements, such as Vision Zero, Complete Streets, and Safe Routes to School (SRTS) have gained momentum, focusing on implementing more safety improvements for all ages and abilities to bike and walk.

As part of the PACT planning process, a review of the policies, data, and recommendations for each of the following plans was performed to ensure foundational cohesiveness.

- City of Riverside General Plan (2007)
- City of Riverside Bicycle Master Plan (2007)
- University Neighborhood Plan (June 2008)
- Eastside Neighborhood Plan (June 2009)
- City of Riverside Bicycle Master Plan Update: Addendum (2012)



City of Riverside Bicycle Master Plan (2007) and cover of City of Riverside Bicycle Master Plan Update (2012)

- City of Riverside Restorative Growthprint - Climate Action Plan (RRG-CAP) (2014)
- Biking in Fresh Air: Consideration of Exposure to Traffic-Related Air Pollution in Bicycle Route Planning (2017)
- Riverside Transit Agency First and Last Mile Mobility Plan (2017)
- City of Riverside, California Downtown Specific Plan (Amended 2017)
- Western Riverside Council of Governments Active Transportation Plan (2018)
- Riverside County Comprehensive Trails Plan (2018)
- Marketplace District Plan (March 2019)
- City or Riverside traffic code, regulations, and policies (Version: Aug 1, 2019)
- Safe Routes to School Program

See Appendix C: Plan Policy Review for additional information.

What Was Heard

Community and stakeholder participation played a central role in shaping this plan. Participation included three technical advisory committee (TAC) meetings, over 30 community-wide public events, an interactive web map, and a community survey.

See Community Engagement Section of the PACT for additional information. During this planning process, community members expressed support for the following efforts illustrated in Table 4-2.

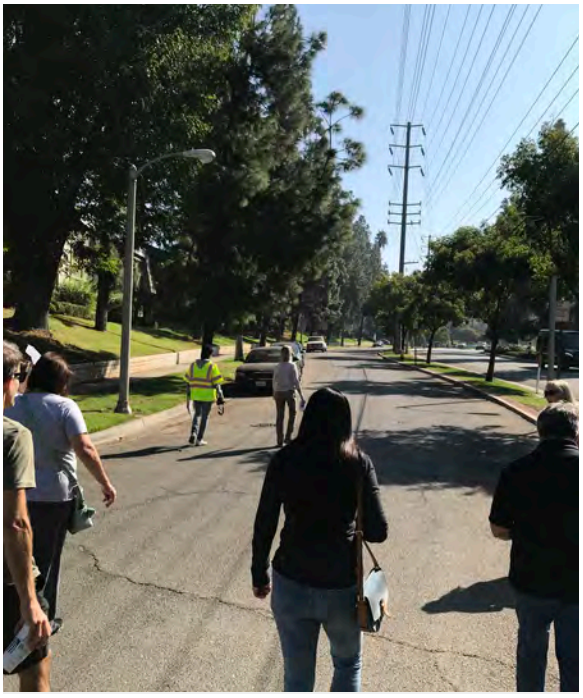


Photo Caption: Community Walk Audit in Canyon Crest neighborhood.

TABLE 4-2 PUBLIC INPUT GUIDING NETWORK RECOMMENDATIONS

WHAT WAS HEARD	WHAT'S PROPOSED
Imbalance of infrastructure conditions between Riverside wards.	**Make it Equitable** Provide improved access, facilities, and amenities to under invested areas of the City.
Upgrade sidewalks, crossing facilities, and bikeways to improve the walking and biking experience in Riverside.	**Make it Connected** Develop a comprehensive network of on-street and off-street facilities and shared use paths throughout Riverside, including through open spaces/parks, will connect to destinations and existing trails.
Address conflict areas between vehicles and bicyclists/ pedestrians.	**Make it Safer** Improve safety by reducing bicycle and pedestrian collisions through safe and comfortable facilities.
Concerns that commuting routes often require utilizing high volume, high speed arterial roadways.	**Make it Sustainable** Increase and improve facilities to job centers, education, retail, parks and libraries, schools, recreational centers, transit, and other neighborhood destinations.

Section 4.3: Goals, Objectives, and Actions



Goals, Objectives, and Actions

The AT Plan's goals reflect the priorities expressed by the community throughout the public outreach phase. Discussions with City departments, best practices across the nation, and input from community stakeholders have shaped the proposed strategies and policies intended to help the City achieve these goals.



Photo Caption: Cyclist waiting to cross Arlington Ave.

Goal 1: Economic Prosperity

CREATE AN INTERCONNECTED RECREATION AND TRANSPORTATION NETWORK LINKING ON-STREET FACILITIES WITH EXISTING TRAILS, EMPLOYMENT AND COMMERCIAL CENTERS.

Objective 1: Design a connected and comfortable bicycle network that serves people of all ages and abilities.

Action 1.1: Require review of the AT Plan as well as guidance from the National Association of City Transportation Officials (NACTO), Riverside Complete Streets Ordinance, and the most recent state and federal design guidelines when building on-street and off-street bicycle facilities.

Action 1.2: Build a connected network of bikeways for all ages and abilities, with a foundation of Class I to Class IV bicycle facilities.

Action 1.3: Continue to install bicycle detection markings, bicycle loop detection devices, or bicycle video detection devices at all intersections.

Objective 2: Continually evaluate opportunities to reconfigure roadways with excess vehicular capacity to accommodate bicycle facilities.

Action 2.1: Narrow lanes to meet the City's Complete Streets Ordinance of 11-foot and 10-foot lanes, in order to create or expand bicycle facilities.

Action 2.2: Configure roadways where bicycling and pedestrian barriers are removed, such as highways, with over-crossings to reduce out-of-way travel.

Goal 2: Safety

IMPROVE SAFETY, REDUCE COLLISIONS, AND CREATE COMFORTABLE CORRIDORS FOR WALKING AND BIKING IN RIVERSIDE.

Objective 1: Continue to improve pedestrian mobility and identify locations within the existing network to facilitate pedestrian travel.

Action 1.1: Install best-practice intersection treatments, such as crosswalks and crossings, corner radii, and traffic signals to reduce automobile-pedestrian conflicts.

Action 1.2: Where public right-of-way is available, install sidewalks on retrofitted or repaved roads where sidewalks did not exist.



Photo Caption: Residents walking from Mt. Rubidoux along Glenwood Dr.

Action 1.3: Update the City's toolkit of available traffic calming measures to reflect best practices annually.

Objective 2: Continue to identify intersections for improvements that facilitate pedestrian travel and meet Americans with Disabilities Act (ADA) requirements.

Action 2.1: Implement best practice facilities, including flashing beacons, bulb-outs, pedestrian-scale DarkSky Friendly lighting, and protected intersections, at high collision intersection within the City.

Action 2.2: Update annually the City's tool kit of available traffic calming measures to reflect best practices.

Goal 3: Socially Responsible

PROMOTE SOCIALLY RESPONSIBLE AND EQUITABLE INVESTMENT BETWEEN ALL SEVEN WARDS IN RIVERSIDE WHILE FOCUSING ON DISADVANTAGED COMMUNITIES.

Objective 1: Implement pedestrian friendly designs and facilities.

Action 1.1: Utilize Riverside CSO to provide pedestrian facilities such as street trees, benches, waste receptacles, and landscaping in the furniture zone where development occurs.

Action 1.2: Develop a strategy with Riverside Transit Authority (RTA) to provide more pedestrian amenities such as benches and covered waiting areas at transit stops with real-time transit information.

Objective 2: Address barriers so that vulnerable populations can take part in the improvements.

Action 2.1: Seek opportunities for acquisition of pedestrian and cyclist safety equipment (helmets, lights, bells etc.) for distribution at community and school events and presentations.

Action 2.2: Provide free basic bicycle maintenance training and bicycle tool lending at libraries to empower residents to fix bicycle issues for minimal cost.

Action 2.3: Provide bike parking, fix-it stations, and hydration stations at community destinations such as: transit centers, community centers, and parks.

Action 2.4: Utilizing the data methodology in the AT Plan, prioritize active transportation projects in disadvantaged communities and low-income neighborhoods to ensure that they consist of at least 20% of total projects by 2040.

Objective 3: Promote education, encouragement, and outreach to further support safety.

Action 3.1: Continue to develop effective safety programs for youths, adults, and seniors that educate pedestrians and drivers of their rights and responsibilities.

Action 3.2: Continue to promote the City's 311 services to encourage residents to report sidewalk and road hazards within the City.

Goal 4: Health

PROMOTE CITYWIDE AND REGIONAL TRANSPORTATION GOALS THROUGH INVESTMENTS IN ACTIVE TRANSPORTATION THAT CREATE A CULTURE OF WALKING AND BIKING.

Objective 1: Leverage community resources to increase interest in bicycling and raise the bicycling mode share.

Action 1.1: Continue to support and participate in Bike to Work, National Bicycle Safety Month and other bike promotion events.

Action 1.2: Integrate bicycling encouragement programs into existing municipal programs and events where possible.

Action 1.3: Encourage businesses to apply for Bicycle Friendly Business status with the League of American Bicyclists.

Action 1.4: Apply for and achieve League of American Bicyclists Bicycle Friendly Community Silver status after implementation of priority projects and programs recommended in this plan.

Action 1.5: Coordinate implementation of the AT Plan with implementation and creation of a Safe Routes to School (SRTS) Plan so that children are encouraged to bike and walk to school.

Objective 2: Promote an active lifestyle that includes biking and walking.

Action 2.1: Fund programs that incorporate biking and walking into curriculum at district schools. Apply for an Office of Traffic Safety grant or other funding or resources for educational activities.

Action 2.2: Provide more opportunities for outdoor recreation via parks, "recreation-friendly streets," and joint-use agreements with school facilities.

Action 2.3: Maintain and update the City's bicycle map annually for public use.

Action 2.4: Establish a bicycle-friendly business program to encourage biking and walking by employees and customers.



Photo Caption: Residents waiting for the bus along University Ave.

Goal 5: Accessible

ENHANCE ACCESS TO COMMUNITY DESTINATIONS (PARKS, SCHOOLS, WORK, LIBRARIES, SHOPPING AREAS, SENIOR CENTERS AND COMMUNITY CENTERS) AND TRANSIT.

Objective 1: Increase access to jobs, retail, parks, libraries, schools, recreational centers, transit, and other neighborhood destinations.



Photo Caption: RTA bus stop at the Galleria at Tyler Mall.

Action 1.1: Implement the recommended active transportation network to safely and comfortably connect residential neighborhoods with destinations like employment centers, grocery stores, community centers, schools, bus stops, and shopping areas.

Action 1.2: Increase bicycle parking at neighborhood destinations such as schools, medical centers, grocery stores, and government offices utilizing City and County General funds as well as Developer Impact Fees.

Action 1.3: Evaluate impacted streets during pavement resurfacing to determine if pedestrian or bicycle facilities can be provided (e.g. bike lanes, wider curb lanes or shoulders) on an ongoing basis.

Action 1.4: Follow CSO guidance for pedestrain/bike provision when developing priority lists for overlay and construction projects, maintenance, and traffic control plans.

Action 1.5: Install wayfinding signage at identified locations to help guide bicyclists and pedestrians to key City amenities.

Action 1.6: Allocate benches, shade, Dark Sky Friendly lighting, and hydration amenities in areas with high volumes of people walking and biking.

Goal 6: Environmental Stewardship

REDUCE VEHICLE MILES TRAVELED (VMT) BY DEVELOPING AN ACTIVE TRANSPORTATION NETWORK THAT IS A VIABLE ALTERNATIVE TO VEHICLE TRAVEL.

Objective 1: Reduce air pollution, asthma rates, and greenhouse gas emissions.

Action 1.1: Build an active transportation network that encourages residents to choose modes of transportation other than driving by providing safe and accessible bikeways, robust pedestrian networks, and first/last mile access to transit.

Action 1.2: Achieve a 5% reduction in vehicle miles traveled annually as residents, workers, and visitors meet daily transportation needs, and using transit in lieu of driving by building 10 miles of bike facilities.

Action1.3: Require future land use plans to comply with the goals and recommendations identified in the Active Transportation Plan.

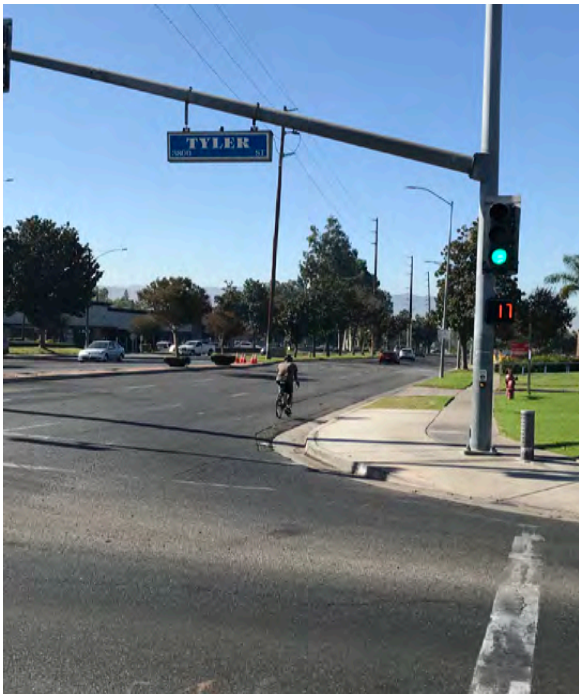


Photo Caption: Bicyclist riding along Magnolia Ave with no bike lane.

Section 4.4:
Facility Typologies



Types of Pedestrian Facilities

THERE ARE MANY FEATURES THAT CONTRIBUTE TO A CONVENIENT AND COMFORTABLE WALKING ENVIRONMENT. SIGNIFICANT INVESTMENTS AND COMMITMENTS TO FUTURE IMPROVEMENTS HAVE BEEN MADE THAT CONTINUE TO ENHANCE THE PEDESTRIAN EXPERIENCE IN RIVERSIDE.

Pedestrian support facilities improve the comfort of the walking environment.

SIDEWALKS & PATHS

Sidewalks form the backbone of pedestrian transportation networks. Most streets in the community have sidewalks or pathways on at least one side of the street. Some parts of the City do not have a continuous network of sidewalks, particularly in segments of Wards 6 and 7. These include low-density developments or areas previously built out while under County jurisdiction and subsequently annexed into the City.



Photo Caption: Typical sidewalk condition along Indiana Ave.

CROSSING FACILITIES

Crosswalks serve as an extension of the sidewalk and provide guidance for pedestrians who are crossing roadways by defining their path of travel. Crossings at intersections are not required to be marked, however, marked crosswalks are installed to channelize pedestrians and may help to enhance driver awareness of potential pedestrian activity and motorist yield compliance. Markings can be standard parallel lines or the "continental" high visibility pattern, which enhances visibility of the crossing and is considered best practice.



Photo Caption: Marked crosswalk across Van Buren Blvd.

CURB TREATMENTS

Curb ramps assist people with making the transition from the street to the sidewalk or vice versa. A sidewalk without a curb ramp is an accessibility barrier to someone in a wheelchair or pushing a stroller, forcing them back to a driveway and out into the street for access. Many of the City's older roadways have curb ramps; however, most feature the "diagonal" approach as opposed to the recommended "perpendicular" approach of placing curb ramps in both directions of travel.

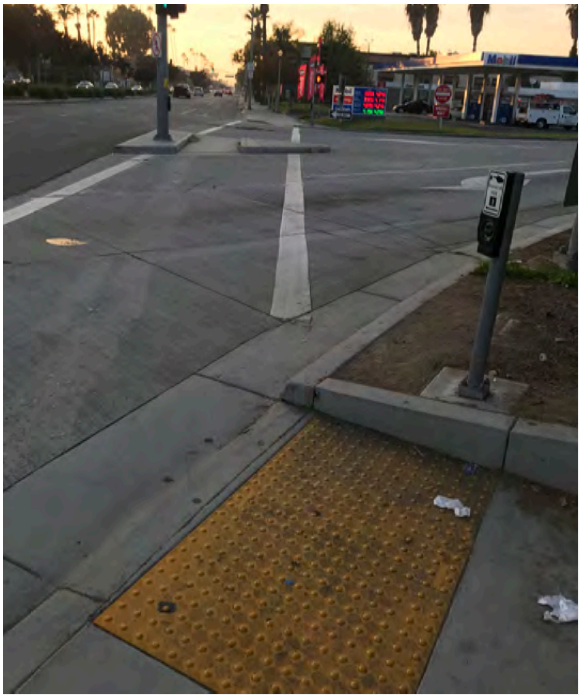


Photo Caption: Curb ramp with ADA truncated domes along University Ave.

BEACONS & SIGNALS

Pedestrian hybrid beacons sometimes known as a HAWK signal, are used to enforce motorists yielding to pedestrians at uncontrolled crosswalk locations. The beacon, when activated by a person wishing to cross, flashes yellow before displaying a solid red signal to motorists, requiring them to stop. The WALK symbol is then displayed signifying that the pedestrian may begin to cross the road. When the WALK phase is complete the beacon flashes yellow before returning to a dark inactive state. Riverside has installed HAWK signals at a number of high pedestrian activity uncontrolled crossings including at the corner of Market Street and 6th Street.



Photo Caption: HAWK signal and crossing along Brockton Ave.

Rectangular Rapid Flashing Beacons or RRFBs increase visibility of uncontrolled or mid block crosswalks with bright LED lights activated by a pedestrian push button.

PEDESTRIAN SUPPORT FACILITIES

Pedestrian support facilities improve the comfort of the walking environment. Examples include pedestrian-scale lighting on sidewalks and paths, bus stop amenities (e.g., shade structures and benches), enclosure and landscaping (e.g., trees and planters), trash receptacles, and others. People are less likely to walk to destinations or use public transit without amenities that could provide needed comfort to the walking experience.



Photo Caption: Pedestrian walking environment along Magnolia Ave.

The quality of pedestrian facilities across the City varies greatly. Most of the City is equipped with sidewalks or side paths adjacent to streets, though there are some exceptions. The Public Works Department has compiled a list of missing sidewalks throughout the City and identified significant gaps in the "West End" and other gaps along Central Avenue and Washington Street. Existing sidewalk facilities in Wards 1, 2, and 4 are largely better quality in terms of connectivity than those in Wards 3, 6, and 7 which have tend to have a greater number of missing or disconnected sidewalks.



Photo Caption: Missing sidewalks along Bushnell Ave.



Photo Caption: Missing sidewalks along Washington St.

TRAFFIC CALMING

Traffic calming measures such as traffic circles, curb extensions, chicanes, speed feedback signs encourage drivers to travel at a speed appropriate for the surrounding land uses and users. At various intersections and mid block locations, curb extensions would increase the visibility of pedestrians, shorten crossing distances, and reduce vehicle speeds. Further, at select major intersections in areas with high volumes of foot traffic, traffic circles may be considered to give people crossing the street priority and to reduce conflicts with turning vehicles.



Photo Caption: Curb extension located in Santa Monica, CA.

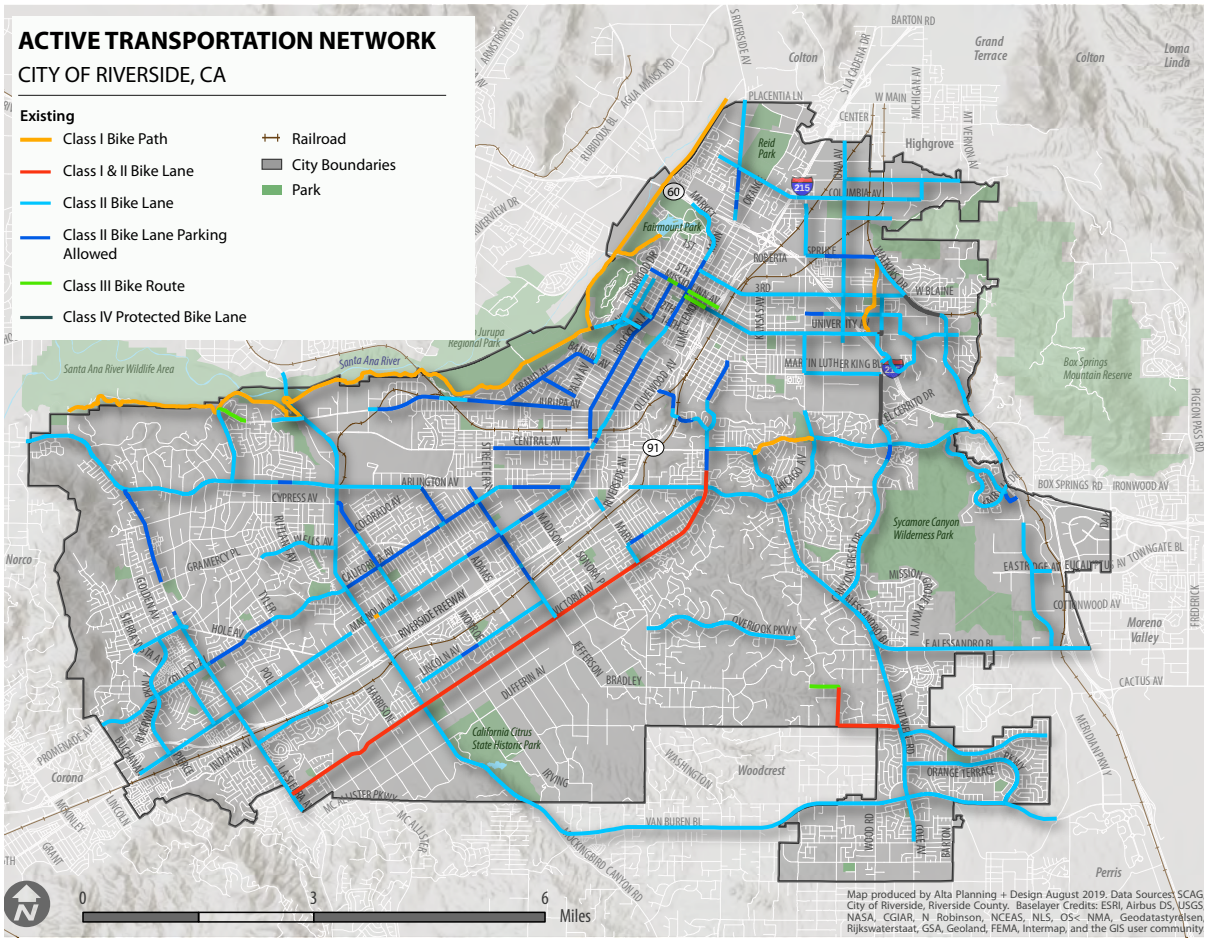


Photo Caption: Chicanes located on residential roadway in Seattle, WA.

Types of Bicycle Facilities

AS OF 2020, THE CALIFORNIA DEPARTMENT OF TRANSPORTATION (CALTRANS) DESIGNATES FOUR CLASSES OF BICYCLE FACILITIES: CLASS I SHARED USE PATHS, CLASS II BICYCLE LANES, CLASS III BICYCLE ROUTES, AND CLASS IV SEPARATED BIKEWAYS. THE CITY'S CURRENT BICYCLE NETWORK HAS APPROXIMATELY 156 MILES OF BIKEWAYS, AS SHOWN IN FIGURE 4-3. DESCRIPTIONS OF EACH BIKEWAY CLASSIFICATION ARE INCLUDED IN THE FOLLOWING SECTION.

FIGURE 4-3 EXISTING BIKEWAYS MAP



CLASS I SHARED USE PATHS

Class I shared use paths are paved trails completely separated from the street. They allow two-way travel by people bicycling and walking and are often considered the most comfortable facilities for children and inexperienced riders as there are few potential conflicts between cyclists and motorists.

There are currently over 14 miles of Class I shared use paths in Riverside.

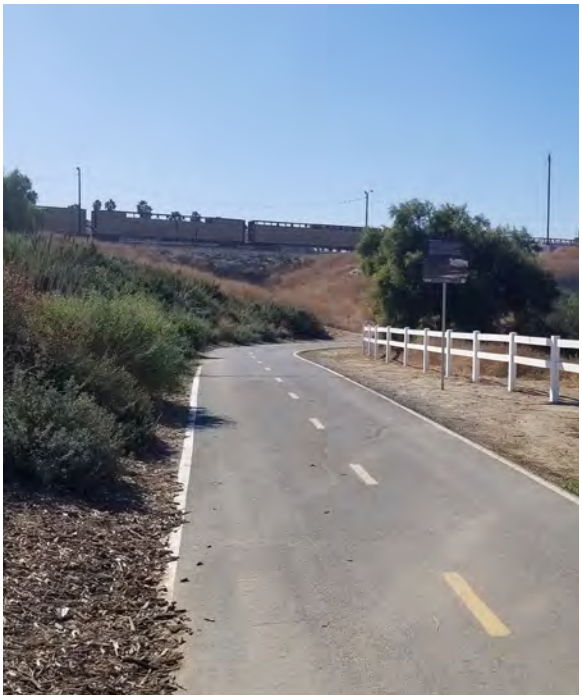


Photo Caption: Santa Ana River Trail

CLASS II BICYCLE LANES

Class II bicycle lanes are striped preferential lanes on the roadway for one-way bicycle travel. Some bicycle lanes include a striped buffer on one or both sides to increase separation from the traffic lane or from parked cars where people may open doors into the bicycle lane (buffered bicycle lanes are referred to in this Plan as “Class IIB”).

There are currently 122 miles of Class II bicycle lanes and approximately 7 miles of buffered bicycle lanes in Riverside.



Photo Caption: Class II Bicycle Lane located on Market St.

CLASS III BICYCLE ROUTES

Class III bicycle routes are signed routes where people bicycling share a travel lane with people driving. Because they are shared facilities, bicycle routes are primarily used on select low-speed streets. Some Class III bicycle routes include shared lane markings or "sharrows" that recommend proper bicycle positioning in the center of the travel lane and alert drivers that bicyclists may be present.

There are currently over 2 miles of Class III bicycle routes in the City.



Photo Caption: Class III Bicycle Route on Mission Inn Ave

CLASS III BICYCLE BOULEVARD

Other bicycle routes include more robust traffic calming features to promote bicyclist comfort and are known as "bicycle boulevards" (referred to in this Plan as "Class IIIB"). The Riverside Fire Department will be included in discussions about new or altered features on bicycle boulevards to ensure that access for emergency responders is maintained.

There are currently no Class III bicycle boulevards in the City.



Photo Caption: Class III Bicycle Boulevard with green Shared Lane Markings in Vancouver, BC.



Photo Caption: Class IV Separated Bikeway along Canyon Crest Dr.



Photo Caption: Class IV Separated Bikeway in Seattle, WA.

CLASS IV SEPARATED BIKEWAYS

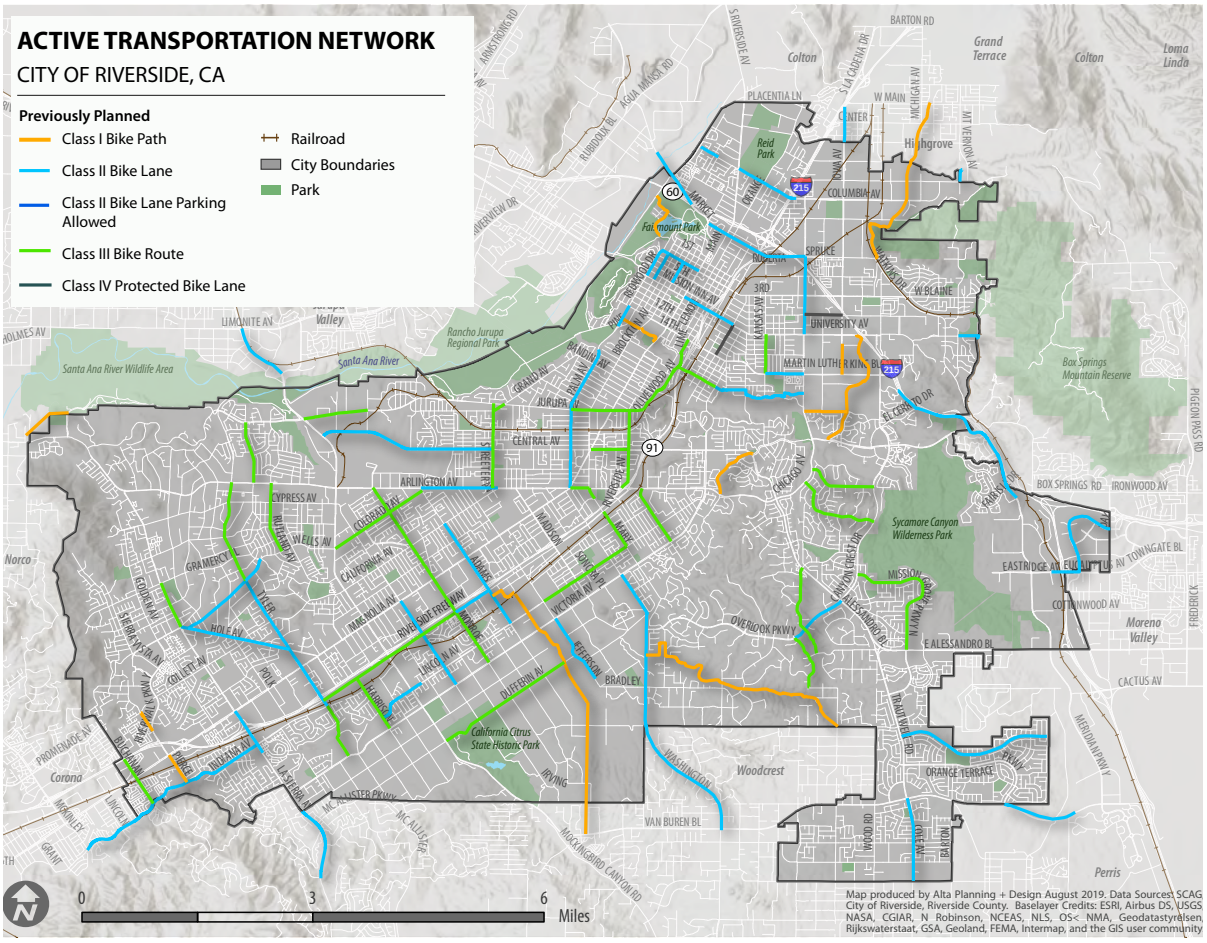
Class IV separated bikeways are on-street bicycle facilities that are physically separated from motor vehicle traffic by a vertical element or barrier, such as a curb, bollards, or vehicle parking aisle. They can allow for one- or two-way travel on one or both sides of the roadway.

Currently just over one mile of Class IV separated bikeway exists in Riverside.

PREVIOUSLY PLANNED FACILITIES

While Riverside's existing bikeway network covers over 150 miles, previous planning efforts have offered visions for a more comprehensive and connected network spanning more than an additional 105 total miles. Figure 4-4 shows the locations and types of bicycle facilities that have been recommended as part of the 2012 Bicycle Master Plan Addendum. This Plan builds on those recommendations and provides an updated vision of Riverside's active transportation network.

FIGURE 4-4 PREVIOUSLY PLANNED BIKEWAYS MAP



Section 4.5:
Needs Assessment


NO OUTLET
NO PARKING ENTIRE BLOCK
NO ACCESS MOUNT RUBIDOUX
4625 & 4638 Glenwood Dr.
Residents Only
No Entry
No Trail Access Beyond this Point

Active Transportation Needs Assessment

THE ACTIVE TRANSPORTATION NEEDS ANALYZED IN THIS SECTION FOCUS ON FOUR MAJOR COMPONENTS:

- **HEALTH + EQUITY**
- **CONNECTIVITY**
- **SAFETY**
- **PUBLIC INPUT**

Riverside currently has several high CalEnviroScreen scores throughout each of the seven wards as well as areas of extremely low household income levels within each ward.

HEALTH + EQUITY

The allocation of public resources for transportation infrastructure projects is important for all communities to provide safe, efficient and accessible modes of travel. In disadvantaged communities which may rely more heavily on walking, cycling, and public transportation, equitable allocation of resources is critical. Within Riverside, prioritizing walking and biking within disadvantaged communities acknowledges that active transportation options provide economic, social, and health benefits.



Photo Caption: City employees walking along the Main St Pedestrian Mall in front of City Hall

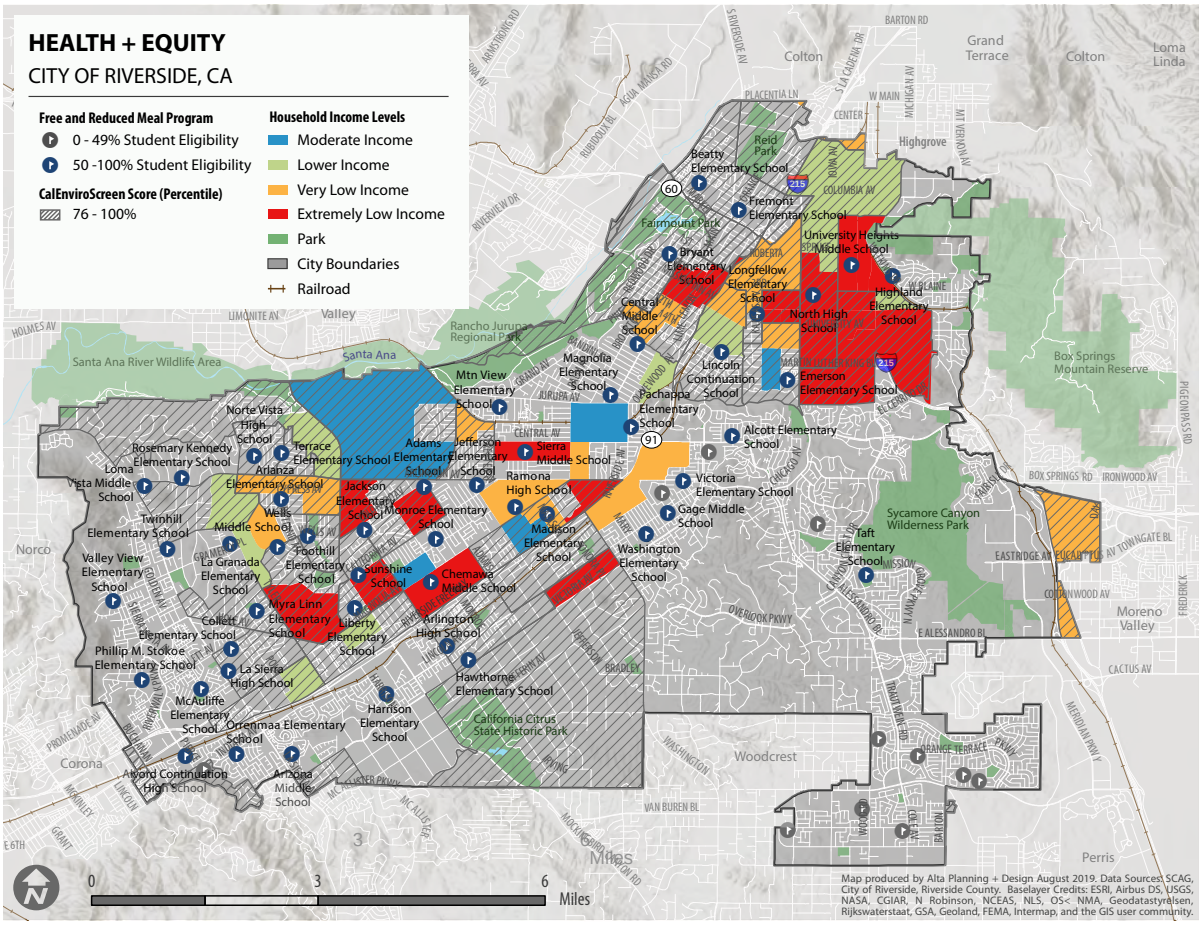
This analysis uses the California Communities Environmental Health Screening Tool (CalEnviroScreen) to identify California communities by census tract that are disproportionately burdened by, and vulnerable to, multiple sources of pollution. Communities that are most affected by many sources of pollution and that are often especially vulnerable to pollution's effects have a higher score (76%-100%) than communities that are less vulnerable.

This analysis also uses the Department of Housing and Community Development (HUD) criteria for Area Median Income limits by block group using moderate, lower, very low, and extremely low-income thresholds.

Lastly this analysis includes data on schools where students (over 50%) are eligible for Free and Reduced-Price Meals as well as schools that are currently participating in the meal program.

As shown in Figure 4-5, Riverside currently has several high CalEnviroScreen scores throughout each of the seven wards as well as areas of extremely low household income limits in all seven wards.

FIGURE 4-5 HEALTH AND EQUITY MAP

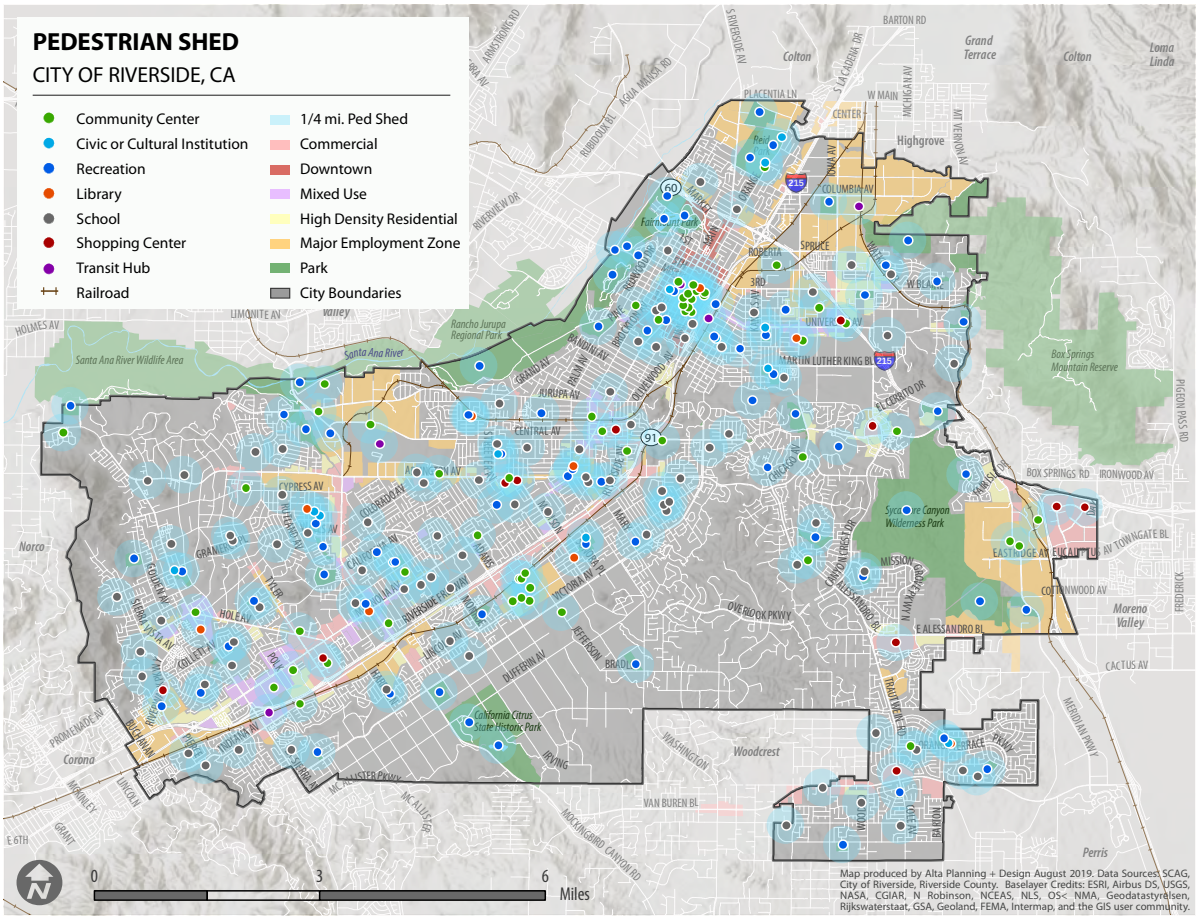


A key strategy to creating a pedestrian and bicycle-friendly environment is designing streets that are safe and comfortable for people to use.

CONNECTIVITY

Creating a connected and comfortable active transportation network helps people reach their walking destinations most efficiently and safely. This data set analyzed how to improve residents' walking and biking access to key neighborhood-serving destinations including schools, libraries, community centers, retail, public parks and transit connections.

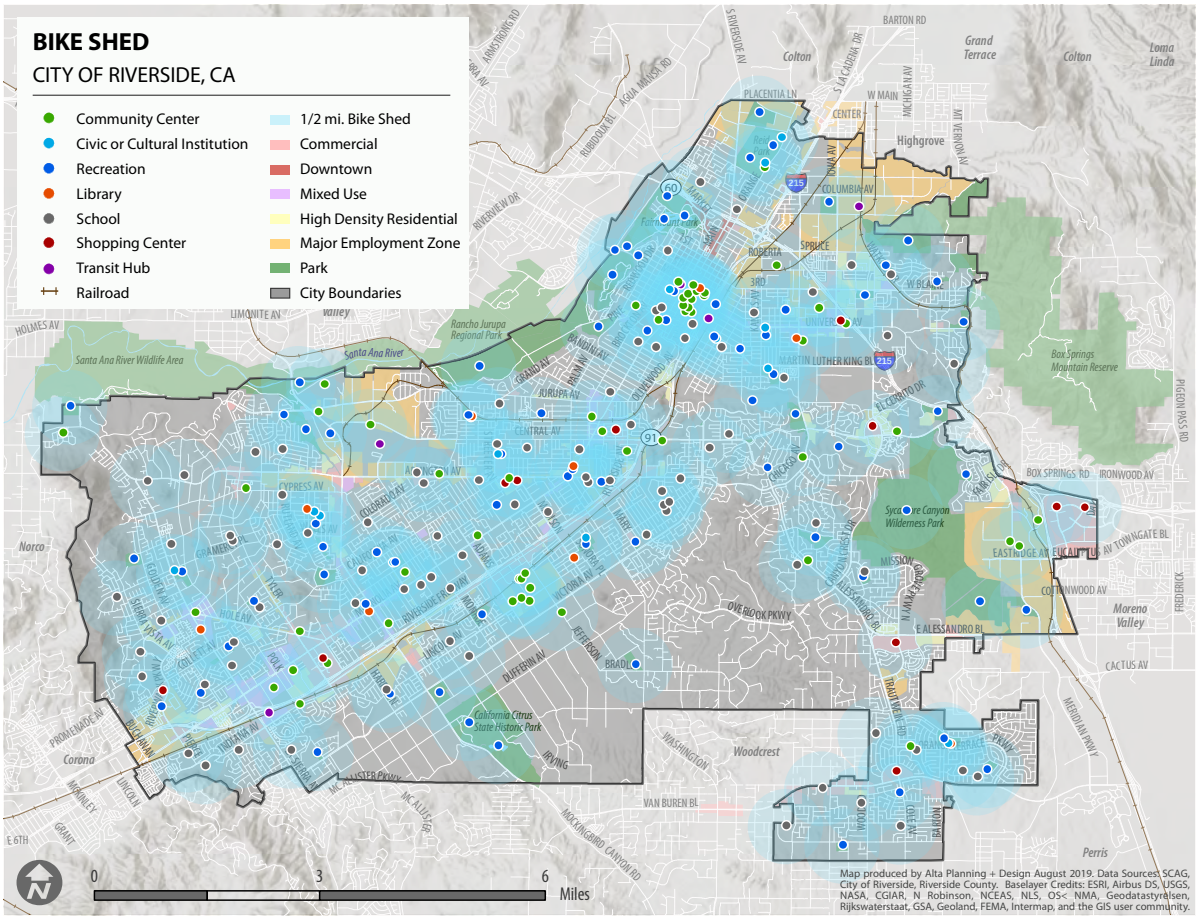
FIGURE 4-6 WALK SHED



A pedestrian shed of a quarter mile (.25 mi) was developed by determining the distance that could be covered by someone walking for five minutes at a typical pace, and a bike shed of a half mile (.5mi) was developed by determining the distance that could be covered by someone biking for 10 minutes at typical pace, displayed by drawing a half-mile circle around a destination. A five-minute walk and a ten-minute bike ride are considered to be a reasonable trip to reach a destination or to connect with other modes.

Figure 6 identifies the walk sheds for several community destinations and Figure 4-7 identifies the bicycle sheds for the same community destinations.

FIGURE 4-7 BICYCLE RIDE SHED



SAFETY

A key strategy to creating a pedestrian and bicycle-friendly environment is designing streets that are safe and comfortable for people to use.

Historical bicycle and pedestrian collision data was collected from the Riverside Police Department between 2015 - 2019 and locations with more than one bike or pedestrian involved during that time frame were evaluated.

There were 101 intersections where two or more pedestrian collisions have occurred. More than 30 intersections identified had at least three pedestrian collisions. The three intersections with the highest number of collisions are Tyler St/Magnolia Ave, University Ave/Iowa Ave, and Blaine St and Iowa Ave each having had at least ten pedestrian collisions. Van Buren Blvd, La Sierra Ave, and University Ave are other streets with a high number of recorded pedestrian involved collisions. The top 40 intersections can be found in Appendix A.

There were 66 intersections where two or more bike collisions have occurred. More than 20 intersections identified had at least three bike collisions. The two intersections with the highest number of collisions are Arlington Ave/Van Buren Blvd and Van Buren Blvd/Magnolia Ave each having had five bike collisions. Main St, La Sierra Ave, and Arlington Ave are other streets with a high number of recorded bicycle involved collisions. The top 40 intersections can be found in Appendix B.



Photo Caption: Intersection of Tyler St and Magnolia Ave



Photo Caption: Intersection of La Sierra Ave and Hole Ave

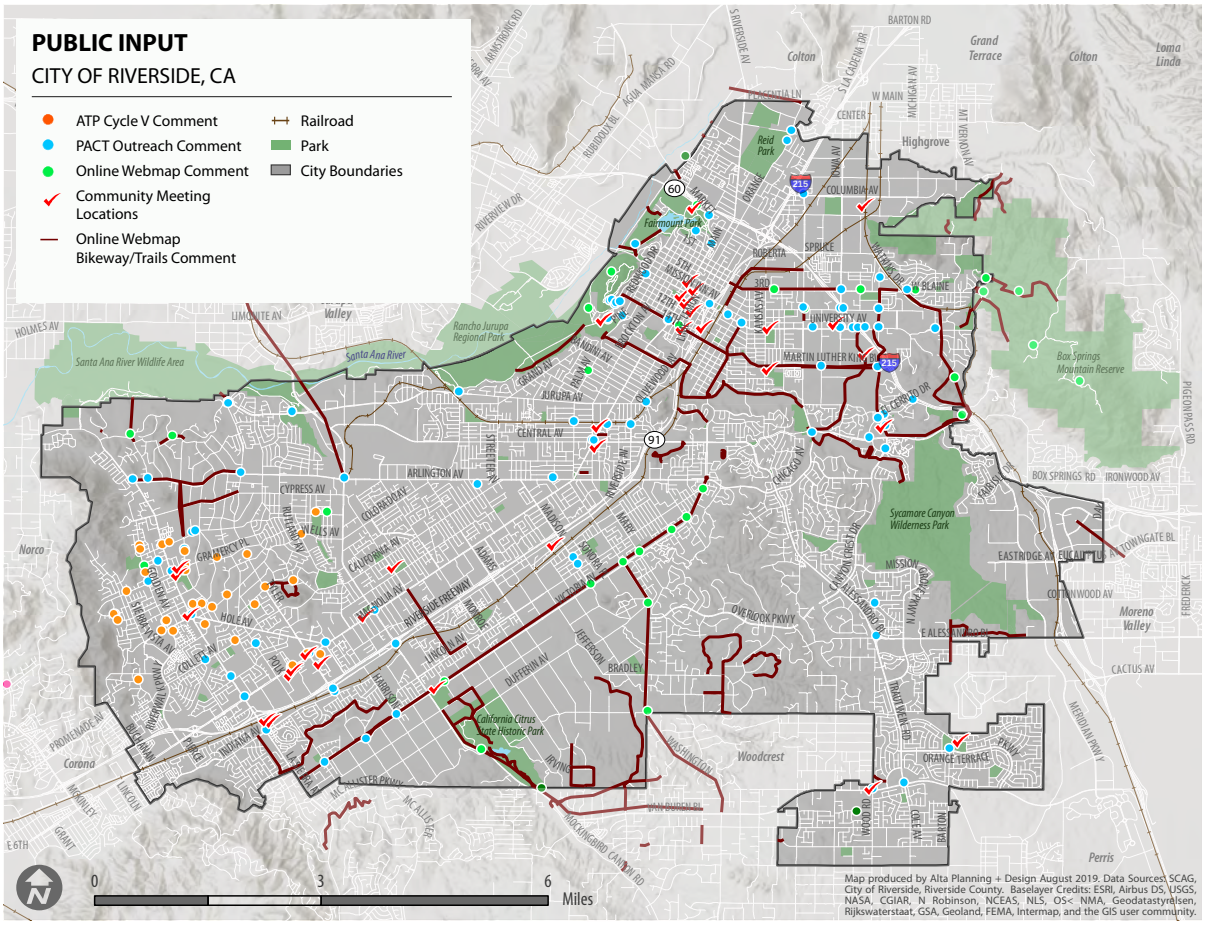
PUBLIC INPUT

Riverside residents and visitors helped identify barriers to walking in their neighborhoods through survey results, Online mapping, walk audit comments, public meetings, and outreach events. See Community Engagement of the PACT for all community engagement that was conducted.

Residents identified walking and biking issues which included missing sidewalks, missing/challenging intersection crossings, parking in bike lanes, and lack of lighting.

Figure 4-8 highlights the areas where barriers for biking and walking were identified as well as the locations of each of the community meetings/events that were attended.

FIGURE 4-8 PUBLIC INPUT MAP



BICYCLE LEVEL OF TRAFFIC STRESS

For cyclists, the Level of Traffic Stress (LTS) is the perceived sense of discomfort associated with riding in or next to high speed vehicular traffic. Studies have shown that traffic stress is one of the greatest deterrents to bicycling. The less stressful and therefore more comfortable a bicycle facility is, the wider its appeal to a broader segment of the population. A bicycle network will attract a large portion of the population if it is designed to reduce stress associated with potential motor vehicle conflicts and if it connects people bicycling with where they want to go.

Bikeways are considered low stress if they are on low volume roadways with slow speeds (e.g., a shared, low-traffic neighborhood street) or if greater degrees of physical separation are placed between the bikeway and traffic lane on roadways with higher traffic volumes and speeds (e.g., a separated bikeway on a major street).

A rating given to a road segment or crossing, the LTS indicates the amount of traffic stress use of a particular facility imposes on bicyclists. The analysis, based on methods developed by the Mineta Transportation Institute, considers posted speed, number of travel lanes, presence of a bicycle facility and land use context to calculate a bicyclist's comfort level.

The combination of these criteria creates four levels of traffic stress for the existing roadway network. However, this Plan introduced a fifth level (LTS 1.5) to differentiate between streets without specific bike improvements which nevertheless remain low-speed and low-stress for most people on bikes, versus streets with specific improvements and facilities to create a low-stress experience for riders (LTS 1). The principle of the scale remains the same: the lower the number, the lower the stress and the higher the level of comfort for people on bicycles. LTS 1 and 2 roads are typically the roadways that appeal to the "Interested, but Concerned" cyclists. For this analysis, levels of traffic stress range from 1 to 4:

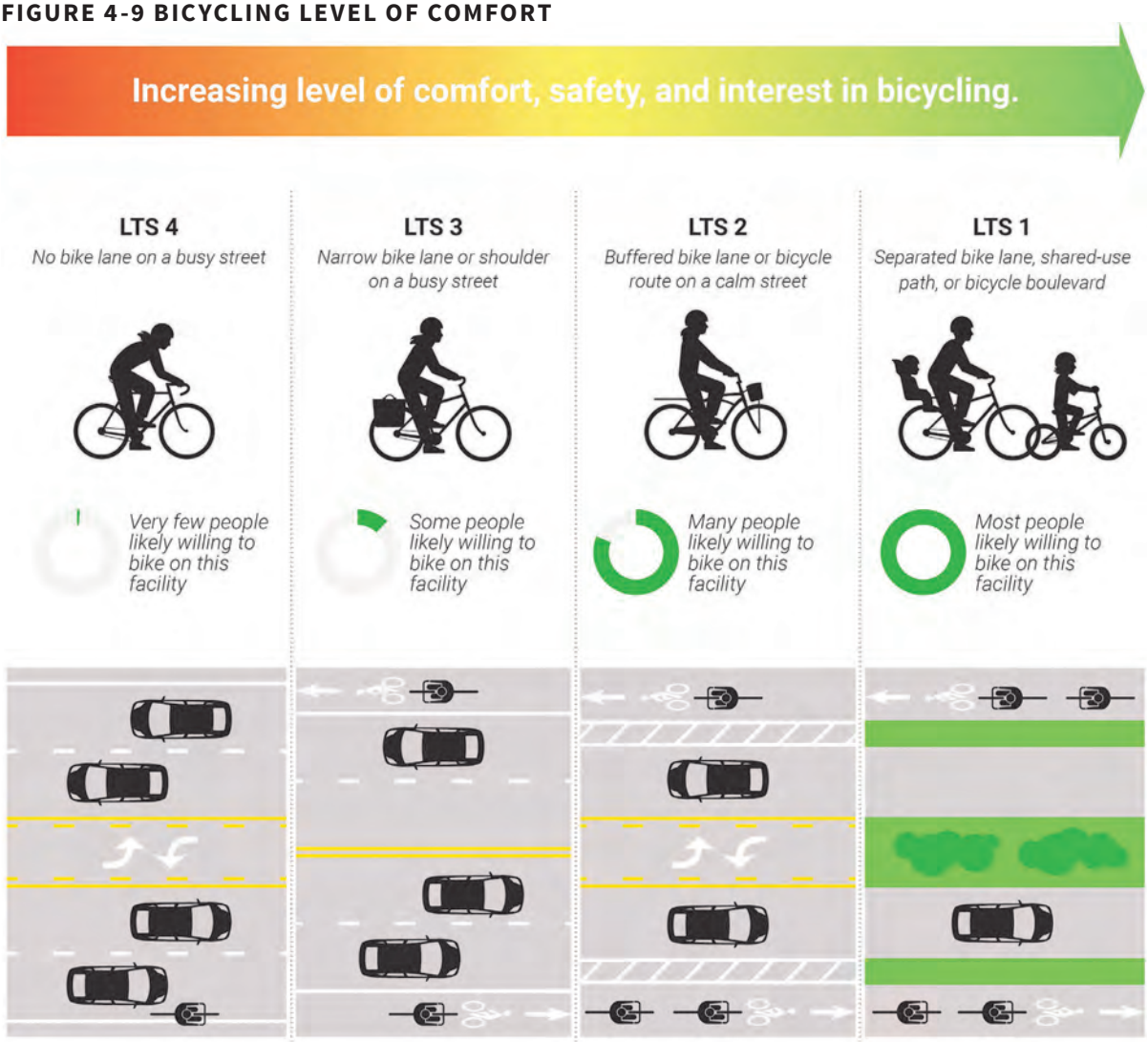
- **LTS 1**: Most Comfortable: Strong separation from traffic and improvements for people on bikes. Simple crossings. Suitable for children.
- **LTS 1.5**: Streets with low speeds and low traffic volumes, but does not feature a bicycle facility.
- **LTS 2**: Physical separation from higher speed and multi-lane traffic. A level of traffic stress that most adults can tolerate, particularly those sometimes classified as "interested but concerned."

- **LTS 3**: Involves interaction with moderate speed or multi-lane traffic, or close proximity to higher speed traffic. A level of traffic stress acceptable to those classified as "enthused and confident."
- **LTS 4**: Least Comfortable: Involves interaction with higher speed traffic or close proximity to high speed traffic. A level of stress acceptable only to those classified as "strong and fearless."

BICYCLING COMFORT LEVELS

Research indicates that the majority of people in the United States would bicycle if dedicated bicycle facilities were provided. However, only a small percentage of Americans (1-3 percent) are willing to ride if no facilities are provided. This research into how people perceive bicycling as a transportation choice has indicated that most people fall into one of four categories, illustrated in Figure 4-9.

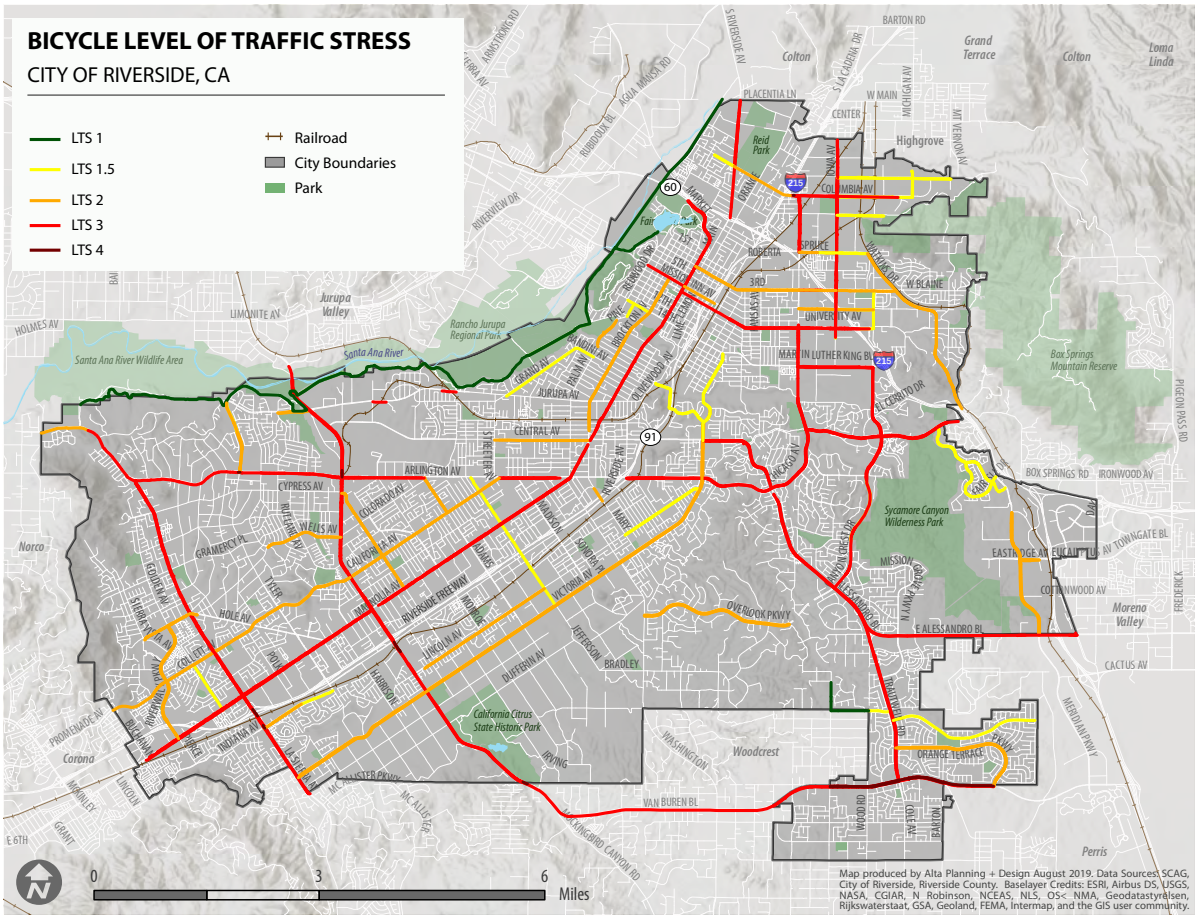
FIGURE 4-9 BICYCLING LEVEL OF COMFORT



For Riverside neighborhood streets that carry relatively little vehicular traffic and have slower vehicle speeds are considered LTS 1 and are considered suitable for people of all ages and abilities. Class I facilities, like the Santa Ana River Trail, are also considered LTS 1. Collector and arterial streets without separated bicycle facilities, such as Indiana Ave, are considered LTS 3 or 4, and are only suitable for somewhat confident or highly confident adult riders.

Figure 4-10 illustrates the Bicycle Level of Traffic Stress analysis for the City of Riverside.

FIGURE 4-10 BICYCLE LEVEL OF TRAFFIC STRESS



ACTIVE TRANSPORTATION NETWORK PLANNING PROCESS

Developing the pedestrian and bicycle network recommendations was a multi-step approach emphasizing collaboration with stakeholders and community members. A combination of the existing conditions analysis, previously adopted plans, studies, community feedback, and active transportation best practices informed these recommendations, as shown in Figure 4-11.

Key themes from the public input guided our overall recommendations seen in Table 4-2. Throughout the development of the plan, Various outlets allowed the public to voice their opinions about new or improved bicycle and pedestrian facilities. These outlets included: Walk Audit, the Online public input map, and the Virtual Workshop. Roadways and areas that were mentioned multiple times across different outreach methods were examined as high priority for inclusion in the recommended projects.

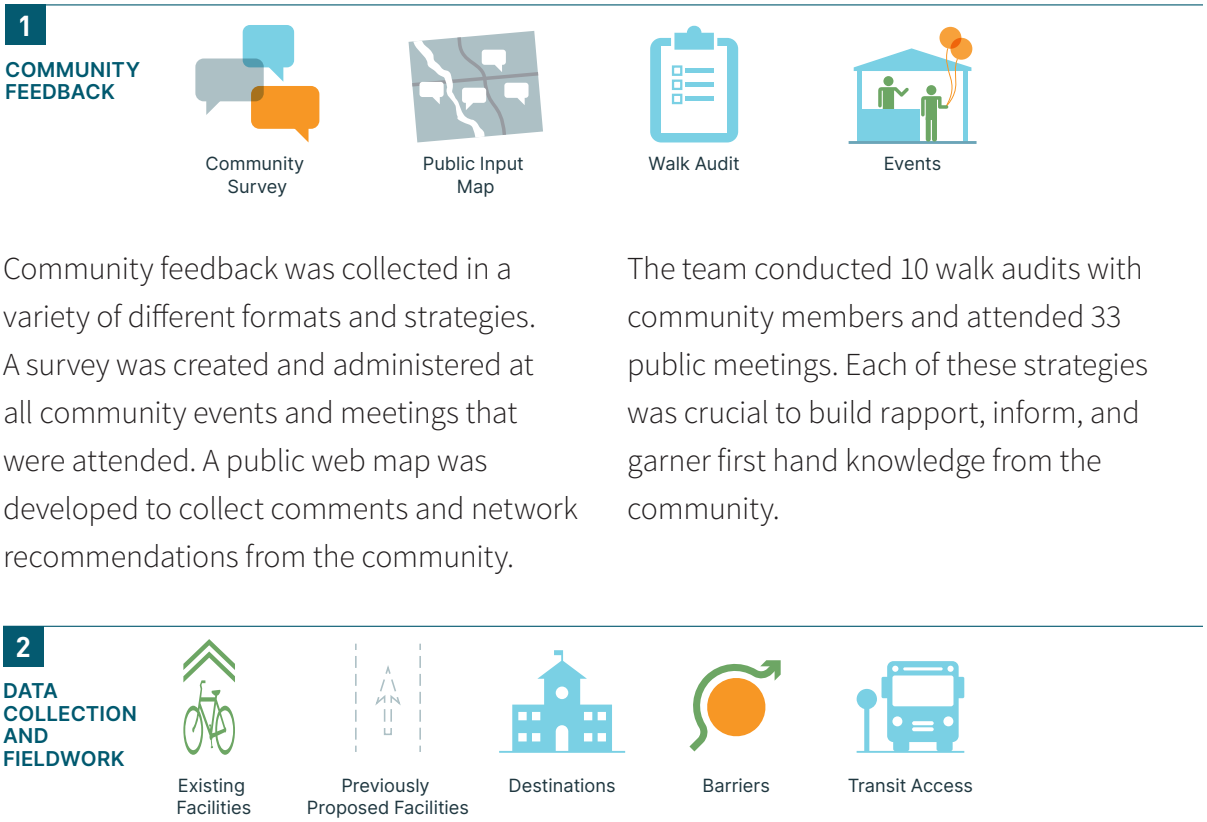


Photo Caption: Walk audit conducted with residents near Mt. Rubidoux Park.



Photo Caption: UC Riverside students walking to and from campus.

FIGURE 4-11 NETWORK DEVELOPMENT PROCESS



Community feedback was collected in a variety of different formats and strategies. A survey was created and administered at all community events and meetings that were attended. A public web map was developed to collect comments and network recommendations from the community.

The team conducted 10 walk audits with community members and attended 33 public meetings. Each of these strategies was crucial to build rapport, inform, and garner first hand knowledge from the community.

Data collection and fieldwork were key factors in reviewing the existing conditions. Existing bicycle facilities data was reviewed and an on the ground inventory was conducted to verify data during several site visits. Previously proposed bike facilities were reviewed for feasibility and other existing conditions data including community destinations, barriers to travel, and transit stops were identified.

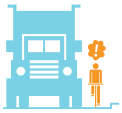
The needs analysis for Riverside included examining several data factors. The City's equitable target areas were reviewed including areas designated as disadvantaged and low income. High vehicle pedestrian and bike collision roadways were reviewed. A live work play analysis was conducted to highlight the areas of activity within the City. All of these factors helped identify roadways in the City that require improvements.

4

SUPPLY ANALYSIS



Roadway Connectivity Gaps



Level of Traffic Stress Analysis



Land Use & New Development



Capital Projects

The supply analysis included reviewing: missing connections in the existing active transportation network, the level of traffic stress a bicyclist feels while riding on Riverside roadways, trip generator land uses as well as new development projects, and any future capital improvement projects. These factors highlighted significant areas to consider when developing recommendations for the active transportation network.

5

SYSTEM DEVELOPMENT



Prioritize Access



Revise Previously Proposed



Prioritize Gaps



Connect Existing Facilities



Identify Parallel Routes



Address Barriers

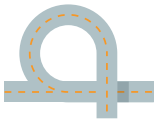
The development of the network recommendations involved a systematic multi-step approach. The first prioritizing element was improving access for neighborhoods and wards. The previously planned facilities were then reviewed for viability. Gaps in the active transportation network were then identified and connecting new facilities to existing facilities was a key strategy during the process. Creating routes that overcome identified barriers was another priority when developing the network recommendations.

6

DESIGN DEVELOPMENT



User Needs



Built Form

- Speed Limit
- Traffic Volume
- Curb Cuts
- Functional Class
- Truck Traffic
- Number Of Travel Lanes

Roadway Characteristics

Once the recommendations were developed, the physical design of each of the recommendations was reviewed. It is crucial that the proposed recommendations fit the existing right-of way as well as roadway characteristics including traffic volume, number of lanes, and speed limit which are taken into consideration during design.

7

FEASIBILITY



Political Will



Funding



Health & Equity Impact



Feasibility

Each recommendation is then reviewed and analyzed regarding how and through which means it will be constructed. The proposed projects must not only add value to the community by addressing community needs but also be viable and deliverable from a funding perspective. The combination of funding opportunities and impact to the community contribute to the feasibility of each recommended project.

8

PROPOSED PLAN



Short Term



Medium Term



Long Term

The recommendations that are proposed within the plan will not be built or funded all at one time thus developing a strategy for phasing projects becomes important. A three-phase approach will be utilized to categorize proposed projects, Phase 1 - Short Term (5 years), Phase 2 - Medium Term (5-10 years), Phase 3 – Long Term (10+ years). Phase 1 - Short Term projects are ones that have political will, are fundable, require less inter-agency coordination, and are lower cost such as signing and striping projects. Phase 2 - Medium Term and Phase 3 – Long Term are extrapolated from there by complexity.

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Section 4.6: Network Recommendations


UC RIVERSIDE
AMY S. HARRIS

Pedestrian Recommendations

A NUMBER OF FACTORS ARE INVOLVED IN CREATING A MORE WALKABLE CITY, SUCH AS ADDRESSING COMFORT AND SAFETY OF STREETS AND CREATING A MORE VISUALLY APPEALING ENVIRONMENT. THE EXPERIENCE OF WALKING IS MUCH DIFFERENT THAN BIKING AND MORE GRANULAR. MISSING OR POORLY MAINTAINED SIDEWALKS AS WELL AS A DIFFICULT INTERSECTION CROSSING CAN GREATLY HAMPER THE WALKING EXPERIENCE.

This section outlines a number of priority areas and intersections that will be the focus of the pedestrian improvements for the City of Riverside. The following sections present the toolbox of strategies for these priority areas and intersections as well as the methodology for intersection typology identification.

This Plan recommends improving 51 intersections for pedestrian crossing as well as creating over 25 miles of new and enhanced sidewalk. The recommendations will improve the comfort of pedestrians and may create safer conditions for pedestrians along roadways and at intersections.

PEDESTRIAN SPOT IMPROVEMENTS

Typically located at intersections, spot improvements include one or more pedestrian infrastructure enhancements that fall within the following categories:

- Crossing Improvement
- Signal Improvement
- Transit Stop Improvement
- Walking Environment Improvement
- Sidewalk Improvement
- Lighting Improvement

PEDESTRIAN CROSSING TYPOLOGIES

In addition to the 51 locations mentioned, additional intersections were identified as proposed priority projects. To ensure equity among all wards, one priority project was identified per ward. Additionally, some improvement descriptions are more expansive than others as these were direct comments from the community. The following pages describe the variety of intersection types, common challenges, strategies for improvement, and examples of identified improvements.

Improvements at intersections of arterial roadways with cars moving at faster speeds differ from improvements on lower volume, local streets. These typologies are broken down by the characteristics of the intersection and include the appropriate infrastructure improvements for each. The typologies include:

- **Typology A:** Signalized intersection
- **Typology B:** Major street/minor street
- **Typology C:** Minor street/minor street
- **Typology D:** Trail Crossings/Mid block crossings
- **Typology E:** High-volume pedestrian areas
- **Typology F:** Highway interchanges and freeway crossings

The following pedestrian recommendation locations were identified through several data sets and analyses including, health and equity, connectivity, collision, and public input data points detailed in the Active Transportation Needs Analysis section on page 4-36. The data was reviewed as a collective with no single data set taking priority over another, with the objective of yielding an equitable distribution of recommendations amongst each ward within the City.

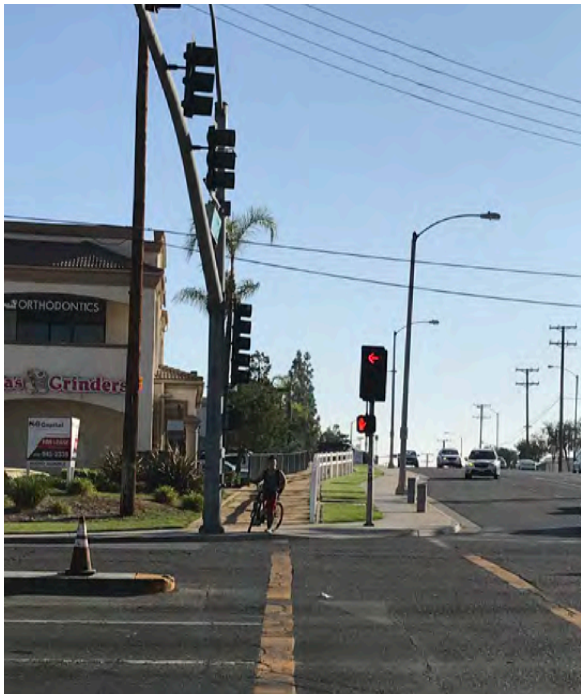


Photo Caption: Spot improvement identified at the intersection of Wood Rd and Van Buren Blvd



Photo Caption: Spot improvement identified intersection of La Sierra Ave and Indiana Ave



Photo Caption: Intersection of Brockton Ave, Magnolia Ave and Central Ave.

TYPOLOGY A. SIGNALIZED INTERSECTION

Common Challenges

- High vehicle speeds
- High vehicle volumes
- Free right-turn lanes
- Left-turn pedestrian conflicts
- Cars stop too close to the crosswalk
- Failure to yield to pedestrians

Tools

- Curb extensions
- No right on red
- Crosswalks and curb ramps
- High visibility crosswalks
- Slip lane removal
- Leading pedestrian intervals
- Conflict markings
- Signage and lighting
- Traffic circles
- Pedestrian Scramble
- Roundabout
- Flashing yellow arrows
- Advance limit lines
- Diagonal crosswalks

Identified Spot Improvements

- Blaine St and Iowa Ave
- Chicago Ave and University Ave
- Jurupa Ave and Magnolia Ave
- Iowa Ave and W Linden St
- Chicago Ave and Central Ave
- Madison St and Arlington Ave
- Central Ave and Magnolia Ave
- Wood Rd and Van Buren Blvd
- Indiana Ave and La Sierra Ave
- Van Buren Blvd and Arlington Ave
- Magnolia Ave and Van Buren Blvd
- Magnolia Ave and Tyler St



Photo Caption: Intersection of El Cerrito Blvd and Canyon Crest Dr.

TYPOLOGY B. MAJOR STREET/MINOR STREET

Common Challenges

- Failure to yield to pedestrians
- Unmarked crosswalks
- Lighting
- High vehicle speeds
- High vehicle volumes
- Long blocks without controlled crossings
- Left-turn pedestrian conflicts
- Cars stop too close to the crosswalk

Tools

- Curb extensions
- Signage and lighting
- Crosswalks and curb ramps
- Pedestrian crossing beacons at uncontrolled crossings
- Conflict markings and advance stop/yield pavement markings
- Traffic circles
- Flashing yellow arrows
- Advance limit lines
- Diagonal crosswalks

Identified Spot Improvements

- Rustin Ave and Blaine St
- 14th St and Victoria Ave
- Magnolia Ave and Elizabeth St
- Fairmount Blvd and Market St
- 14th and Olivewood Ave
- University Ave at entrance to University Village
- El Cerrito and Canyon Crest DR
- Rustin Ave and W Linden St
- La Sierra Ave and Collett Ave
- La Sierra Ave and Cochran
- Van Buren Blvd and Jackson St
- Campbell Ave and La Sierra Ave
- Grammercy Pl and La Sierra Ave
- La Sierra Ave and Minnier Ave
- Washington St and Victoria Ave



Photo Caption: Tequesquite Ave and Palm Ave

TYPOLOGY C. MINOR STREET/MINOR STREET

Common Challenges

- Failure to yield to pedestrians
- Unmarked crosswalks
- Parking too close to the corner (visibility)
- Incomplete stops (rolling stops)

Tools

- Curb extensions
- Signage and lighting
- Crosswalks and curb ramps
- Pedestrian crossing beacons at uncontrolled crossings
- Conflict markings and advance stop/yield pavement markings
- Red curb
- Flashing yellow arrows
- Advance limit lines
- Diagonal crosswalks
- LED Flashing Stop Signs
- Speed Feedback Signs

Identified Spot Improvements

- Western Ave and Arlington Ave
- W Linden St and Canyon Crest Dr
- Third St and Vine St
- Palm Ave and 14th St
- Watkins Dr and W Big Springs Rd
- Palm Ave and Dewey Ave
- Madison St and Lincoln Ave
- Collett Ave and Newby Dr
- Cass St and Polk St
- Knoefler and Ambs Dr
- Gramercy Pl and Corwin
- Marguerita St and Mary St
- Madison St and Victoria Ave



Photo Caption: Jurupa Ave and Tyler St at trail head to Santa Ana River Trail.

TYPOLOGY D. TRAIL AND MIDBLOCK CROSSINGS

Common challenges

- Uncontrolled crossings
- Vehicles have priority at unmarked crossings
- Lack of driver awareness
- Unmarked crosswalks

Tools

- Curb extensions
- Signage and lighting
- Crosswalks and curb ramps
- Pedestrian crossing beacons
- Wayfinding signs

Identified Spot Improvements

- Mt. Rubidoux Trail head and Glenwood Dr.
- Santa Ana River Trail Head - Tyler St. and Jurupa Ave.
- Reid Park Ruth H Lewis Center and Orange St.
- Magnolia Ave between Brockton Ave and Nelson St.
- Barton St and Orange Terrace Pkwy
- Trautwein Rd and Alessandro Blvd

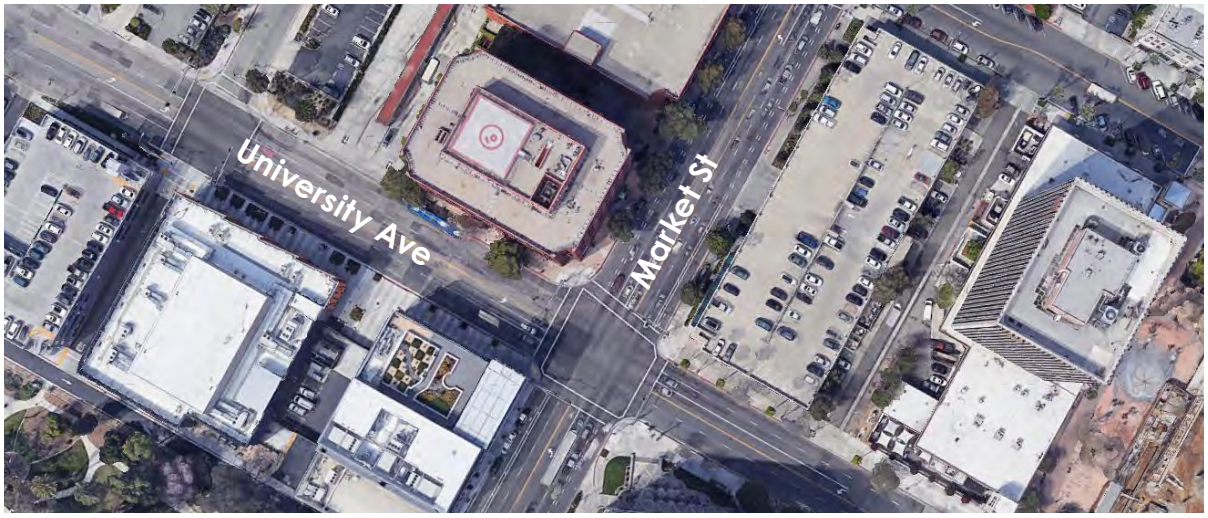


Photo Caption: Market St and University Ave.

TYPOLOGY E. HIGH VOLUME PEDESTRIAN AREAS

Common Challenges

- Impatient, distracted and aggressive drivers
- Limited sidewalk space
- Competing curbside uses (loading zones, shared mobility, transit stops)
- Limited pedestrian queuing space

Tools

- Curb extensions
- Crossing guards or traffic control
- High-visibility crosswalks
- Leading pedestrian intervals
- Pedestrian-only signal phase
- Extended crossing time
- Pedestrian Scramble

Identified Spot Improvements

- University Ave and Market St

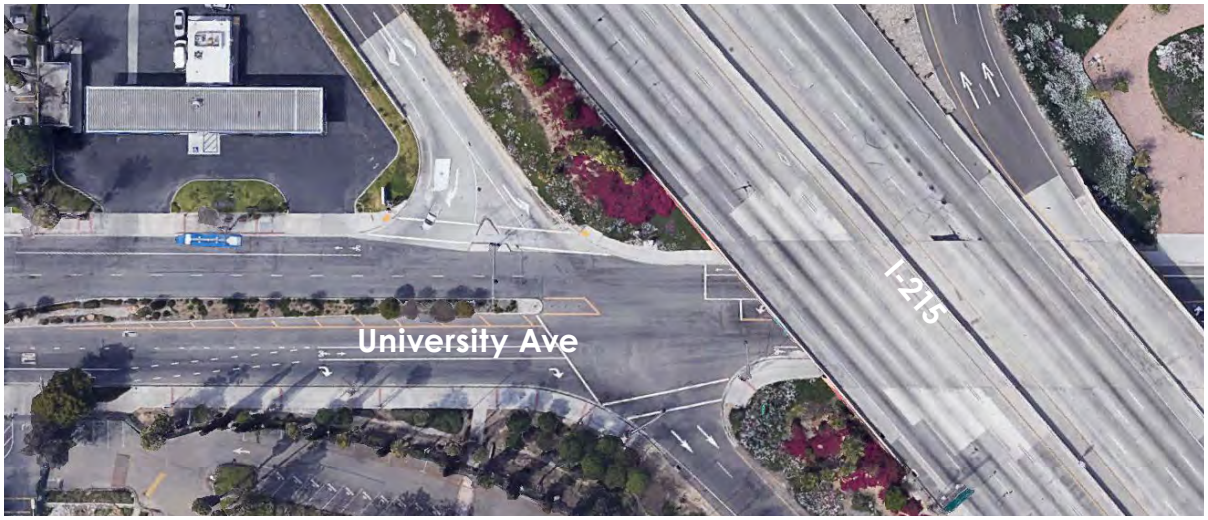


Photo Caption: University Ave and I-215.

TYPOLOGY F. FREEWAY INTERCHANGES

Common Challenges

- High vehicle speeds
- High vehicle volumes
- Drivers not expecting pedestrians
- Missing sidewalks
- Unmarked crossings
- Lighting
- Limited alternative routes

Tools

- Marked crosswalks
- Signs
- Pavement markings
- Sidewalks
- Lighting
- Slip lane removal
- On ramp lane removal

Identified Spot Improvements

- University Ave and I-215 interchange
- Van Buren Blvd and Indiana Ave
- Central Ave and SR-91 interchange
- Tyler St and Indiana Ave - North
- Tyler St and Indiana Ave - South
- Third St. and I-215

PEDESTRIAN CORRIDOR IMPROVEMENTS

A sidewalk network is critical to pedestrian accessibility and safety by allowing adequate space for pedestrian movement alongside roadways. In collaboration with the Technical Advisory Committee, resident input and City staff, Riverside wards were analyzed for their accessibility to nearby destinations, including schools, trails, parks, places of worship, and commercial centers.

Riverside has a robust system of well-maintained and consistent sidewalks.

However, there are a few areas within the City that lack sidewalks and good pedestrian connections and that could benefit from more frequent maintenance. These areas are predominantly located within wards 6 and 7 in the La Sierra and Arlington neighborhoods.

Recommended pedestrian projects Citywide are shown below in Figure 4-12. Recommended pedestrian projects at the ward level are shown on the following pages in Figures 4-13 to 4-19 and Tables 4-3 to 4-16.

FIGURE 4-12 PEDESTRIAN RECOMMENDATIONS

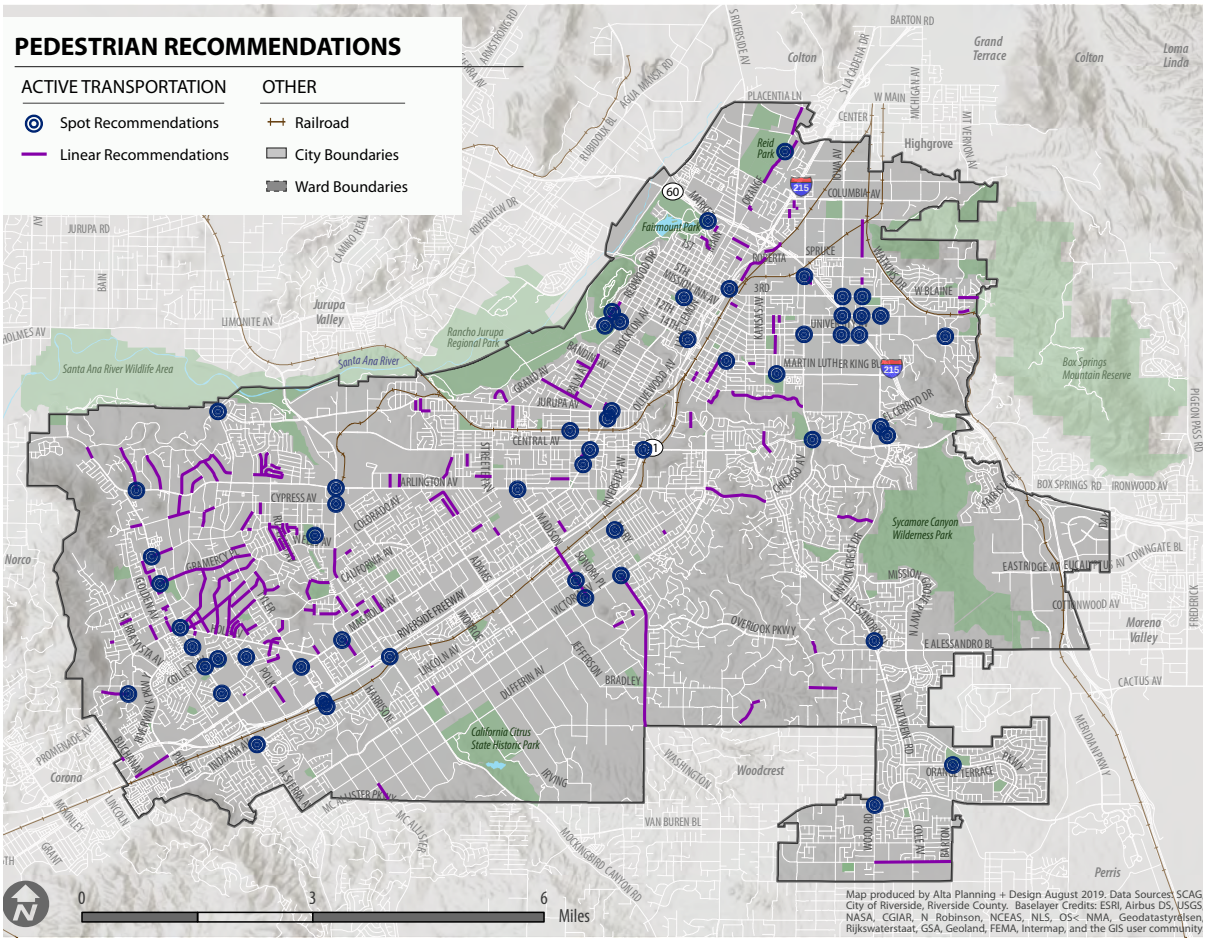


FIGURE 4-13 PEDESTRIAN RECOMMENDATIONS WARD1

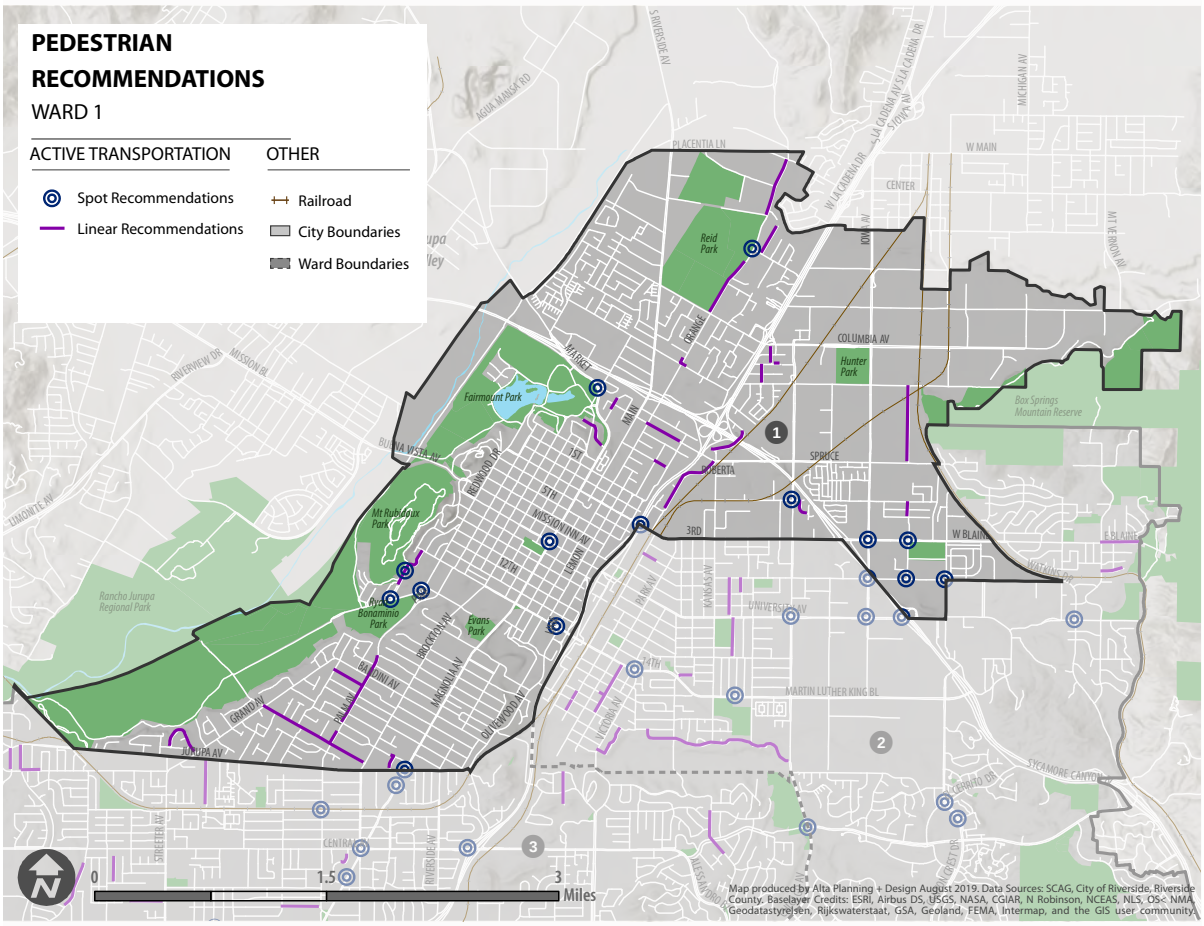


TABLE 4-3 PEDESTRIAN SPOT RECOMMENDATIONS WARD 1

CORRIDOR	CROSS STREET	IMPROVEMENT
14th St	Olivewood Ave	Intersection Typology B
Blaine St	Iowa Ave	Intersection Typology A
Chicago Ave	Massachusetts Ave	Install Traffic Signal. Intersection Typology B
Fairmount Blvd	Market St	Intersection Typology B add crosswalks
Mt Rubidoux Trail Head	Glenwood Dr	Intersection Typology D. Install mid block crossing on Glenwood Dr at trail head
Palm Ave	14th St	Intersection Typology C
Reid Park Ruth H Lewis Center	Orange St	Intersection Typology D. Install mid block crossing on Orange St at park entrance
Rustin Ave	Blaine St	Intersection Typology B
Tequesquite Ave	Glenwood Dr	Intersection Typology C
University Ave	Market St	Intersection Typology E

TABLE 4-4 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 1

CORRIDOR	IMPROVEMENT
E La Cadena	Install sidewalk from 1st St to Down St.
Glenwood Dr	Install sidewalk on Glenwood Dr around S curve to 14th St.
Kemp St	Install sidewalk on both sides of the street from Chase Rd to dead end.
Laurel Ave	Install sidewalk along the east side of Laurel Ave from Marlborough to Columbia. Sidewalk existing on west side of street.
Lecil St	Install sidewalk south of Massachusetts Ave.
Linwood Pl	Install sidewalk west of Palm Ave to Tower Rd.
Birch St	Install sidewalk from Jurupa Ave to Maplewood Dr.
Milton St	Install where gaps exist. Sidewalk exists on south side of street.
Northbend St	Install sidewalk on both sides of the street from Spruce St to Market St.
Old Mill Rd	Install sidewalk on both sides of the Old Mill Rd.
Orange St	Install sidewalk at the corner of Strong St which serves at a school crossing for students on their routes to and from Fremont Elementary School.
Orange St	Install sidewalk from Garner Rd to Center St.
Orange St	Install sidewalk from Columbia Ave to Chase Rd. There is existing sidewalk on the west side of Orange St.
Palm Ave	Install sidewalk from Beechwood Pl to Brentwood Ave.
Palm Ave	Install sidewalk from Maplewood Pl to Rubidoux Ave.
Poplar St	Install sidewalk on the south side of the street. North side was improved with sidewalk from Mulberry St to Lime St.
Ridge Rd	Install sidewalk on Ridge St west of Market St. Sidewalk existing on east side of street.
Rubidoux Ave	Install missing sidewalk segments along Rubidoux Ave, between Grand Ave and Brockton Ave.
Rustin Ave	Install sidewalk on both sides of the street from Massachusetts Ave to Blaine St.
Rustin Ave	Install sidewalks and curb ramps on Rustin St between Spruce St and Marlborough Ave.
Spruce St	Install sidewalk on north side of Spruce between Orange St & Mulberry St. Sidewalk existing on south side of street.

FIGURE 4-14 PEDESTRIAN RECOMMENDATIONS WARD 2

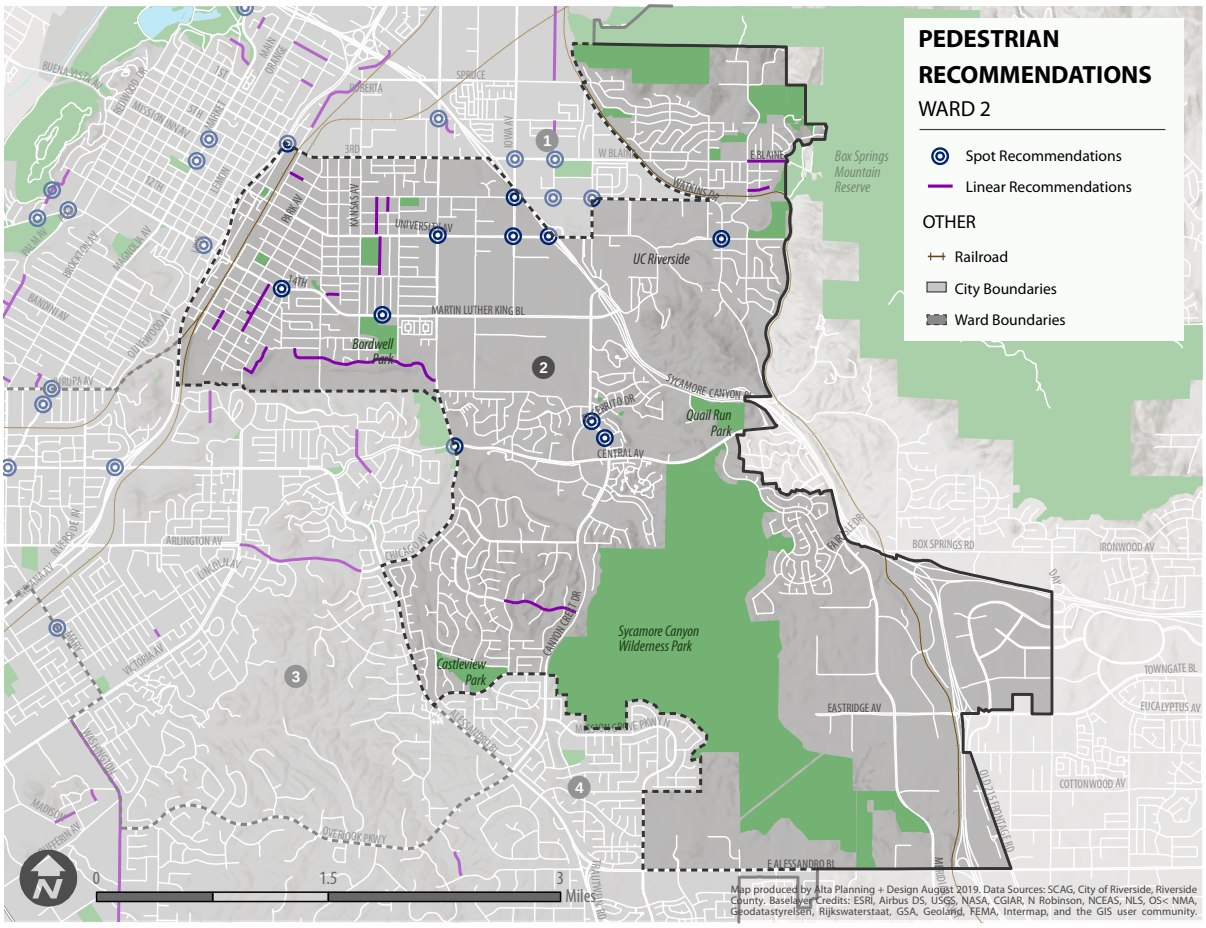


TABLE 4-5 PEDESTRIAN SPOT RECOMMENDATIONS WARD 2

CORRIDOR	CROSS STREET	IMPROVEMENT
14th St	Victoria Ave	Intersection Typology B
Canyon Crest Dr	Via Pueblo	Install crossing, Intersection Typology B
Chicago Ave	University Ave	Intersection Typology A
El Cerrito Dr	Canyon Crest Dr	Intersection Typology B
Iowa Ave	W Linden St	Intersection Typology A
MLK Blvd	Douglass Ave	Improve mid block crossing, Intersection Typology D
Rustin Ave	W Linden St	Intersection Typology B
Third St	Vine St	Intersection Typology C
University Ave	I-215 interchange	Intersection Typology F
University Ave	Iowa Ave	Intersection Typology A
University Ave	South entrance to University Village	Intersection Typology B, pedestrian scramble
W Linden St	Canyon Crest Dr	Intersection Typology C
Watkins Dr	W Big Springs Rd	Intersection Typology C

TABLE 4-6 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 2

CORRIDOR	IMPROVEMENT
5th St	Install sidewalk on both sides of the street between Commerce St and Park Ave.
Campus View Dr	Install sidewalk on both sides of the street.
Georgia St	Install sidewalk on the north side of the street east of Eucalyptus Ave.
Dwight Ave	Install sidewalk on both sides of the street from W Linden St to Loma Vista St.
E Blaine St	Install curb, gutter, and sidewalk from Mt Vernon Ave to dead end.
Grove Ave	Install sidewalk between 14th St and Cridge St.
Howard Ave	Install sidewalk to complete gap. Curb, curb ramp, and gutter from Denton St to Date St.
Jerome St	Install sidewalk from Wayman St north to dead end.
Prospect Ave	Install sidewalk, curb, and gutter west of Grove Ave.
Ransom Rd	Install sidewalk to eliminate gap(s) on the south side of Ransom, between Claridge Dr & Canyon Crest Dr.
Somerset Dr	Install sidewalk on both sides of the street where gaps exist. Right of way issues.

FIGURE 4-15 PEDESTRIAN RECOMMENDATIONS WARD 3

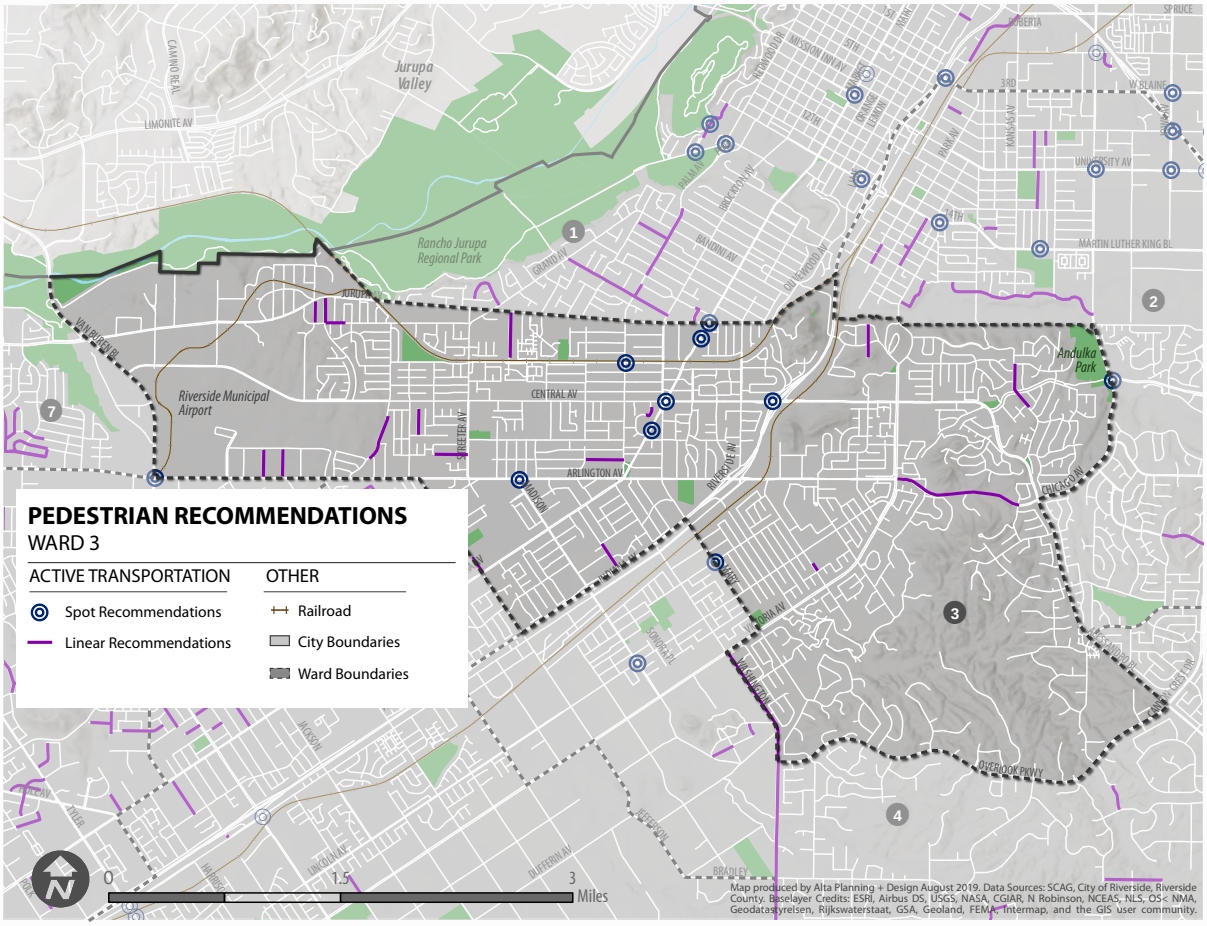


TABLE 4-7 PEDESTRIAN SPOT RECOMMENDATIONS WARD 3

CORRIDOR	CROSS STREET	IMPROVEMENT
Central Ave	Magnolia Ave	Intersection Typology A
Central Ave	SR-91 Interchange	Intersection Typology F
Chicago Ave	Central Ave	Intersection Typology A
Jurupa Ave	Magnolia Ave	Intersection Typology A
Madison St	Arlington Ave	Intersection Typology A
Magnolia Ave	Between Brockton Ave and Nelson St	Improve mid block crossing, Intersection Typology D
Magnolia Ave	Elizabeth St	Intersection Typology B
Palm Ave	Dewey Ave	Intersection Typology C and improve railroad crossing

TABLE 4-8 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 3

CORRIDOR	IMPROVEMENT
School Circle	Install sidewalk on both sides of the street to Central Ave, students go to and from Riverside Adult School on Magnolia.
Arlington Ave	Install sidewalks and curb ramps along south side between Sunset Ranch Dr & Hawarden Dr. Serves as route to school for Poly High and Victoria Elementary Schools.
Douglass Ave	Install sidewalk on east side of street. Sidewalk existing on west side of street.
Eileen St	Install sidewalk between California Ave & Carmelia Dr.
Essex St	Install sidewalk on west side of street from Jurupa Ave to Mountain View Ave.
Fremont St	Install sidewalk and curb ramps both sides of the street from Jurupa Ave to Mountain View St.
Granada Ave	Install sidewalk and curb ramps on the both sides of the street west of Streeter Ave.
Hallwood St	Install sidewalk and curb ramps both sides of Hallwood St.
Hillside Ave	Install curb, gutter, and sidewalk to close gap from Arbor Dr to Portola Way.
Hoover St	Install sidewalk on both sides of the street from Orchard St south to dead end.
Maude St	Install sidewalk, curb, and gutter to be installed between Foster Dr and Victoria Ave.
Mountain View St	Install sidewalks and curb ramps along both sides of Mountain View St between Essex St & the N/W corner of Vera St.
Murray St	Install sidewalk from Arlington Ave to dead end.
Prince Albert Dr	Install missing sidewalk from Carlton Pl to Chicago Ave.
Stearns St	Install curb, gutter, and sidewalk on both sides of the street from Jurupa Ave and Dewey Ave.
Weaver St	Install sidewalk, curb, curb ramps, and gutter on both sides of the street.

FIGURE 4-16 PEDESTRIAN RECOMMENDATIONS WARD 4

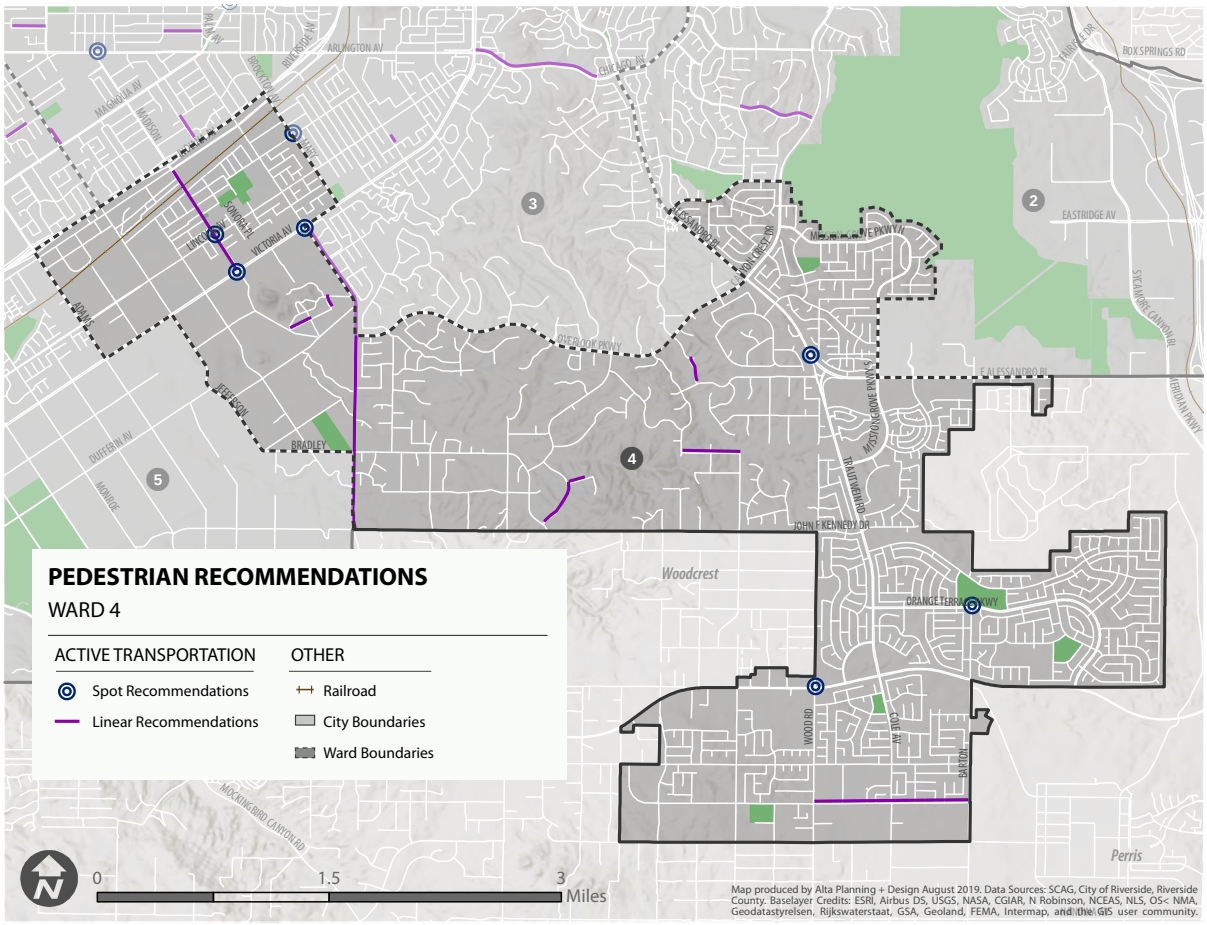


TABLE 4-9 PEDESTRIAN SPOT RECOMMENDATIONS WARD 4

CORRIDOR	CROSS STREET	IMPROVEMENT
Barton St	Orange Terrace Pkwy	Install mid block crossing across Orange Terrace Pkwy, Intersection Typology D
Madison St	Lincoln Ave	Intersection Typology C
Madison St	Victoria Ave	Intersection Typology C. Improve Crossings.
Mary St	Marguerita Ave	Intersection Typology C
Trautwein Rd	Alessandro Blvd	Intersection Typology B
Washington St	Victoria Ave	Intersection Typology B. Improve Crossings.
Wood Rd	Van Buren Blvd	Intersection Typology A

TABLE 4-10 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 4

CORRIDOR	IMPROVEMENT
Cactus Ave	Install sidewalk from Crystal View Terrace to Dauchy Ave
Choi Dr	Install sidewalk on the East side of Choi Dr.
Corinthian Way	Install sidewalk on both sides of the street from Via Vista Dr to Berry Rd.
Glenhaven Ave	Install sidewalk between Elsinore Rd and Stratford Way.
Lurin Ave	Install sidewalk, curb ramps, curb and gutter on both sides of the street where gaps exist from Wood Rd to Barson St.
Madison St	Expand sidewalk width when possible from Indiana Ave to Lincoln Ave.
Norwood Ave	Install sidewalk on both sides of street between College Ave and La Sierra Ave.
Onata Ave	Install sidewalk along west side.
Pruitt Pl	Install sidewalk on both sides of street.
Pitcairn St	Install sidewalk on both sides of the street to close the gap.
Pontoosuc Ave	Install sidewalk on both sides of the street west of Prenda Ave.
Washington St	Install sidewalk from Victoria Ave to Washington Blvd.

FIGURE 4-17 PEDESTRIAN RECOMMENDATIONS WARD 5

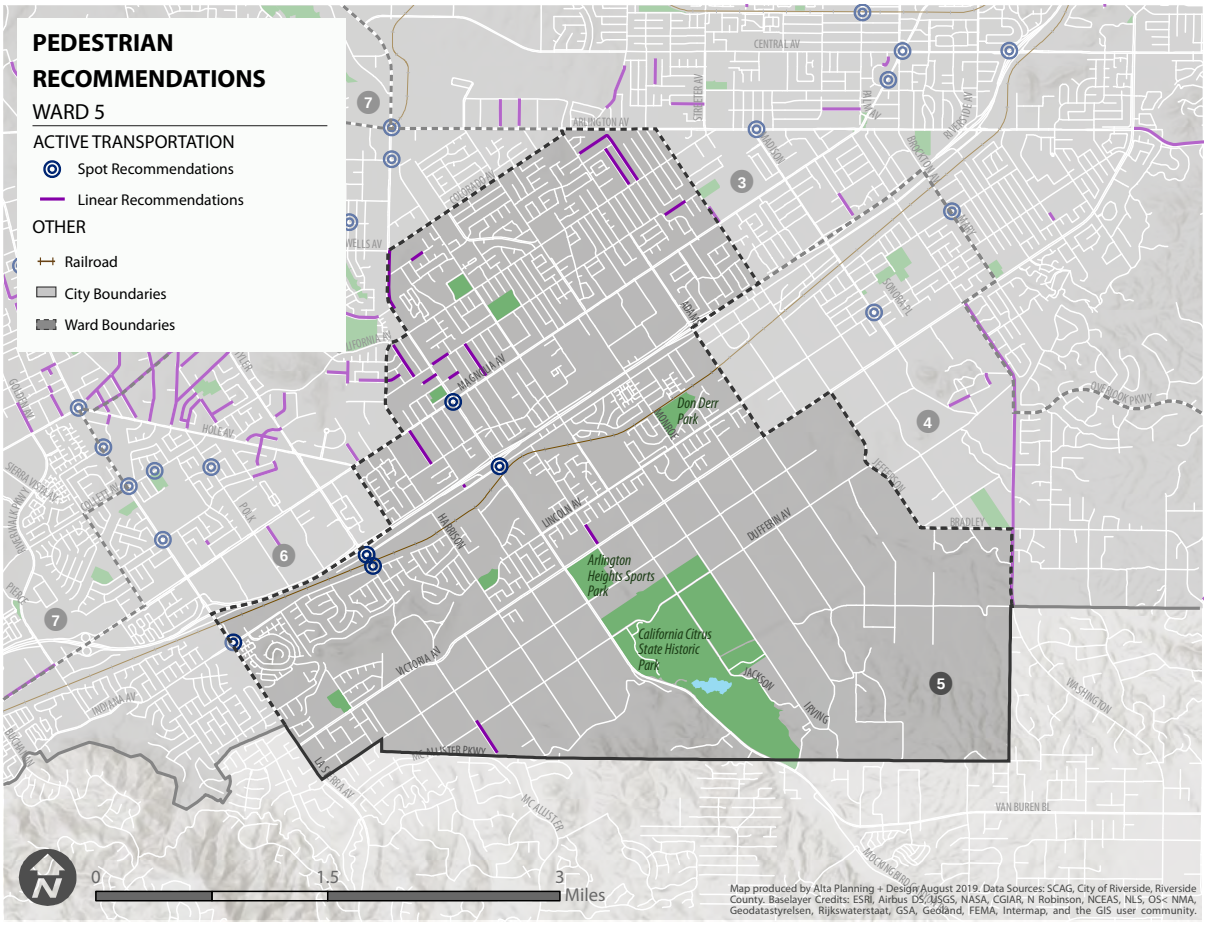


TABLE 4-11 PEDESTRIAN SPOT RECOMMENDATIONS WARD 5

CORRIDOR	CROSS STREET	IMPROVEMENT
Indiana Ave	La Sierra Ave	Intersection Typology A
Magnolia Ave	Van Buren Blvd	Intersection Typology A
Tyler St	Indiana Ave N of Tracks	Intersection Typology F
Tyler St	Indiana Ave S of Tracks	Intersection Typology F
Van Buren Blvd	Indiana Ave	Intersection Typology F

TABLE 4-12 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 5

CORRIDOR	IMPROVEMENT
Canterbury Rd	Install sidewalk on both sides of the street from Verbena Dr toe California Ave.
Duncan Ave	Install sidewalk on north side of street from Turnbill Rd to Pershing Dr curb and gutter needed.
Everest Ave	Install sidewalk from Garfield St to Magnolia Ave. Serves as route to and from school for Liberty Elementary and Chemawa Middle School students.
Garfield St	Install sidewalk to be constructed on the south side between Canterbury Rd and Via San Jose. Sidewalk existing on the north side.
Garfield St	Install sidewalk between Van Buren Blvd and McKenzie St.
Gibson St	Install sidewalk from Jonquil Pl to Victoria Ave.
Hayes St	Install sidewalk on both sides of the street between Van Buren Blvd and Castleman St.
Jefferson St	Install sidewalk on the west side of the street from Magnolia Ave north to close the gap. There is existing sidewalk on the east side.
Mason St	Install sidewalk to close gap between Van Buren Blvd to westerly terminus. Serves as route to and from school for Liberty Elementary School students.
McAllister St	Install sidewalk from Dufferin Ave to dead end. School bus drop off area.
Muir Ave	Install sidewalk west side between Magnolia and Primrose.
Myers St	Install sidewalk from Indiana Ave to dead end.
Sequoia St	Install sidewalk on both sides of the street.
Van Buren Blvd	Install sidewalk along the east side from Colorado Ave to Challen Ave.
Verbena Dr	Install sidewalk on both sides of the street from Adams St to Canterbury Rd.

FIGURE 4-18 PEDESTRIAN RECOMMENDATIONS WARD 6

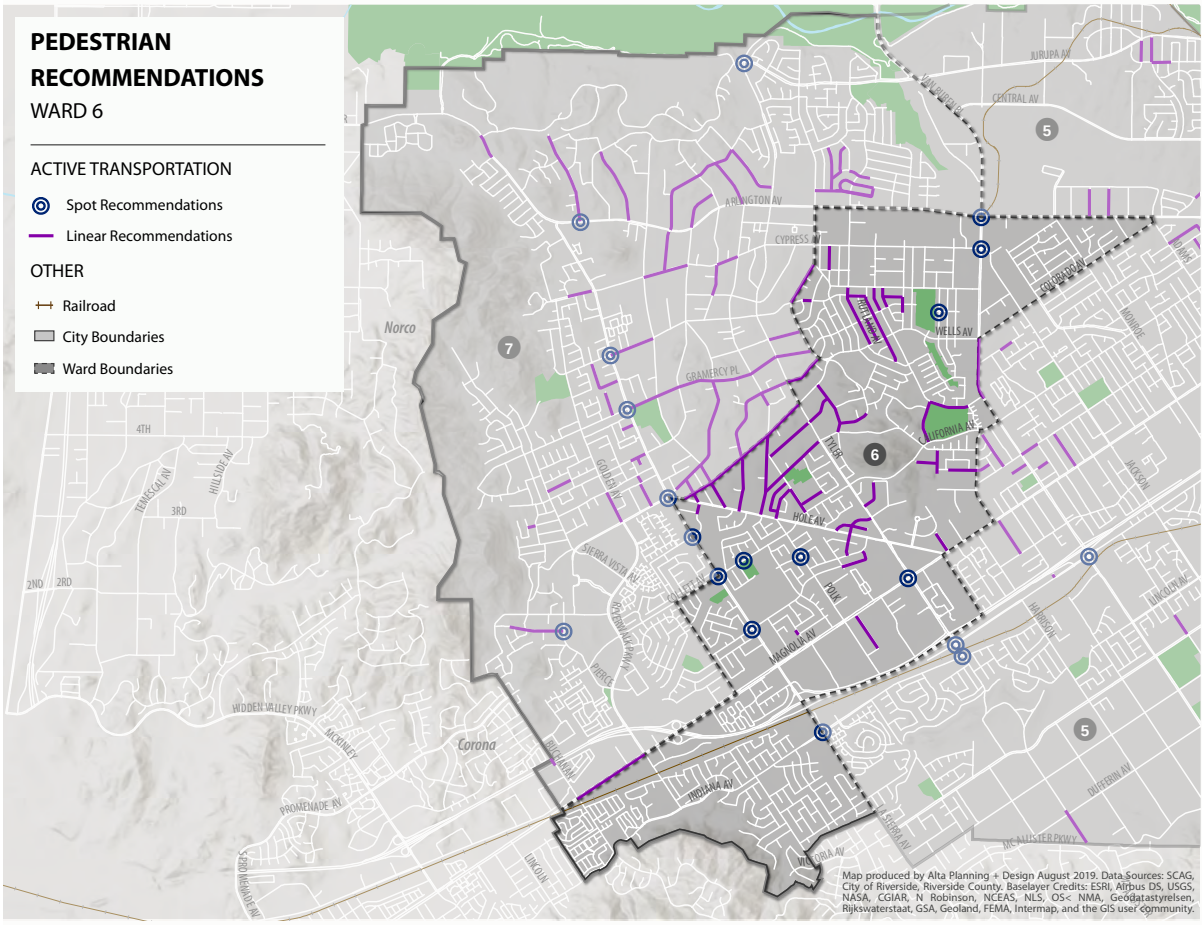


TABLE 4-13 PEDESTRIAN SPOT RECOMMENDATIONS WARD 6

CORRIDOR	CROSS STREET	IMPROVEMENT
Cass St	Polk St	Intersection Typology C
Collett Ave	Newby Dr	Intersection Typology C. Upgrade intersection
La Sierra Ave	Cochran Ave	Intersection Typology B. High visibility crosswalk
La Sierra Ave	Collett Ave	Intersection Typology B. High visibility crosswalk
Magnolia Ave	Tyler St	Intersection Typology A.
Van Buren Blvd	Jackson St	Intersection Typology B

TABLE 4-14 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 6

CORRIDOR	IMPROVEMENT
Bee Jay St	Install sidewalk and curb ramps on the east side of the street to close gap between Cypress Ave and Trey Ave.
Bingham Ave	Install sidewalk from Mobley Ave to Hole Ave.
Bonita Ave	Install sidewalk from Tyler St to Hole Ave. Existing curb and gutter.
Branigan Way	Install sidewalk and curb ramps on south side of the street. Serves as route to and from school for Myra Linn Elementary School students.
Buchanan St	Install sidewalk on east side over SR 91 overpass (west side).
Burge St	Install curb, gutter, and sidewalk from Magnolia Ave to Starlight Ct.
Calmhill Dr	Install sidewalk on the east side between California Ave & Challen Ave.
Campbell Ave	Install sidewalk between Ellen St and Picker St. ROW acquisition may be required for sidewalk installation.
	Install sidewalk between Ivanhoe Ave and Crest Ave. ROW acquisition may be required for sidewalk installation.
	Install sidewalk on north side from La Sierra Ave to Mitchell Ave. ROW acquisition may be required for sidewalk installation.
Challen Ave	Install sidewalk on north side from Van Buren Blvd heading west to link up to existing sidewalk east of Curan Dr.
Cochran Ave	Install sidewalk on both sides of street between Pendleton St and Mobley Ave
Cook Ave	Install sidewalk, curb and gutter required, street widening may be required on both sides of the street from Jones Ave to Tyler St.
Crest Ave	Install sidewalks on west side of the street between Campbell Ave to Babb Ave.
Eddystone St	Install sidewalk from Tomlinson Ave to Crest Ave. ROW acquisition may be required for sidewalk installation.
Ellen St	Install sidewalk and curb ramps on the east side of the street from Philbin Ave to Gramercy St.
Challen Ave	Install sidewalk from Philbin Ave to Gramercy St.
Ivanhoe Ave	Install sidewalk from Campbell Ave to Foothill Ave.
Jones Ave	Install sidewalk from Hole Ave to Wells Ave.
Kent Ave	Install sidewalks and curb ramps on both sides of the street from Gramercy Pl to Wells Ave.
Megginson Ln	Install sidewalk on the south side of the street.
Minnier Ave	Install sidewalk between Hole Ave and Whitford Ave.
Mobley Ave	Install sidewalk from Bingham Ave to California Ave.
Mull Ave	Install sidewalk from Tomlinson Ave to Mobley Ave. ROW acquisition may be required for sidewalk installation.
Nye Ave	Install sidewalk between Magnolia & White Oak. ROW acquisition may be required for sidewalk installation.
Picker St	Install sidewalk on west side between Gramercy Pl and Larry Way.
Rutland Ave	Install sidewalk from Wells Ave to Philbin Ave.
Selkirk Ave	Install sidewalk from Tyler St to Mariposa Ave.
Selma Ave	Install sidewalk on both sides of street.

TABLE 4-14 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 6

CORRIDOR	IMPROVEMENT
Sharon Ave	Install sidewalk along street. Existing curb and gutter on both side of street.
Tomlinson Ave	Install sidewalks on both sides of the street from Wells Ave to Cook Ave. ROW acquisition may be required for sidewalk installation.
	Install sidewalks on both sides of the street from Selma Ave to westerly terminus. ROW acquisition may be required for sidewalk installation.
Wagner Way	Install sidewalk on both sides of the street north of Hole Ave.
Wolfe Ave	Install sidewalks between Mobley Ave and Young St. ROW acquisition may be required for sidewalk installation.
Doane Ave	Install sidewalk from Bushnell Ave to Hole Ave. ROW acquisition may be required for sidewalk installation.
Magnolia Ave	Install sidewalk from Buchannon St to Pierce St.
Mitchell Ave	Install curb, gutter and curb ramps from Bushnell Ave to Hole Ave.
Wells Ave	Install sidewalks between Hole Ave and Tyler St. ROW acquisition may be required for sidewalk installation.

FIGURE 4-19 PEDESTRIAN RECOMMENDATIONS WARD 7

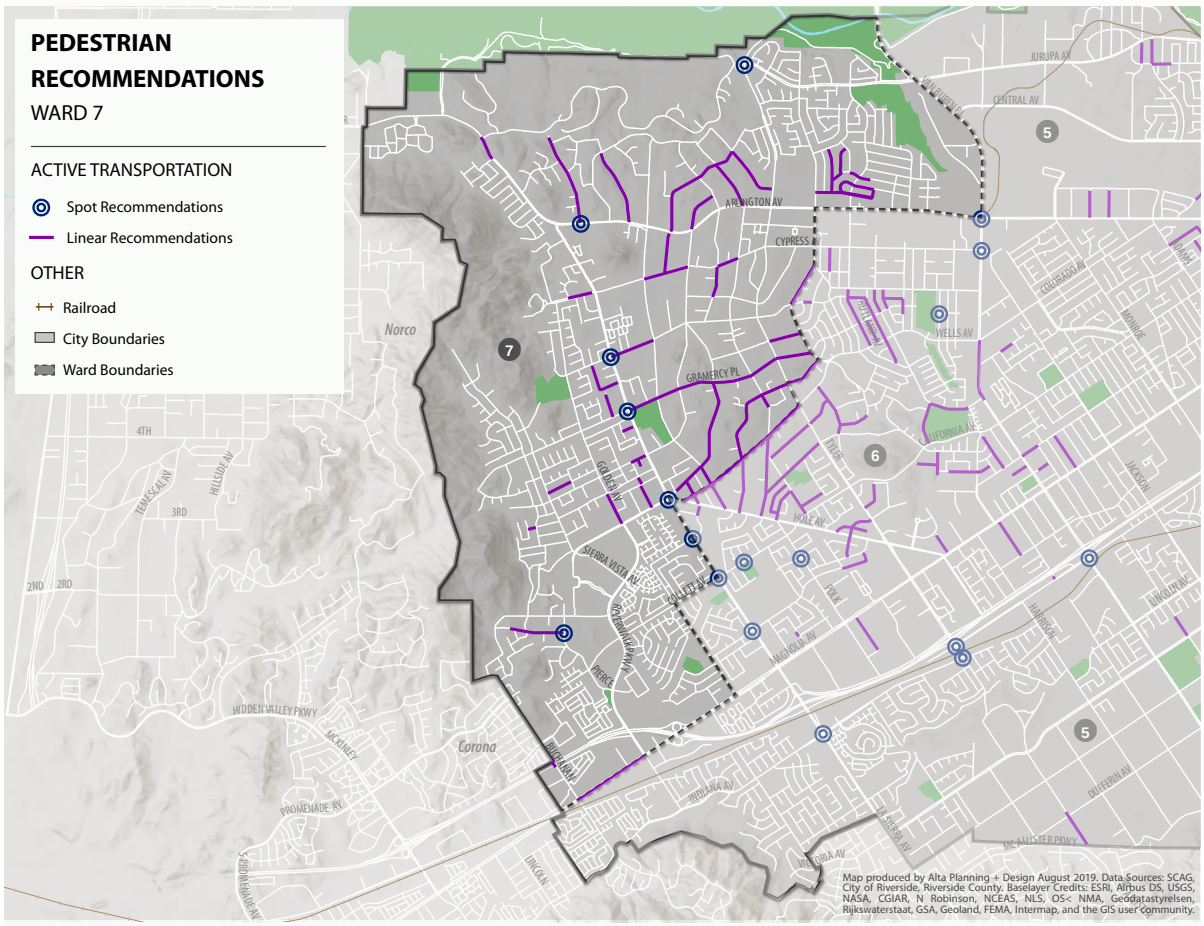


TABLE 4-15 PEDESTRIAN SPOT RECOMMENDATIONS WARD 7

CORRIDOR	CROSS STREET	IMPROVEMENT
Campbell Ave	La Sierra Ave	Intersection Typology B. High visibility crosswalk
Gramercy Pl	La Sierra Ave	Intersection Typology B
Knoefler Dr	Ambs Dr	Intersection Typology C and install sidewalks along Knoefler Dr
La Sierra Ave	Minnier Ave	Typology B. High visibility crosswalk
La Sierra Ave	Pierce St and Hole St	Upgrade intersection. Bushnell pedestrian plaza with removable bollards and historic signage. Typology A
Tyler St	Jurupa Ave	Intersection Typology D. Upgrade crossing for SART access
Western Ave	Arlington Ave	Intersection Typology C

TABLE 4-16 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 7

CORRIDOR	IMPROVEMENT
Adair Ave	Install sidewalk and curb ramps from Randolph St to Jo Jo Wy
Bristol St	Install sidewalk on the south side to close the gap from La Salle St to La Sierra Ave.
Bruce Ave	Install sidewalk between Mia Ave and Adair Ave.
	Install sidewalk between Rutland Ave and Lake St.
Bushnell Ave	Install sidewalks between Hole Ave and Gramercy Ave.
Chadbourne Ave	Install sidewalk on both sides of the street.
Cleta Dr	Install sidewalk on both sides from Campbell Ave to Thrush Dr. ROW acquisition may be required for sidewalk installation.
Cypress Ave	Install missing sidewalk from Golden Terrace Dr to La Sierra Ave on north side of street.
	Install sidewalk on both sides of the street between Mitchell Ave and Norwood Ave.
	Install sidewalk on both sides of the street between Chadbourne Ave and Jones Ave.
Doverwood Dr	Install sidewalk from Butler Ave and College Ave.
Arlington Ave	Install sidewalk along both sides of street north of Fairhaven Dr to City limit.
Flower St	Install sidewalk, curb ramps, curb and gutter between Sierra Vista Ave and Carob Way.
Gaylord St	Install sidewalks from Tyler St to Stover Ave.
Golden Ave	Install sidewalk between Mountain Ave and Pierce St.
Gramercy Pl	Install sidewalk between La Sierra Ave and Tyler St.
Hedrick Ave	Install sidewalk, curb ramps, curb and gutter on both sides of the street from Hole Ave to Crest Ave.
Jo Jo Wy	Install sidewalk between Crest Ave and Rutland Ave.
Jones Ave	Install sidewalk from Arlington Ave to Stover Ave.
	Install sidewalk from Hendrick Ave to Alder Creek Ln.
Keller Ave	Install sidewalk, curb, curb ramps, and gutter where missing to close gap from Tyler St to Crest Ave.
Knoefler Dr	Install sidewalk and curb ramps on both sides of the street from west of Ambs Dr to western terminus.
Lessie Ln	Install sidewalks between Bruce Ave and Mia Ave.
Norwood Ave	Install sidewalk, curb, curb ramps, and gutter between Chadbourne Ave and Arlington Ave.
Penny Dr	Install sidewalks on both sides of the street from Lake St to Jo Jo Way. Serves as route and from school for Terrace Elementary School students.

TABLE 4-16 PEDESTRIAN CORRIDOR RECOMMENDATIONS WARD 7

CORRIDOR	IMPROVEMENT
Rose Ave	Install sidewalk from Doverwood Dr to Mountain Ave.
	Install sidewalk from Gramercy Pl to northerly terminus.
	Install sidewalk from Mountain Ave to Pierce St.
Stover Ave	Install sidewalk on both sides from Cypress Ave and Arlington Ave.
	Install sidewalk, curb, curb ramps, and gutter between Arlington Ave and Garlord St.
Sandy Ln	Install curb, gutter & sidewalks on both sides of the street where gaps exist from Arlington Ave to Valley Drive.
Western Ave	Install sidewalk, curb, curb ramps, and gutter along both sides where gaps exist.
Doane Ave	Install sidewalk from Bushnell Ave to Hole Ave. ROW acquisition may be required for sidewalk installation.
Magnolia Ave	Install sidewalk on both sides from Buchanan St to Pierce St.
Mitchell Ave	Install sidewalk from Bushnell Ave to Hole Ave.
Thrush Dr	Install sidewalk on both sides from Cleta Dr to La Sierra Ave. ROW acquisition may be required for sidewalk installation.
Wells Ave	Install sidewalks, street widening and curb and gutter on both sides between Hole Ave and Tyler St.

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Recommended Bicycle Network

THE NEEDS OF PEOPLE BICYCLING WITHIN RIVERSIDE ARE VARIED AND DEPENDENT ON CYCLIST'S LEVEL OF EXPERIENCE, COMFORT, AND TRANSPORTATION NEEDS. TO BETTER UNDERSTAND THESE NEEDS, THIS SECTION EXAMINES A BICYCLE LEVEL OF TRAFFIC STRESS ANALYSIS TO IDENTIFY LOCATIONS WITH EXISTING BIKE FACILITIES THAT MAY PROMOTE OR IMPEDE CYCLISTS FROM RIDING ON RIVERSIDE STREETS. THIS SECTION ALSO IDENTIFIES KEY FINDINGS FROM THE DEMAND/EXISTING CONDITIONS ANALYSIS AS WELL AS PUBLIC INPUT.

Research indicates that the majority of people in the United States would bicycle if dedicated bicycle facilities were provided.

GOALS FOR THE BICYCLE NETWORK INCLUDE:

1. *Make it comfortable for all users*
2. *Fill in Network gaps*
3. *Connect to local destinations*
4. *Improve intersection crossings*

PROPOSED BICYCLE NETWORK

Built on the analysis previously stated on page 4-36 as well as the comprehensive community outreach process, the proposed bicycle network aims to create a comfortable and links network that connects people to places.

At full build out, the Plan recommends building 111 miles of new bikeways , bringing the total bike network to 365 miles, including just over 9 miles of Class IV Separated Bikeways. Table 17 displays the existing and recommended bikeway mileage. In addition, the table shows the number of existing bikeways that will be upgraded to more comfortable and separated bikeways.

A full list of the proposed bikeway segments organized by facility class can be found in Table 4-18 to 4-24. Figure 4-20 shows the recommended bikeway projects Citywide. Recommended bikeway projects at the ward level are shown in Figures 4-21 to 4-27.

TABLE 4-17 BIKEWAY RECOMMENDATIONS MILEAGE

BIKEWAY CLASS	NAME	EXISTING (MILES)	PREVIOUSLY PLANNED (MILES)	RECOMMENDED (MILES)	UPGRADED (MILES)	TOTAL (MILES)
Class I	Shared Use Path	14.9	16.2	1.5	0.3	32.6
Class I & II	Bike Lane with Side Path	8.3	-	-	-	-
Class II	Bike Lane	122.3	48.0	40.5	2.2	210.8
Class IIB	Buffered Bike Lane	7.2	-	30.7	18.0	37.9
Class III	Bicycle Route	2.3	40.9	1.4	-	44.6
Class IIIB	Bicycle Boulevard	-	-	27.7	-	27.7
Class IV	Separated Bikeways	1.4	0.5	9.6	7.5	11.5
TOTAL		**156.4**	**105.6**	**111.4**	**28.0**	**365.0**

FIGURE 4-20 BIKEWAY RECOMMENDATIONS

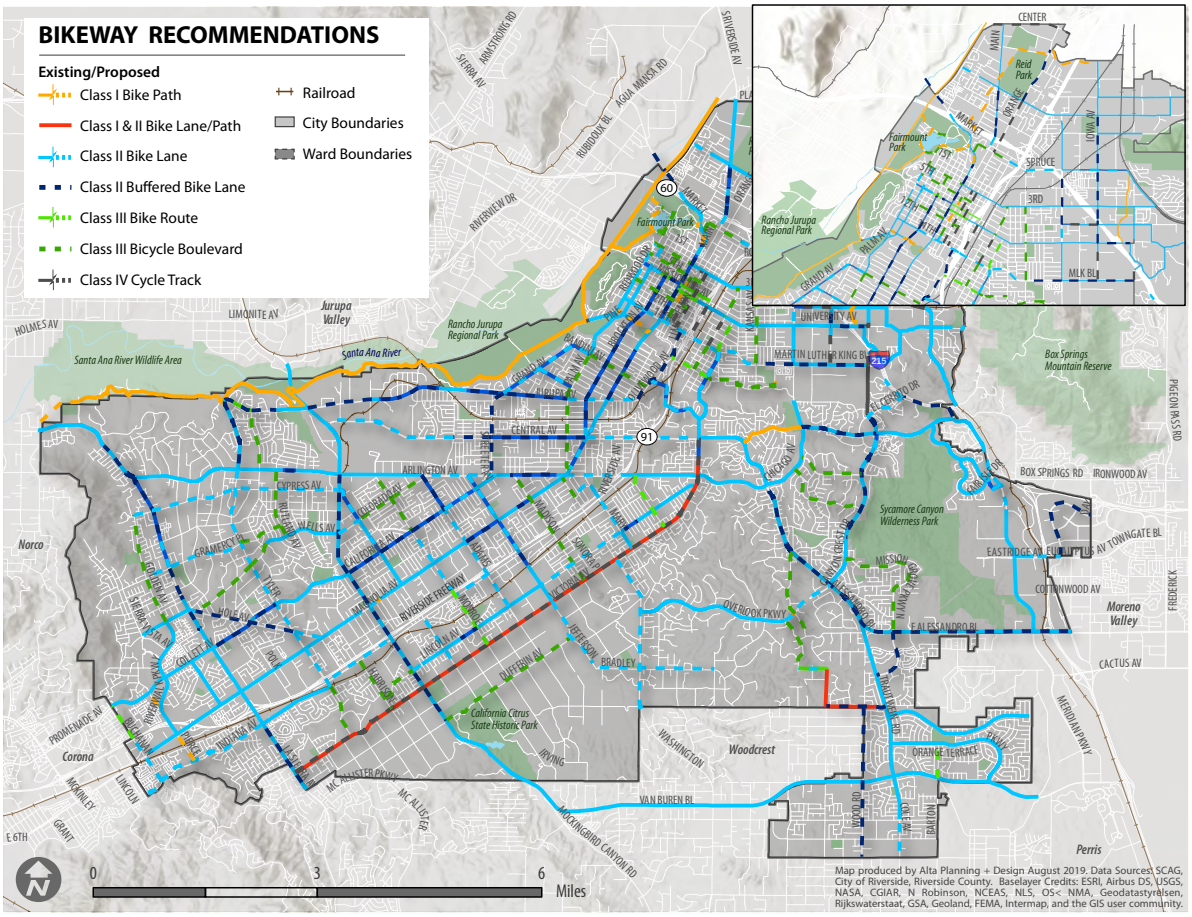


FIGURE 4-21 RECOMMENDED BIKEWAYS WARD 1

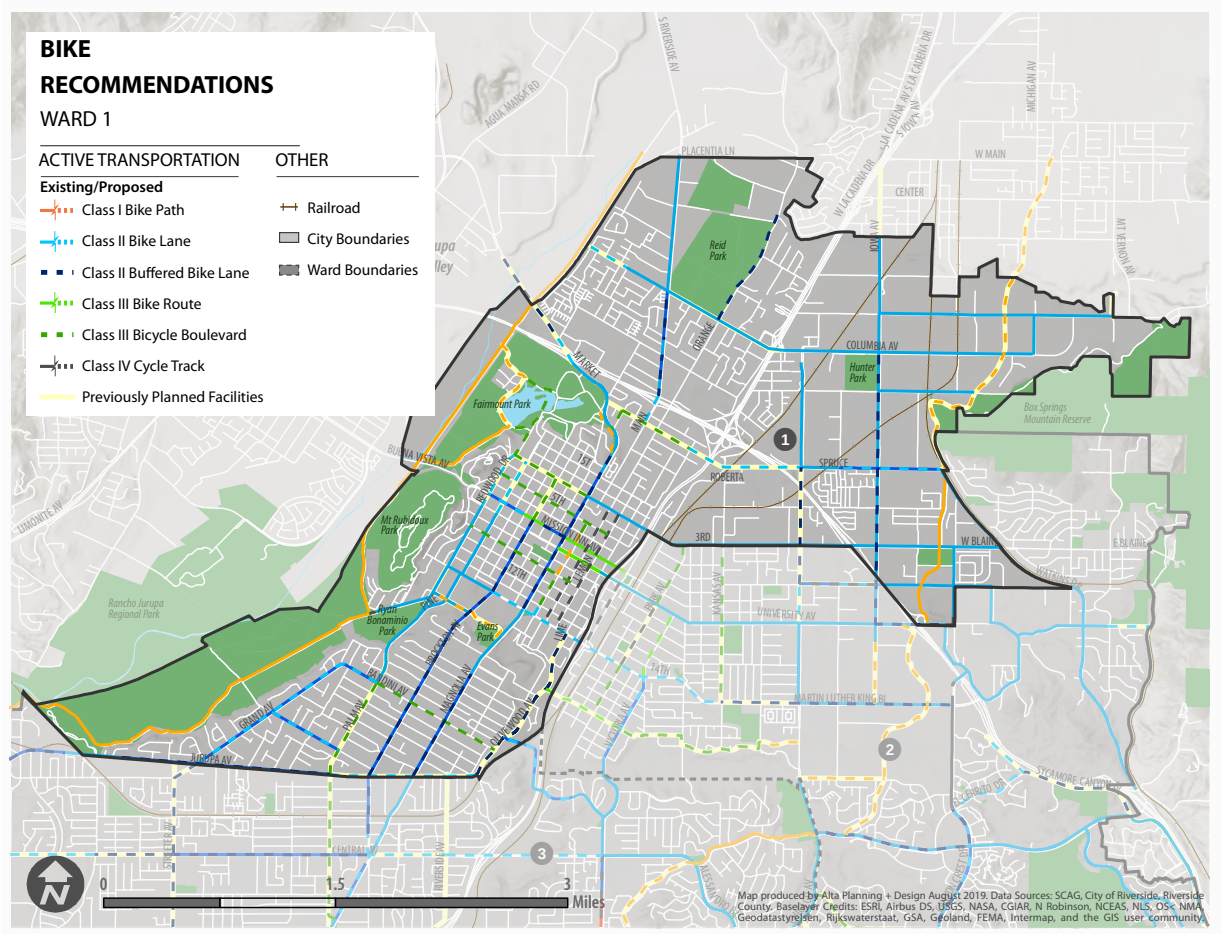
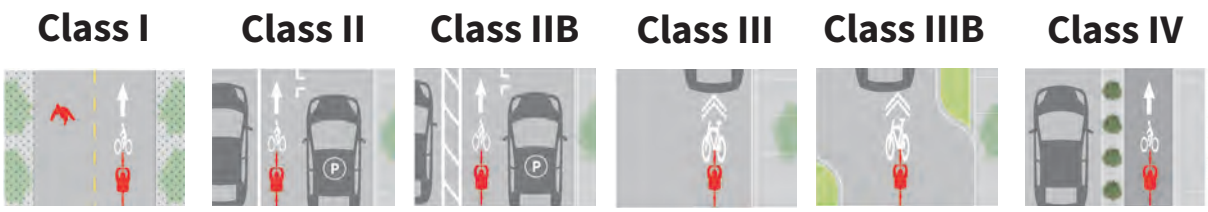


TABLE 4-18 RECOMMENDED BIKEWAYS WARD 1

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
14th St	Brockton Ave	SR-91 Fwy WB Offramp	II	0.7
10th St	Lemon St	Redwood Dr	IIIB	0.8
3rd St	Market St	Redwood Ave	IIIB	0.6
5th St	Lemon St	Redwood Dr	IIIB	0.8
Bandini Ave	Olivewood Ave	Palm Ave	IIIB	0.9
Brockton Av	Mission Inn Ave	3rd St	IIIB	0.3
Chicago Av	University Ave	W Blaine St	II	0.5
Chicago Av	W Linden St	Spruce St	IIB	0.8
Columbia Av	American Dr	Salmon River Rd	II	0.3
Dexter Dr	Redwood DR	SART entrance	IIIB	0.1
Iowa Ave	Columbia Ave	I-215 Overpass	IIB	1.4
Jurupa Ave	Riverside Ave	Palm Ave	II	0.8
Lemon St	14th St	3rd St	IV	0.8

TABLE 4-18 RECOMMENDED BIKEWAYS WARD 1

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Main St Pedestrian Mall	10th St	6th St	I	0.3
Main St	14th St	13th St	II	0.1
Main St	Oakley Ave	Spruce St	II	0.2
Main St	Strong St	Spruce St	IIB	0.3
Main St	13th St	10th St	IIIB	0.2
Main St	6th St	5th St	IIIB	0.2
Market St	Ridge Rd	Locust St	I	0.3
Market St	Rivera St	Santa Ana River Trail	II	0.6
Market St	1st St	Ridge Rd	II	0.2
N Orange St	Colombia Ave	Burl Dr	IIB	0.8
Northbend St	Spruce St	Market St	IIIB	0.1
Olivewood Ave	14th St	Jurupa Ave	IIB	1.1
Orange St	14th St	3rd St	IV	0.8
Palm Av	Bandini Ave	Jurupa Ave	IIIB	1.6
Pine St	University Ave	3rd St	II	0.4
Redwood Dr	University Ave	3rd St	II	0.4
Redwood Dr	3rd St	Field Ln	IIIB	0.7
Spruce St	Chicago Ave	Mulberry Ave	II	0.8
Spruce St	Mulberry Ave	Norhtbend St	IIIB	0.5
			Total	**18.4**



Diagrams for illustrative purposes only

FIGURE 4-22 RECOMMENDED BIKEWAYS WARD 2

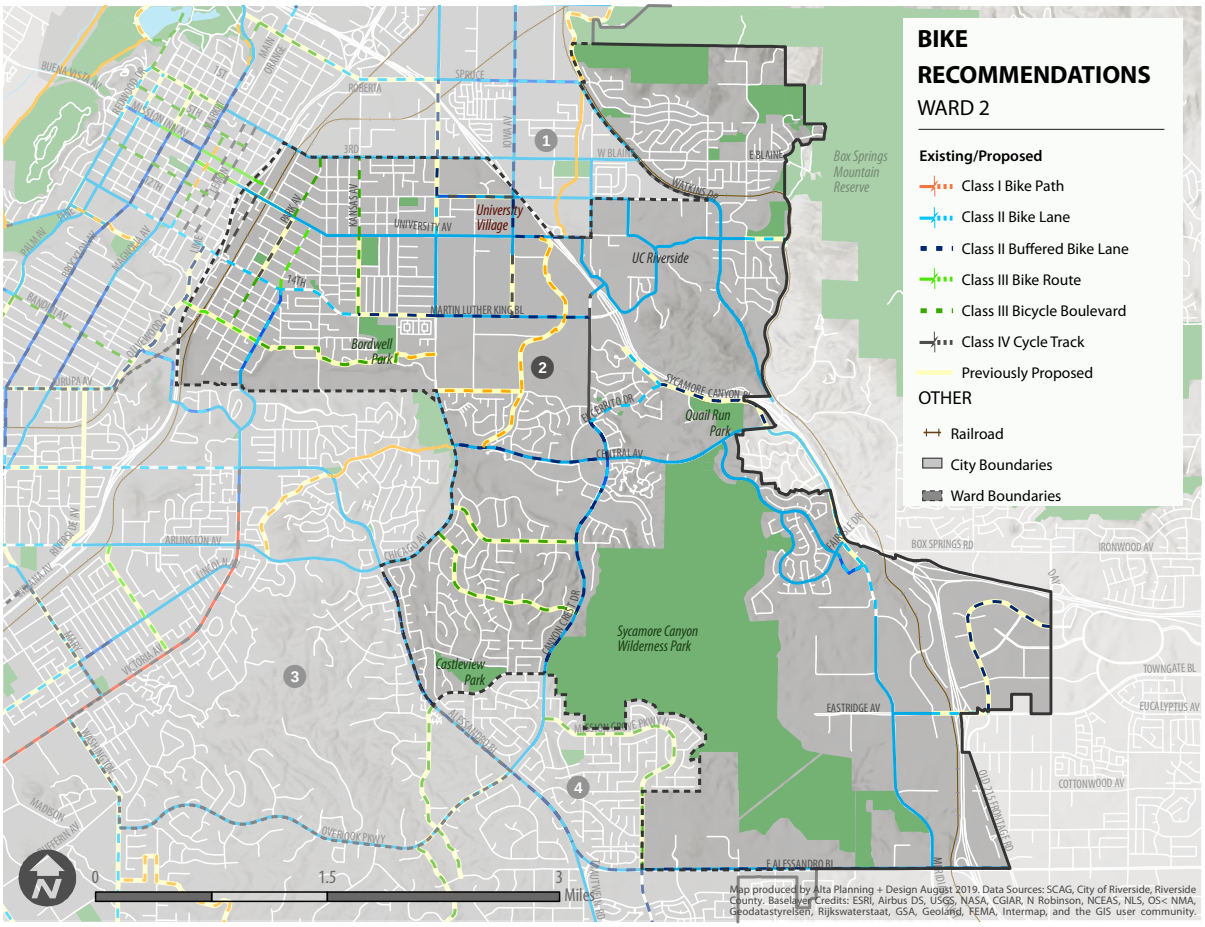
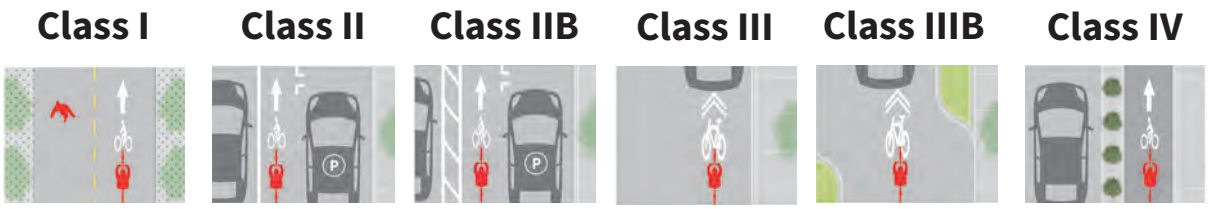


TABLE 4-19 RECOMMENDED BIKEWAYS WARD 2

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
14th St	SR-91 Fwy WB Offramp	Kansas Ave	II	1.0
Alessandro Blvd	Chicago Ave	Via Vista Dr	IIB	0.9
E Alessandro Blvd	Mission Grove Pkwy N	Old 215 Frontage Rd	IIB	2.4
Canyon Crest Dr	Via Vista Dr	El Cerrito Dr	IIB	1.8
Canyon Crest Dr	Martin Luther King Blvd	UC Riverside Parking Lot 30 Driveway	IV	0.2
Canyon Springs Pkwy	Eastridge	Day St	IIB	1.3
Carlton Pl	Somerset Dr	Sedgwick Ave	IIIB	0.4
Central Ave	Canyon Crest Dr	Chicago Ave	IIB	1.0
Chicago Av	University Ave	W Linden St	II	0.3
Chicago Av	3rd St	W Linden St	IIB	0.2
Country Club Dr	Chicago Ave	Canyon Crest Dr	IIIB	0.9
Cridge St	Olivewood Ave	Victoria Ave	III	0.5

TABLE 4-19 RECOMMENDED BIKEWAYS WARD 2

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Cridge St	Victoria Ave	Somerset Dr	IIIB	0.1
Eastridge Ave	Sycamore Canyon Blvd	I-215	II	0.2
El Cerrito Dr	Sycamore Canyon Blvd	Canyon Crest Dr	II	0.5
Eucalyptus Ave	I-215	Valley Springs Pkwy	II	0.2
Iowa Ave	University Ave	I-215 Overpass	IIB	0.3
Kansas St	University Ave	3rd St	IIIB	1.0
Martin Luther King Blvd	Canyon Crest Dr	Chicago Ave	IIB	1.0
Martin Luther King Blvd	Kansas Ave	Chicago Ave	IIB	0.5
Mission Grove Pkwy N	E Alessandro Blvd	Cottonwood Ave	IIB	0.5
Park Ave	Cridge St	14th St	IIIB	0.4
Park Ave	University Ave	3rd St	IIIB	0.4
Prince Albert Dr	Sedgwick Ave	Ottawa Ave	IIIB	0.5
Ransom Rd	Chicago Ave	Canyon Crest Dr	IIIB	1.2
Sedgwick Ave	Carlton Pl	Prince Albert Dr	IIIB	0.1
Sycamore Canyon Blvd	Box Springs Blvd	Lochmoor Dr	II	0.4
Sycamore Canyon Blvd	Lochmoor St	City Limits	II	0.5
Sycamore Canyon Blvd	El Cerrito Dr	N University Dr	II	0.3
Sycamore Canyon Blvd	Central Ave	El Cerrito Dr	IIB	0.8
University Ave	Iowa Ave	W Campus Dr	IIB	0.5
Victoria Ave	14th St	University Ave	III	0.5
Vine St	14th St	Mission Inn Ave	IV	0.5
S of Lot 4731 Chicago Ave	Chicago Ave	Ottawa Ave	I	0.3
			Total	**21.6**



Diagrams for illustrative purposes only

FIGURE 4-23 RECOMMENDED BIKEWAYS WARD 3

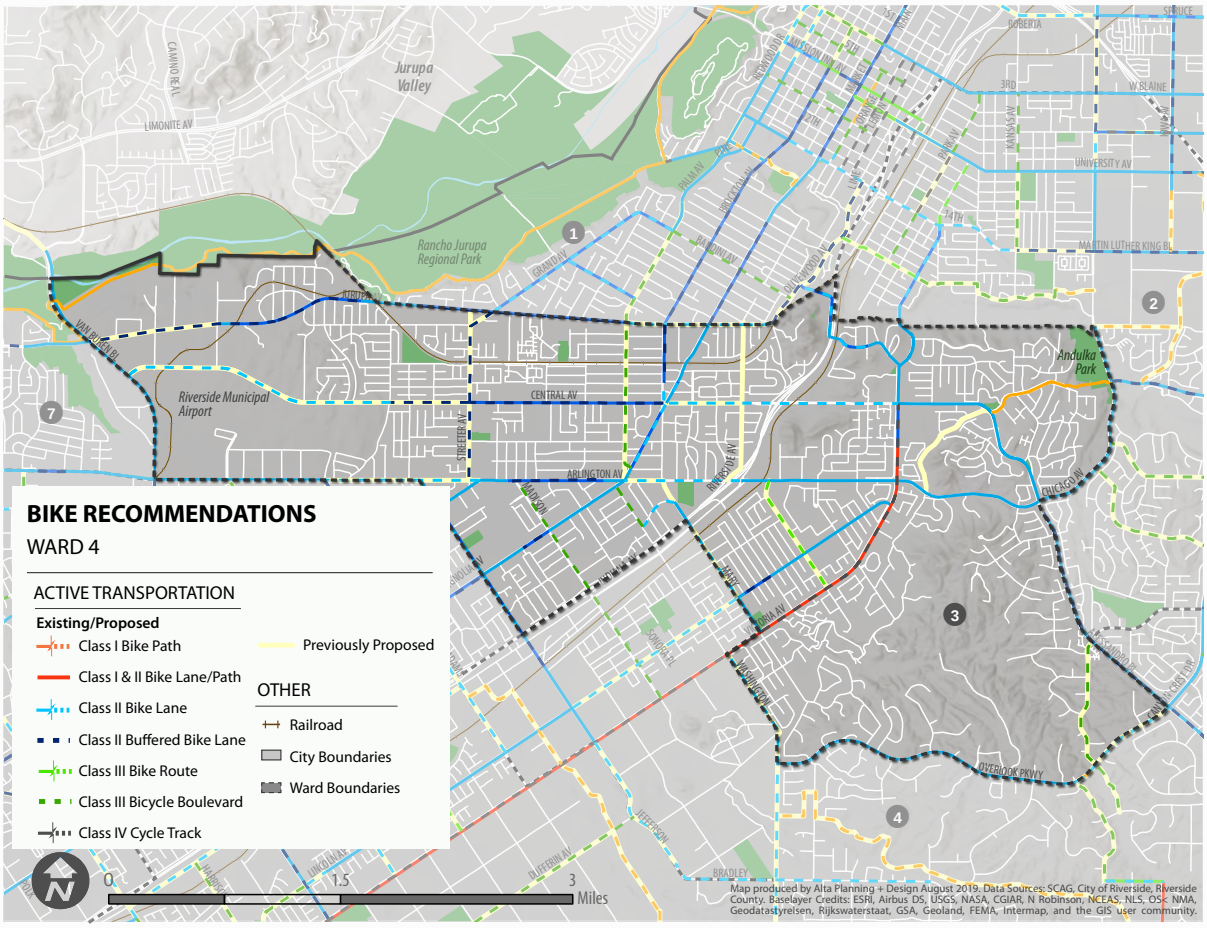
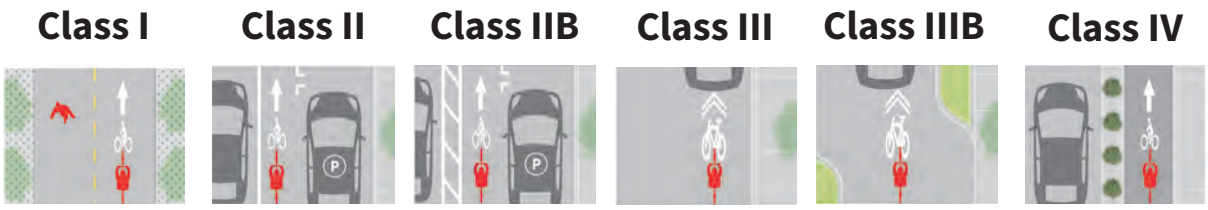


TABLE 4-20 RECOMMENDED BIKEWAYS WARD 3

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Alessandro Blvd	Chicago Ave	Canyon Crest Dr	IIB	1.5
Arlington Av	Adams St	Streeter Ave	II	1.0
Arlington Ave	Indiana Ave	Magnolia Ave	II	0.5
Brockton Ave	Magnolia Ave	Beatty Dr	II	0.2
Central Av	Van Buren Blvd	Hillside Ave	II	1.8
Central Av	Hillside Ave	Streeter Ave	IIB	0.5
Central Ave	Victoria Ave	Brockton Ave	II	1.5
Jurupa Ave	Olivewood Ave	Palm Ave	II	0.9
Jurupa Ave	Van Buren Blvd	Columbus St	IIB	1.3
Madison St	Arlington Ave	SR-91	IIIB	0.9
Magnolia Ave	Brockton Ave	Central Ave	II	0.8
Mary St	Lincoln Ave	Indiana Ave	II	0.5
Maude	Victoria Ave	Arlington Ave	IIIB	0.8

TABLE 4-20 RECOMMENDED BIKEWAYS WARD 3

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Nixon Dr	Brockton Ave	Washington	II	0.3
Palm Av	Tibbetts St	Jurupa Ave	IIIB	1.0
Overlook Pkwy	Crystal View Terrace	Alessandro Blvd	II	0.8
Streeter	Arlington Ave	Jurupa Ave	IIB	1.2
Via Vista Dr	Alessandro Blvd	Overlook Pkwy	IIIB	0.8
Victoria Ave	Washington St	Central Ave	IV	2.1
Washington St	Nixon Dr	Magnolia Ave	IIIB	0.3
			Total	**18.7**



Diagrams for illustrative purposes only

FIGURE 4-24 RECOMMENDED BIKEWAYS WARD 4

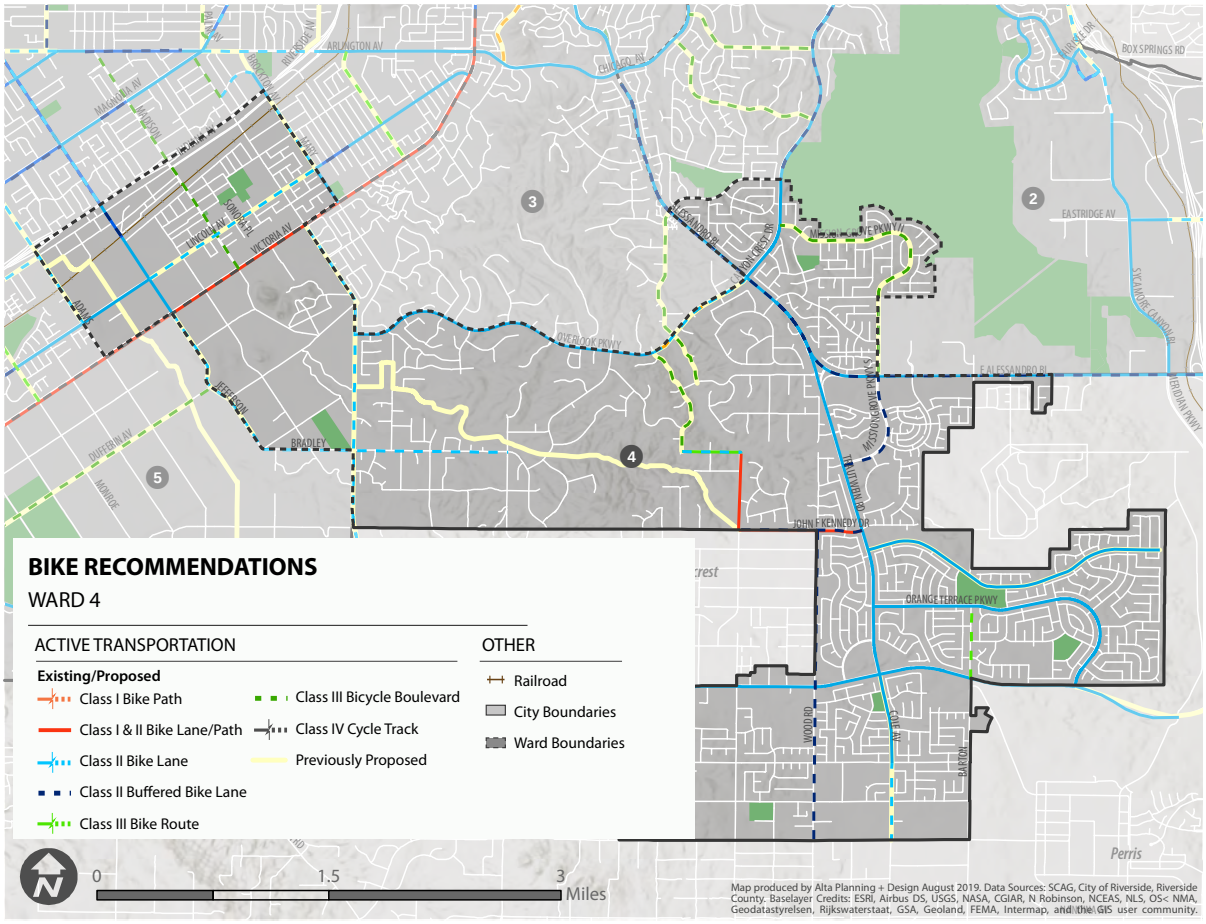


TABLE 4-21 RECOMMENDED BIKEWAYS WARD 4

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Adams St	Indiana Ave	Lincoln Ave	II	0.6
Alessandro Blvd	Via Vista Dr	Alexander St	IIB	2.9
Barton Rd	Van Buren Blvd	Orange Terrace Pkwy	III	0.5
Bradley St	Jefferson St	Harbart Dr	II	1.6
Cactus Ave	Crystal View Terrace	Dauchy Ave	II	0.3
Cole Av	Lurin Ave	Krameria St	II	0.5
Corinthian Way	Via Vista Dr	Berry Rd	IIIB	0.2
Crystal View Terrace	Overlook Pkwy	Cactus Ave	IIIB	0.8
Jefferson St	Victoria Ave	Bradley St	II	1.1
Madison St	Indiana Ave	Victoria Ave	IIIB	0.8
Mary St	Lincoln Ave	Indiana Ave	II	0.5
Mission Grove Pkwy	Canyon Crest Dr	E Alessandro Blvd	IIIB	1.9
Mission Grove Pkwy S	Trautwein Rd	Alessandro Blvd	IIB	0.8

TABLE 4-21 RECOMMENDED BIKEWAYS WARD 4

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Overlook Pkwy	Easterly Terminus	Via Vista Dr	I	0.1
Overlook Pkwy	Dead end	Dead end w/ Sandtrack Rd	I	0.1
Overlook Pkwy	Crystal View Terrace	Alessandro Blvd	II	0.8
Via Vista Dr	Overlook Pkwy	Corinthian Way	IIIB	0.2
Victoria Ave	Adams Ave	Mary St	IV	1.8
Washington St	Victoria Ave	City Limits	II	2.6
Wood St	John F Kennedy Dr	Krameria St	IIB	2.0
			Total	**20.1**

Class I **Class II** **Class IIB** **Class III** **Class IIIB** **Class IV**



Diagrams for illustrative purposes only

FIGURE 4-25 RECOMMENDED BIKEWAYS WARD 5

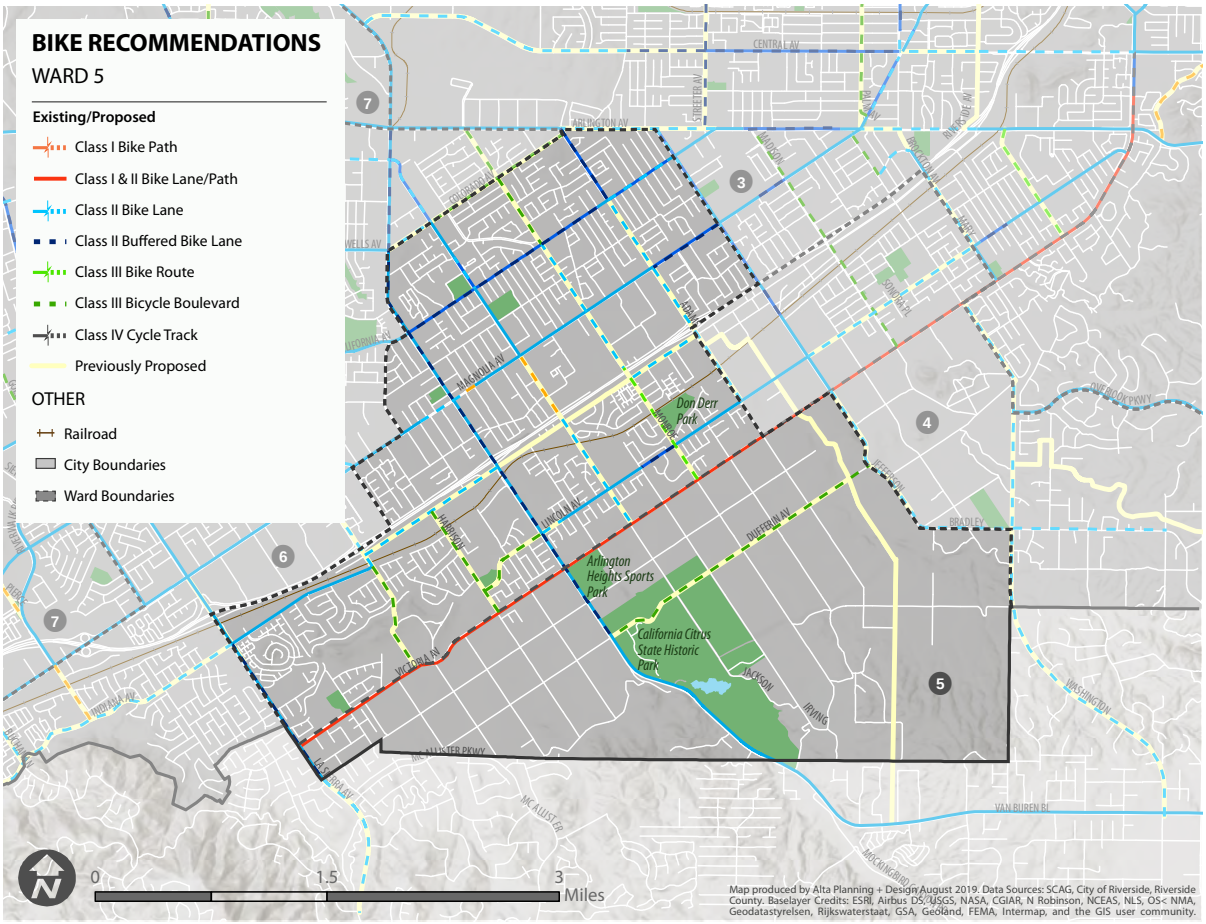
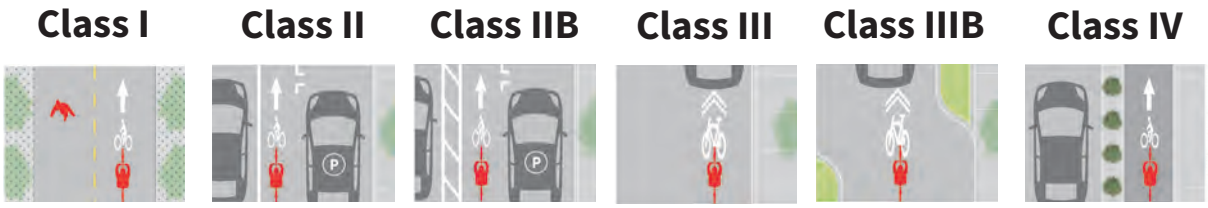


TABLE 4-22 RECOMMENDED BIKEWAYS WARD 5

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Adams St	Lincoln St	California St	II	1.6
Arlington Ave	Jefferson St	Adams St	II	0.6
Bradley St	Jefferson St	Washington St	II	0.6
Colorado Ave	Van Buren Blvd	Jackson St	II	0.3
Colorado Ave	Jackson St	Adams Ave	IIIB	1.0
Dufferin Ave	Van Buren Blvd	Jefferson St	IIIB	2.0
Harrison St	Indiana Ave	Victoria Ave	IIIB	0.8
Indiana Av	Monroe St	Adams St	II	0.5
Indiana Ave	Tyler St	Van Buren Blvd	II	1.0
Jackson St	Diana Ave	Magnolia Ave	I	0.4
Jackson St	Victoria Ave	Diana Ave	II	0.9
Jefferson St	Victoria Ave	Bradley St	II	1.1
La Sierra Ave	Indiana Ave	City Limits	IIB	1.0

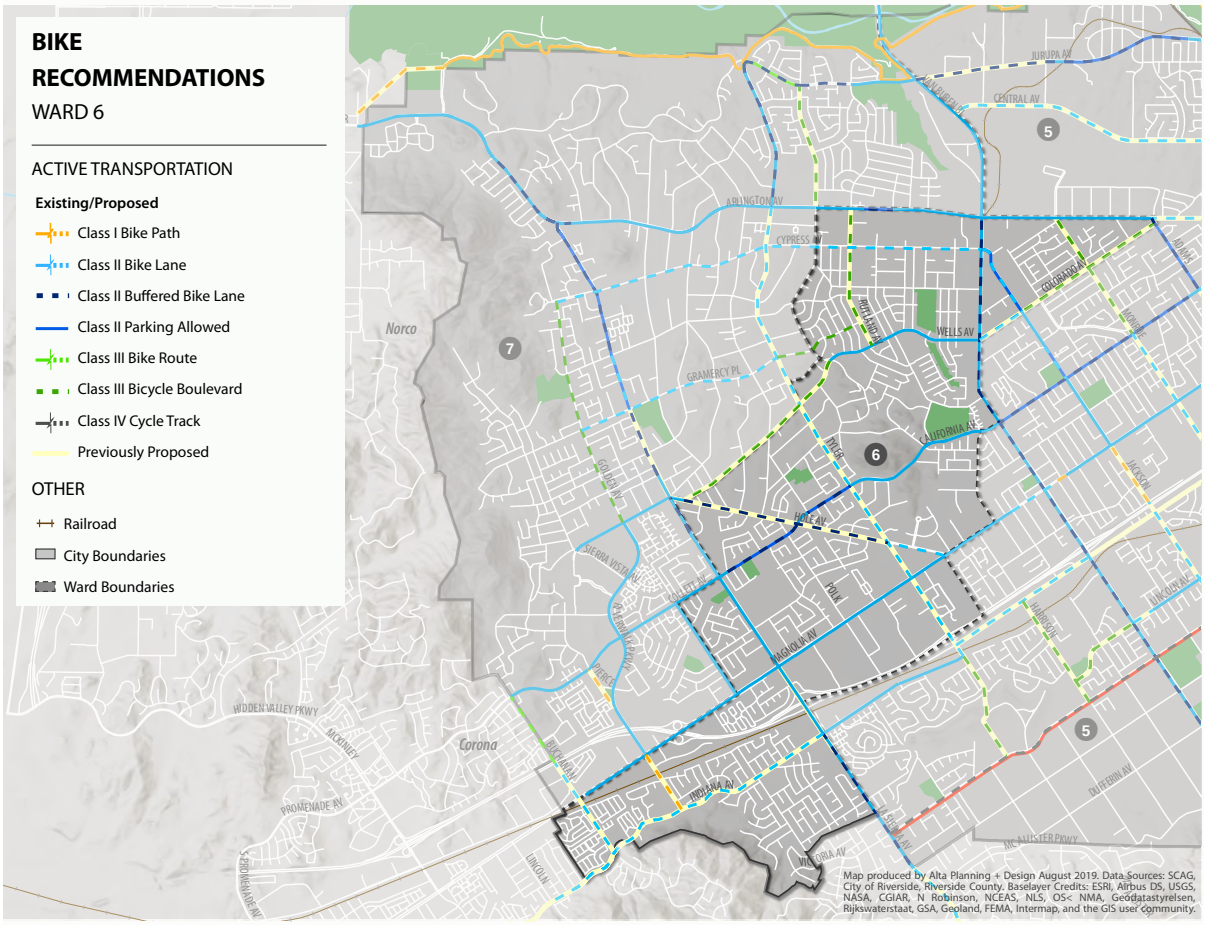
TABLE 4-22 RECOMMENDED BIKEWAYS WARD 5

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Lincoln Av	Van Buren Blvd	Antares Dr	II	0.2
Lincoln Av	Harrison St	Van Buren Blvd	IIIB	0.6
Magnolia Ave	Meyers St	McKenzie St	II	0.4
Monroe St	California St	Diana Ave	II	1.0
Monroe St	California St	Colorado Ave	IIIB	0.5
Tyler St	Indiana Ave	SR-91	II	0.1
Tyler St	Indiana Ave	Victoria Ave	IIIB	0.7
Van Buren Blvd	Victoria Ave	Colorado Ave	IIB	2.9
Victoria Ave	La Sierra Ave	Jefferson St	IV	4.1
Washington St	Hermosa Dr	Bradley St	II	0.5
			Total	**22.8**



Diagrams for illustrative purposes only

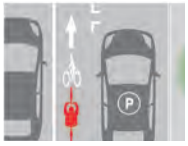
FIGURE 4-26 RECOMMENDED BIKEWAYS WARD 6



Class I



Class II



Class IIB



Class III



Class IIIB



Class IV

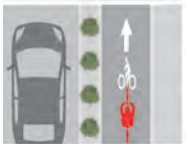
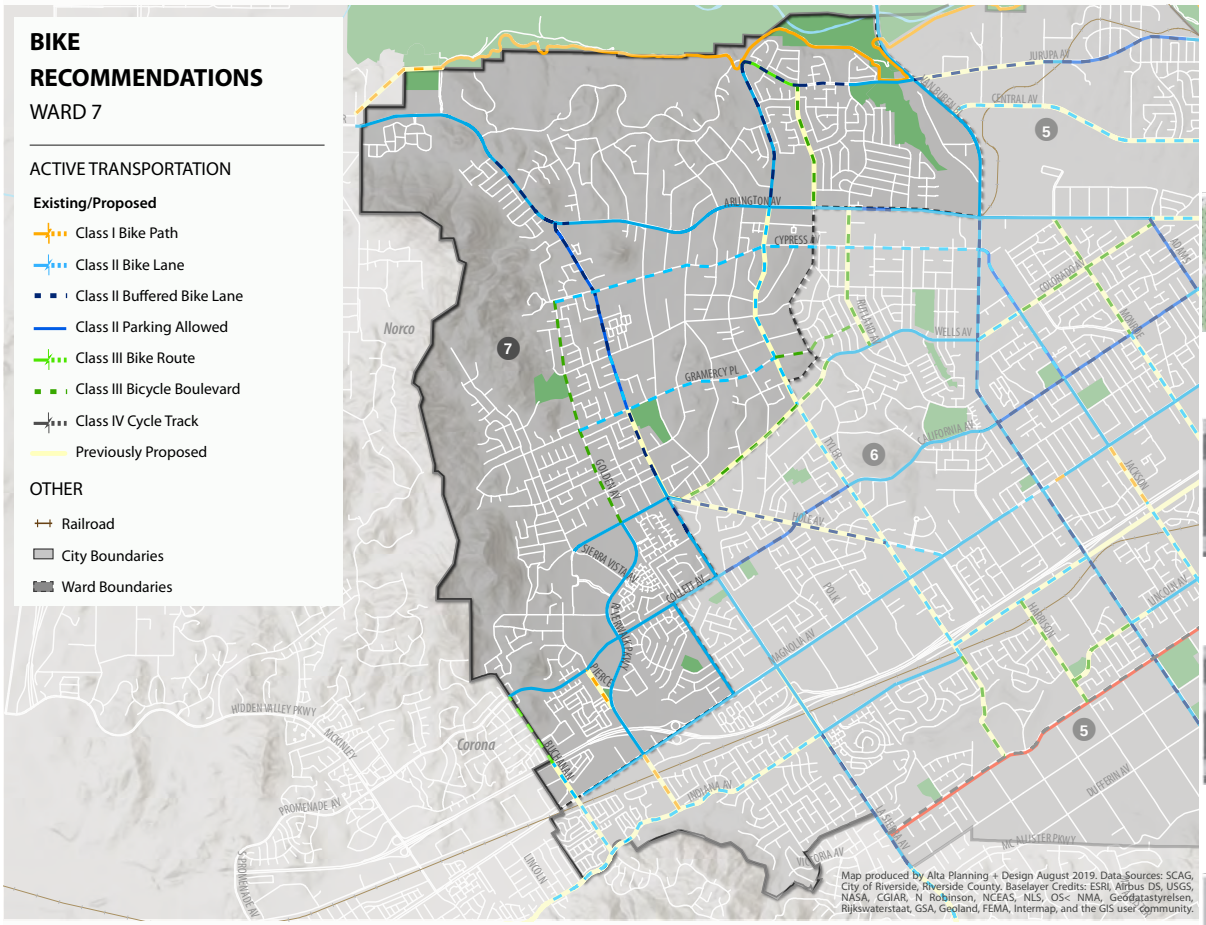


TABLE 4-23 RECOMMENDED BIKEWAYS WARD 6

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Arlington Ave	Logan Ct	Ben Loman Way	IIB	0.2
Buchannan Ave	Indiana Ave	Magnolia Ave	II	0.4
Colorado Ave	Van Buren Blvd	Jackson St	II	0.3
Colorado Ave	Jackson St	Adams Ave	IIIB	1.0
Cypress Ave	Crest Ave	Van Buren Blvd	II	1.1
Gramercy Pl	Crest Ave	Rutland Ave	IIIB	0.4
Hole Av	Wells Ave	Tyler St	IIB	1.4
Hole Ave	Tyler St	Magnolia Ave	II	0.4
Indiana Av	La Sierra Ave	City Limits	II	1.9
La Sierra Ave	Schulyer Ave	Pierce St	IIB	0.3
La Sierra Ave	Indiana Ave	City Limits	II	1.0
Monroe St	Colorado Ave	Arlington Ave	IIIB	0.4
Rutland Ave	Wells Ave	Arlington Ave	IIIB	0.9
Tyler St	SR-91	Hedrick Ave	II	2.0
Van Buren Blvd	California Ave	Jurupa Ave	IIB	3.7
Wells Av	Crest Ave	Hole Ave	IIIB	1.3
			Total	**16.7**

Diagrams for illustrative purposes only

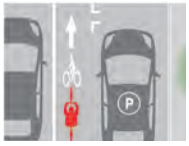
FIGURE 4-27 RECOMMENDED BIKEWAYS WARD 7



Class I



Class II



Class IIB



Class III



Class IIIB



Class IV

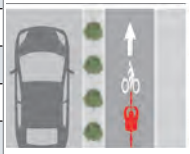


TABLE 4-24 RECOMMENDED BIKEWAYS WARD 7

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)
Arlington Ave	Logan Ct	Ben Loman Way	IIB	0.2
Arlington Ave	Western Ave	Fairhaven Dr	IIB	0.7
Buchannan Ave	SR-91	Magnolia Ave	II	0.3
Buchannan Ave	Collet Ave	SR-91 Overpass	III	0.5
Cypress Ave	Golden Ave	Crest Ave	II	1.7
Golden Ave	Pierce St	Cypress Ave	IIIB	1.5
Gramercy Pl	Tyler St	Crest Ave	IIIB	0.2
Gramercy Pl	Golden Ave	Tyler St	II	1.4
Jurupa Ave	Crest Ave	Rutland Ave	II	0.3
Jurupa Ave	Crest Ave	Tyler St	IIB	0.4
La Sierra Ave	Hole Ave	Gramercy Pl	II	0.3
La Sierra Ave	Schulyer Ave	Pierce St	IIB	0.3
Tyler St	Wells Ave	Arlington Ave	II	1.2
Tyler St	Arlington Ave	Jurupa Ave	IIB	1.0
Wells Av	Hole Ave	Tyler St	IIIB	1.0
			Total	**11.0**

Diagrams for illustrative purposes only

BIKEWAY RECOMMENDATIONS WHERE PARKING IS ALLOWED

There are several corridors throughout the City of Riverside where parking is allowed within the same space as existing bike facilities, which results in conflict areas for bicyclists and vehicles. This issue proves to be very problematic and can push bicyclists into the roadway potentially creating a challenging riding condition. As such, bike lane designs that involve parking within the bike lane is no longer favored or recommended. The planning team conducted a thorough search where these issues exist and prepared separate recommendations for each segment.

Three types of solutions were identified to address the road segments which allowed parking, they include:

- **Restripe** to accommodate both vehicle parking and a bicycle facility clearly delineating each mode from the other, a road diet may be required.
- **Remove parking** to accommodate the existing bike facility. Availability of parking, right of way widths, and level of traffic stress were key factors in this solution.
- **Restrict parking** to certain times of day allowing for bike accessibility during day hours (e.g. 7am- 6pm) and allow residents to park in spaces at night. The City will need to identify the most appropriate times to implement this strategy.

The following recommendations are best practices for repaving and restriping for a shared parking and bike facility configuration. It is understood that the ideal configuration that is presented may not always be the most viable solution for each stakeholder group. It may result in the removal of a bike facility if a shared configuration is not feasible.

Figure 4-28 and Table 4-25 provide a description and location of these recommendations.



Photo Caption: Cars parked in bike lane along Central Ave (Google).



Photo Caption: Cars parked in bike lane along Mission Ave (Google).

FIGURE 4-28 BIKEWAY RECOMMENDATIONS WHERE PARKING IS ALLOWED

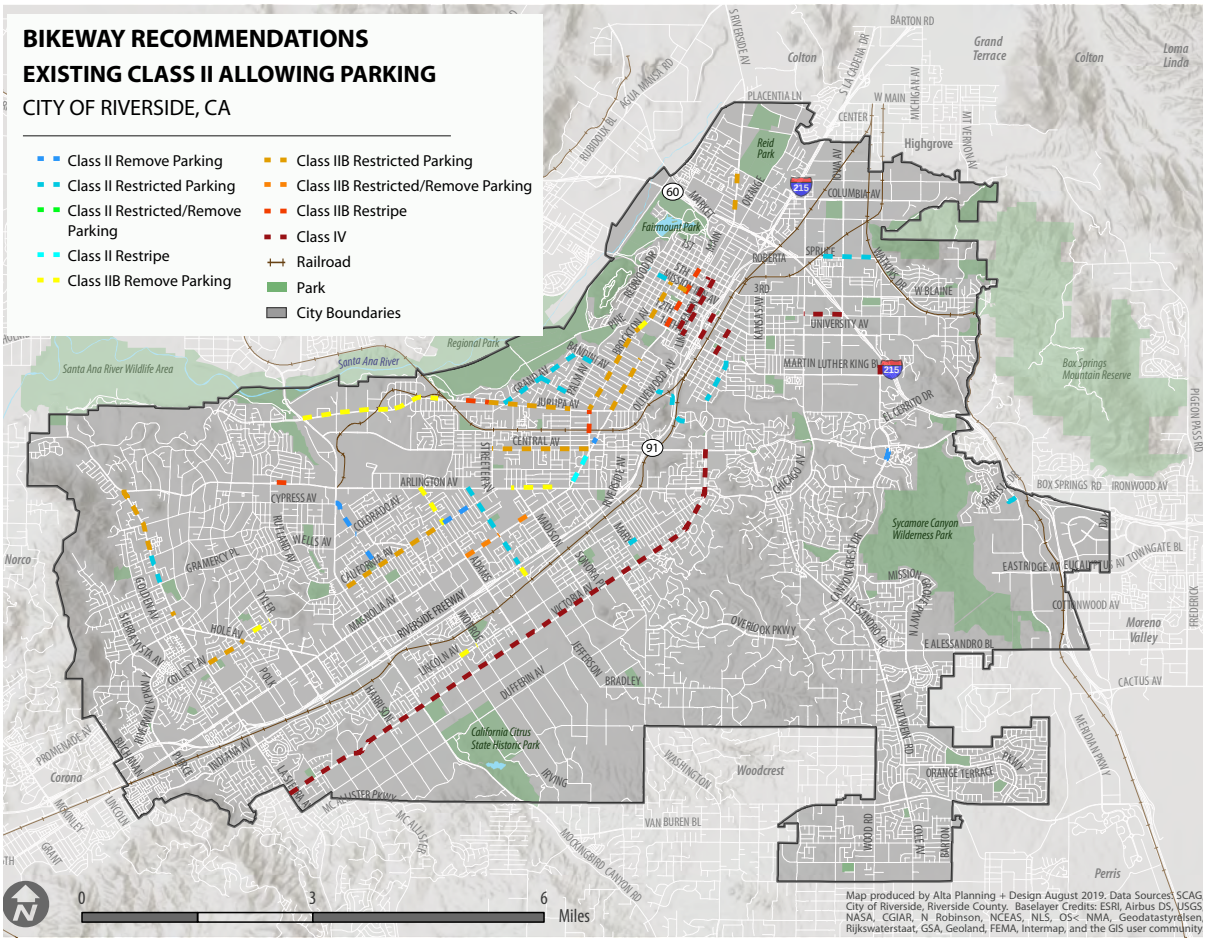


TABLE 4-25 BIKEWAY RECOMMENDATIONS WHERE PARKING IS ALLOWED

CORRIDOR	FROM	TO	FACILITY TYPE	ACTION	LENGTH (MILES)
Arlington Av	Ben Lomand Way	Logan Ct	II	Restripe to separate bike lane from parking lane. 8' parking lane, 5' bike lane and 2' buffer, 12' travel lane.	0.18
California Av	Adams St	Via San Luis	II	Consider removal of parking along segment. Houses don't front the street, side street parking available.	0.46
Canyon Crest Dr	Via Zapata	Central Ave	II	Consider removal of parking along segment. Apartment parking available on site along segment.	0.19
Collett Ave	Draxel Ave	Hole Ave	II	Candidate for restricted parking.	0.55
Grand Ave	Jurupa	Palm Ave	II	Candidate for restricted parking.	1.39

TABLE 4-25 BIKEWAY RECOMMENDATIONS WHERE PARKING IS ALLOWED

CORRIDOR	FROM	TO	FACILITY TYPE	ACTION	LENGTH (MILES)
Jackson St	Colorado Ave	Van Buren Blvd	II	Candidate for restricted parking.	0.50
Jackson St	Delano Dr	California Ave	II	Candidate for restricted parking.	0.25
Jefferson St	Arlington	The Aspens Driveway	II	Candidate for restricted parking, pick up and drop off. Upgrade bike lane striping - green lane and conflict striping.	0.62
Jefferson St	Magnolia	SR91 Under-pass	II	Candidate for restricted parking, pick up and drop off. Upgrade bike lane striping - green lane and conflict striping.	0.46
La Sierra Av	Gramercy Pl	Campbell Ave	II	Candidate for restricted parking. Upgrade bike lane striping - green lane and conflict striping.	0.37
La Sierra Av	Doverwood Dr	Mountain Ave	II	Candidate for restricted parking. Upgrade bike lane striping - green lane and conflict striping.	0.05
Lochmoor Dr	Sycamore Can-yon Blvd	Vista Imperio Apartments Driveway	II	Candidate for restricted parking, or consider removal of bike facility.	0.22
Magnolia Av	Sunnyside Dr	Beatty Dr	II	Consider removal of parking along segment. Upgrade to a 6' bike lane with 2' buffer and 12' travel lanes.	0.07
Magnolia Av	Tibbetts	Brockton Ave	II	Restripe center turn lane to turn pockets to accommodate 7' parking lane, 5' bike lane and 12' and 11' travel lanes.	0.40
Mission Inn Ave	Locust St	Redwood Dr	II	Candidate for restricted parking. Upgrade bike lane striping - green lane and conflict striping.	0.26
Panorama Rd	Hallwood Ave	Rockhill Way	II	Candidate for restricted parking.	0.20
Panorama Rd	Olivewood Ave	The Hills drive-way	II	Candidate for restricted parking. Upgrade bike lane striping - green lane and conflict striping.	0.38
Rubidoux Ave	Palm Ave	Grand Ave	II	Candidate for restricted parking. Upgrade bike lane striping - green lane and conflict striping.	0.50
Spruce St	Atlanta Ave	Watkins Dr	II	Candidate for restricted parking along segment.	0.66
Victoria Ave	Woodbine St	14th St	II	Candidate for restricted parking. Upgrade bike lane striping - green lane and conflict striping.	0.58
Adams St	California Ave	Arlington Ave	IIB	Candidate for restricted parking along segment. Restripe to accommodate 5' bike lane and a 2' buffer.	0.58

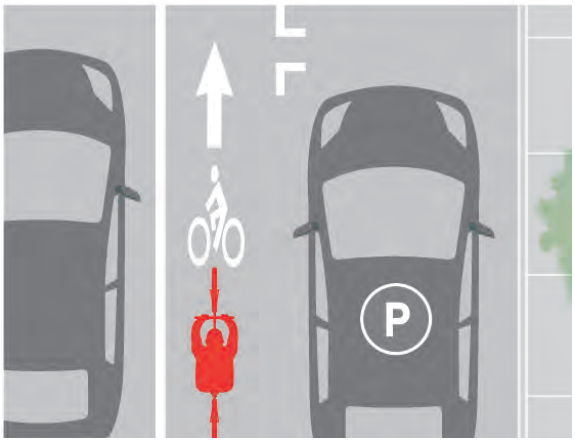
TABLE 4-25 BIKEWAY RECOMMENDATIONS WHERE PARKING IS ALLOWED

CORRIDOR	FROM	TO	FACILITY TYPE	ACTION	LENGTH (MILES)
Arlington Av	Barcelona Way	El Padra St	IIB	Restripe to accommodate 6' bike lane and a 2' buffer. Keep restricted parking times.	0.63
Brockton Av	Beatty Dr	Jurupa	IIB	Restripe to separate bike lane from parking lane. 7' parking lane, 6' bike lane and 1' buffer, 12' travel lane.	0.37
Brockton Av	Jurupa Ave	Tequesquite	IIB	Candidate for restricted parking along segment to allow for peak period parking.	1.24
Brockton Av	Tequesquite Ave	14th St	IIB	Remove signs that allow parking. Restripe to accommodate 5' bike lane and a 2' buffer.	0.20
Brockton Av	14th St	Mission Inn Ave	IIB	Candidate for restricted parking along segment to allow for peak period parking.	0.53
California Av	Van Buren Blvd	Mescale Rd	IIB	Candidate for restricted parking along segment to allow for peak period parking.	1.46
California Av	Mobley Ave	Tyler St	IIB	Consider removal of parking along segment. Upgrade to a 6' bike lane with 2' buffer, reduce lane size to 12'.	0.33
Central Ave	Brockton Av	Streeter Ave	IIB	Candidate for restricted parking along segment to allow for peak period parking.	1.25
Jefferson St	Indiana Ave	Railroad tracks	IIB	Keep restricted parking along segment to allow for peak period parking. Consider removal of bike facility.	0.20
Jurupa Ave	Rio Rancho Way	Deerfield Rd	IIB	Restripe to accommodate 7' parking lane, 6' bike lane and 3' buffer, 11' travel lanes.	0.30
Jurupa Ave	Deerfield Rd	Palm Ave	IIB	Candidate for restricted parking.	1.06
Jurupa Ave	Columbus St	Florence St	IIB	Remove parking along segment. Industrial area with fast speeds	0.60
La Sierra Av	Campbell Ave	Arlington Ave	IIB	Candidate for restricted parking along segment to allow for peak period parking.	0.94
Lincoln Av	Irving St	Monroe St	IIB	Candidate for restricted parking along segment to allow for peak period parking.	0.26
Lincoln Av	Bautista St	Jane St	IIB	Remove signs that allow parking. All homes are corner lot and have on-street parking on side streets.	0.21
Magnolia Av	Adams St	Jefferson St	IIB	Candidate for restricted parking on the north side of the street. Consider removal of parking on the south side of the street.	0.51

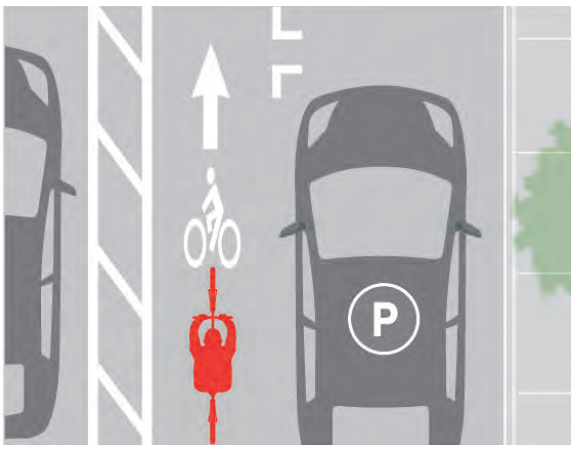
TABLE 4-25 BIKEWAY RECOMMENDATIONS WHERE PARKING IS ALLOWED

CORRIDOR	FROM	TO	FACILITY TYPE	ACTION	LENGTH (MILES)
Magnolia Av	Jurupa	Ramona Dr	IIB	Keep restricted parking along segment to allow for peak period parking.	0.76
Magnolia Av	Cortez St	Madison St	IIB	Keep restricted parking on the north side of the street. Consider removal of parking on the south side of the street.	0.20
Main St	North Freemont ES driveway	Strong St	IIB	Candidate for restricted parking along segment to allow for peak period parking.	0.13
Main St	Lofton Pl	Columbia Ave	IIB	Candidate for restricted parking along segment to allow for peak period parking.	0.32
Market St	14th St	1st St	IIB	Restripe to separate bike lane from parking lane with the parking lane on the outside. 8' parking lane, 6' bike lane, 1' buffer between parking and bike lane. High parking turnover	0.99
Mission Inn Ave	Market	Chestnut St	IIB	Candidate for restricted parking along segment to allow for peak period parking.	0.16
TOTAL					**21.5**

Class II Bike Lane



Class IIB Buffered Bike Lane



Diagrams for illustrative purposes only

Programmatic Recommendations

SAFE ROUTES TO SCHOOL RECOMMENDATIONS

SRTS programs foster collaboration between parents, school staff, school districts, and local agencies to identify and remedy deterrents and impediments to walking and cycling as well as safety concerns along routes to/from school in an effort to enhance safety and promote student walking and cycling. A crucial role of the City in the SRTS program includes the maintenance and upgrade of infrastructure on public streets along routes to/from public and private schools to create safe and inviting pedestrian and cyclist environments and work in partnership with the Riverside Police Department to deter and enforce unsafe behaviors.

Riverside County Department of Public Health Injury Prevention Services received Safe Routes to School Cycle 1 funds to provide pedestrian and bicycle education and encouragement activities at specific schools in the City of Riverside. The following are the SRTS recommendations for Riverside.

1. Expand the number of Safe Routes to School site assessments so that every school in Riverside receives a traffic safety assessment with a goal of performing assessments at each public school every five years.
2. Partner with local organizations such as Inland Empire Biking Alliance or the Riverside County Department of Public Health Injury Prevention Department to deliver education and encouragement programs at Riverside schools.
3. Partner with school districts in Riverside and County Health to organize and fund events such as International Walk and Roll to School day.
4. Reduce the speed limit to 15mph on Local roadways, in school zones that experience high speeds per speed count data.
5. Use targeted traffic enforcement in school zones.
6. Continue to implement bicycle and pedestrian recommendations developed from school site assessments.
7. Create maps which show marked school pedestrian crossings, RRFB devices, and bike lanes in close proximity to schools for parents and students to know the easiest and most comfortable way to get to school without driving.

RESOURCES

Riverside County Department of Public Health's Injury Prevention Department coordinates and receives funding for Safe Routes to School programs: https://www.rivcoips.org/Safe-Routes-to-School

Additional resources can be found on the Safe Routes Partnership website:

https://www.saferoutespartnership.org/



Photo Caption: A "Walking School Bus" initiative offers kids a fun and safe way to get to school.



Photo Caption: Student Valet program at Twinhill Elementary School in Riverside, CA

SAFE ROUTES TO TRANSIT RECOMMENDATIONS

Closing the first/last mile gap around Metrolink stations and RTA transit stops can expand the number of trips that can be made using transit, encouraging more people to use those services for both commuting and service trips. Currently, neither the Santa Ana River Trail nor the Victoria Ave Trail connect to any Metrolink stations and two of the three stations (Hunter Park and La Sierra) are not well connected for bicyclists and pedestrians.

The proposed improvements will enhance access to all three Metrolink stations. The La Sierra Station has proposed a suite of intersection improvements at La Sierra Ave and Indiana Ave with improvements to the on-street bicycle facilities along La Sierra Ave including adding a buffer to the existing Class II. The proposed Class IV facility along Vine St will improve on-street connections and enhance bicycle connectivity to the Downtown Metrolink Station. This proposed facility will provide greater comfort and accessibility from the two arterials (14th St and University Ave) from which the station is accessed. The Hunter Park Metrolink s=Station will also benefit from on-street improvements. Sidewalks are proposed along Rustin Ave connecting pedestrians to the station, along with an upgraded Class II facility with buffer along Iowa Ave, which is proposed as the main north to south bike connection in this area.



Photo Caption: Riverside - La Sierra Metrolink Station.



Photo Caption: Riverside -Downtown Metrolink Station.

SHARED MOBILITY STUDY

Mobility options in many cities have changed drastically in recent years with the rise of bike share programs, transportation network companies (TNCs) such as Lyft and Uber, micro transit, and autonomous vehicles. Shared mobility, micro-mobility, and on-demand mobility are likely to continue being part of our transportation landscape, and often align with our goals of reducing household transportation costs and improving access.

Although called "bikeways," such facilities are frequently used not just by people riding bikes, but also by other small-wheeled devices such as mobility scooters, skateboards, roller skates, and more. Further, bikeways may continue to be used by new modes such as e-scooters. California Vehicle Code also requires pedestrians use bike lanes if the sidewalk is unavailable.

Riverside previously participated in a docked bike share system, which ended in 2020. A separate, more detailed shared mobility service study can help the City evaluate potential new systems for bikes and/or scooters. The study could build shared objectives around increased shared mobility services, and plan for data sharing and operational requirements for any additional shared mobility operators. This study can ensure that any future shared mobility services operate within a framework of equity, affordability, and broad geographic distribution.



Photo Caption: People riding scooter rentals in Venice, CA.

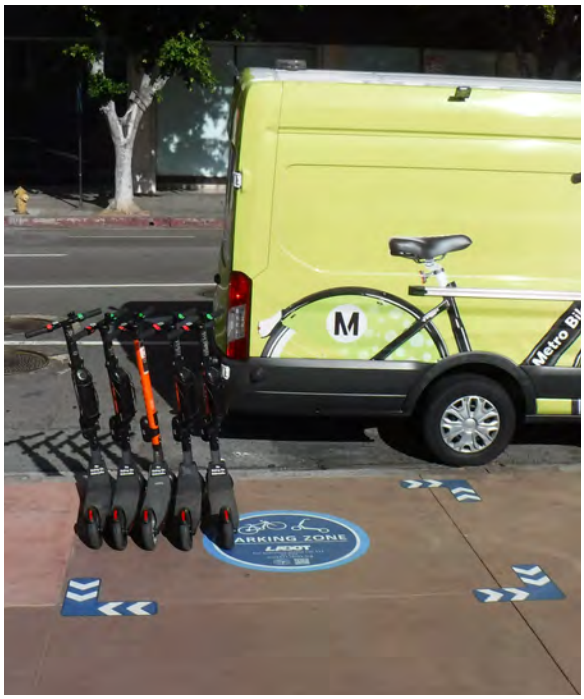


Photo Caption: Scooter drop zone in Downtown Los Angeles, CA.

TRAILS MASTER PLAN NETWORK

The existing trail heads, trail crossings, and proposed primary trails within the City of Riverside were reviewed when developing the bike and pedestrian recommendations as shown in Figure 4-29. One of the goals of this Plan is to create on-street connections from bike facilities to trail facilities for a truly connected transportation and recreation network. The major trail networks within the City include:

- Santa Ana River Trail
- Victoria Ave
- Gage Canal
- La Sierra Hills

Each of these areas/trails within the City were analyzed for trail connectivity and trail access from the proposed on-street network.

Trails Master Plan available for trails related information and recommendations.



Photo Caption: Victoria Ave walking path and Class II bike lane.

SANTA ANA RIVER TRAIL

- 3 - Class II Bike Lane Connections
- 1 - Pedestrian Improvement

VICTORIA AVE

- 3 - Class II Bike Lanes
- 3 - Class III Bike Boulevard Connections

GAGE CANAL

- 3 - Class II Bike Lanes and
- 1 - Class IV Protected Bike Lane
- 1 - Pedestrian Improvement

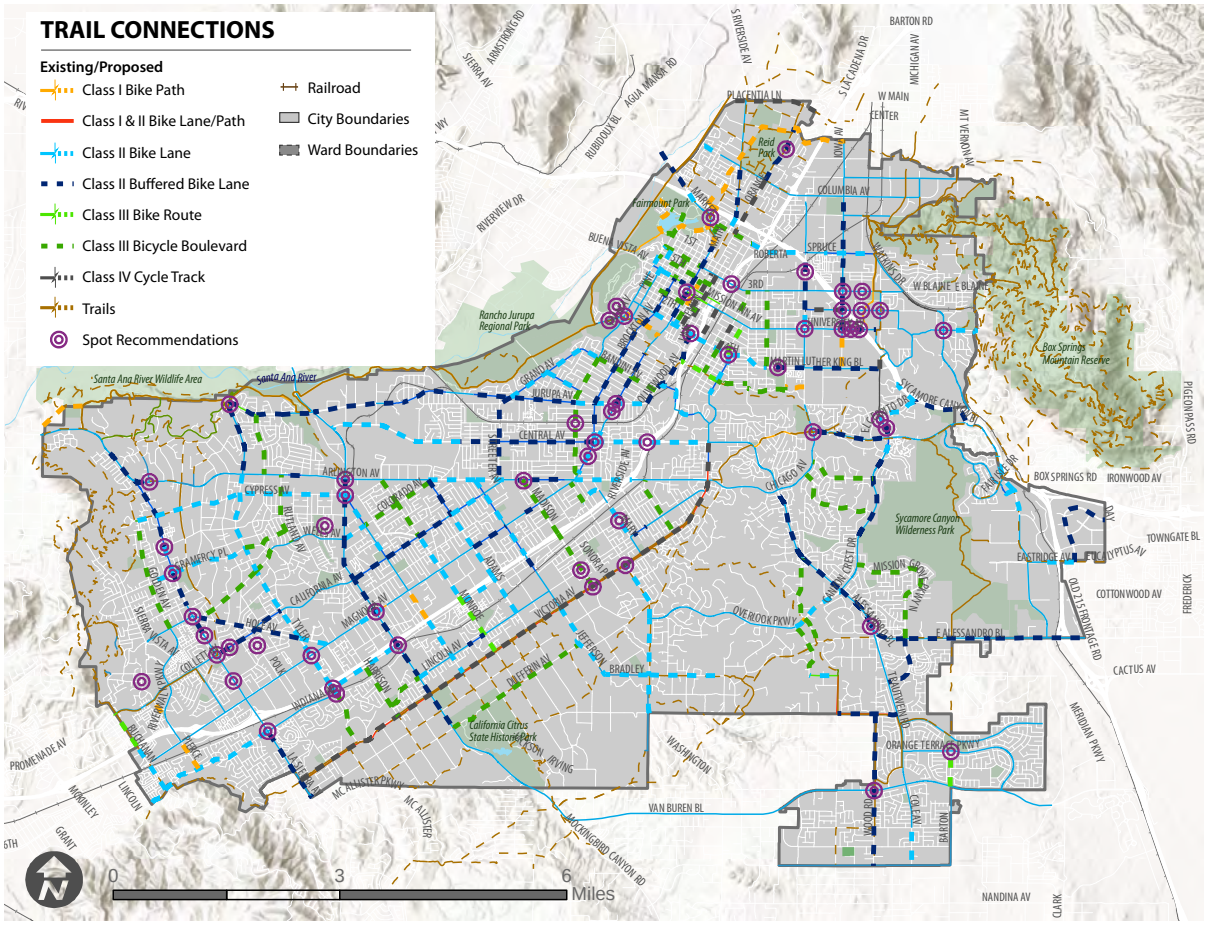
LA SIERRA HILLS

- 2 - Class II Bike Lanes
- 1 - Class III Bike Boulevard Connections
- 1 - Pedestrian Improvement



Photo Caption: Gage Canal crossing at Washington St

FIGURE 4-29 TRAIL CONNECTIVITY



REGIONAL CONNECTIONS

Ensuring connection of recommended bikeway improvements to regional trails, destinations, and transit are goals of this Plan. Previous regional planning efforts have identified the regional corridors and priority projects for the Western Riverside region. Many of these corridors and trails are on-street and coincide with the existing bicycle network, however, a number do not. For the bicycle facilities that currently exist on a regional corridor, the strategy focused on the upgrade of facilities when possible to upgrade the facility when possible, such as adding buffers to Class II facilities (e.g. La Sierra Ave) and improving and creating new connections to these corridors. Along Arlington Ave which serves as major east west corridor through Riverside, recommendations include eight proposed bikeway connections as well as several proposed upgraded segments along the corridor. Other regional corridors and trails include:

- La Sierra Ave
- Van Buren Blvd
- Magnolia Ave
- Arlington Ave
- Box Springs Blvd
- Santa Ana River Trail

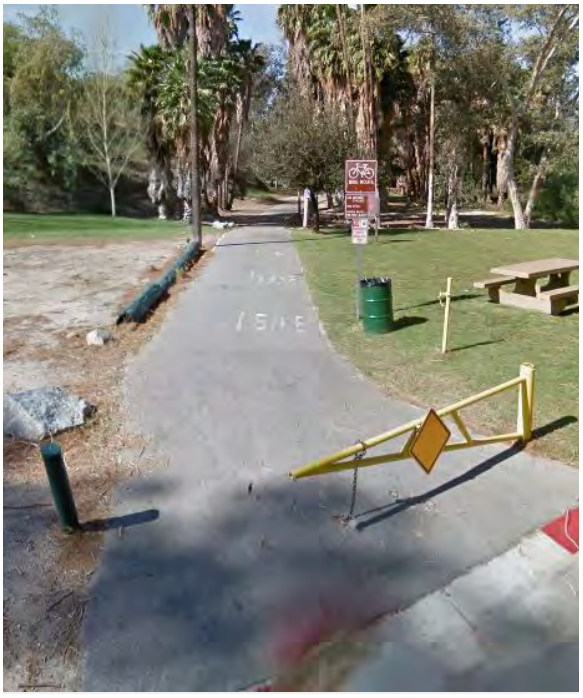


Photo Caption: Santa Ana River Trail access at Fairmont Park.



Photo Caption: Class IV bike facility along Magnolia Ave.

WAYFINDING

A bicycle network wayfindng system and guide cyclists consists of comprehensive signing and/or pavement markings to guide people to key destinations. Wayfinding signs direct bicyclists along the existing bicycle network and to important community destinations such as libraries, schools, parks, shopping districts, and civic buildings. Wayfinding is an important tool which assists cyclists in easily and efficiently navigating throughout Riverside. Signs along the bicycle network should indicate the direction of travel, the locations of major destinations, and the time/distance to these destinations along the network. Riverside currently has one wayfinding guided 5.16 mile Downtown Bicycle Loop, but does not have a consistent wayfinding sign program implemented throughout the remainder of the City's bicycle network.

This program could serve both wayfinding and safety purposes by helping users to:

- Become familiar with the network
- Identify the best routes to destination
- Understand timing and distances to their destinations

Wayfinding Recommendation: Develop a Comprehensive Wayfinding Program

The City of Riverside can develop and implement a comprehensive wayfinding program for bicyclists, integrating this program with Metrolink stations, downtown wayfinding or branding initiatives, and signage along the Santa Ana River Trail and other regional trail systems. The City should develop a wayfinding plan in order to involve the community in the creation of a design unique to Riverside which will identify:



Photo Caption: Existing signage for the Downtown Bike Loop.

- Sign locations
- Sign type - what information should be included and design features
- Key destinations to be highlighted on each sign
- Approximate distance and/or travel time to each destination
- Landscaping
- Public art



Photo Caption: Example of pavement marking bicycle wayfinding.

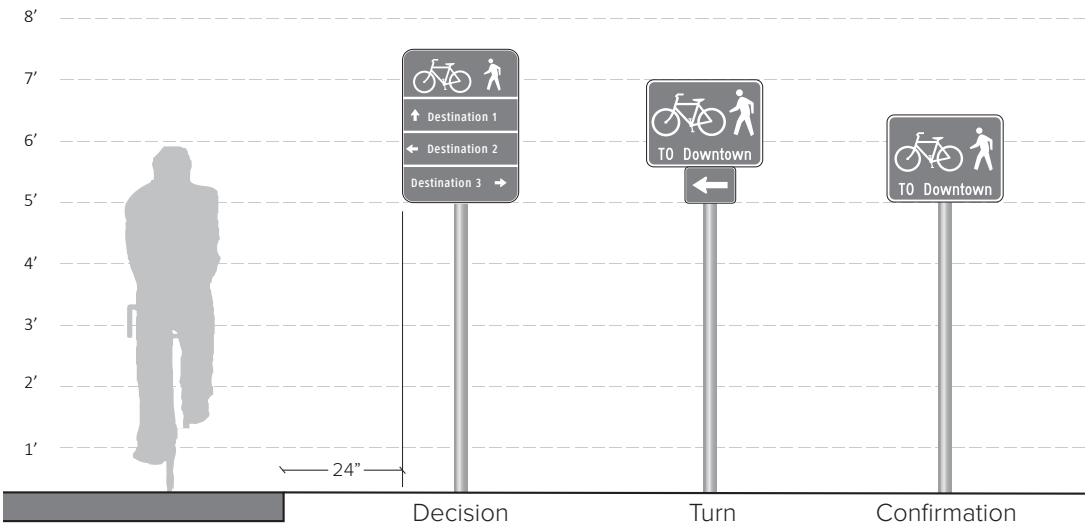


Photo Caption: Typical navigational signage.

AVERAGE DAILY TRAFFIC/VEHICLE MILES TRAVELED BENEFITS

Fossil-fuel driven transportation generates the largest share of greenhouse gas (GHG) emissions of any economic sector in the United States, amounting to almost 30% of all GHG emissions and surpassing those generated from electricity production and industry.[1]

Biking and walking cause no direct air or water pollution, require minimal land use impacts, and emit negligible noise and light pollution. Bicyclists and pedestrians occupy less space than cars and help reduce demand for road space and parking, freeing up land for public space, buildings, food production, and housing. Replacing driving trips with biking or walking trips reduces emissions associated with mobility, translating into less carbon dioxide, nitrogen oxides, hydrocarbons, and other pollutants in the air.

Implementation of this Plan not only reduces our contribution to climate change, but will also enhance our resilience to it. Creating viable alternatives to private vehicles reduces pressure on road infrastructure and provides options for people to remain mobile when other transportation modes are disrupted by climate events. It will also improve the health of residents who are vulnerable to asthma or other chronic respiratory diseases associated with air pollution.



Photo Caption: Bike commuters in Los Angeles, CA.

1 United States Environmental Protection Agency. *Sources of Greenhouse Gas Emissions*. Accessed May 28, 2019, https://www.epa.gov/ghgemissions/sources-greenhouse-gas-emissions.

Section 4.7:
Funding Strategies



Funding Strategies

A VARIETY OF SOURCES EXIST TO FUND BICYCLE AND PEDESTRIAN INFRASTRUCTURE PROJECTS, PROGRAMS, AND STUDIES. LOCAL AND REGIONAL FUNDING SOURCES THAT CAN BE USED FOR CONSTRUCTION OR MAINTENANCE OF BICYCLE OR PEDESTRIAN IMPROVEMENTS, ALONG WITH COMPETITIVE GRANT PROGRAMS, ARE DESCRIBED BELOW.



Photo Caption: Resident walking in downtown Riverside.

Local and Regional Funding Sources

BEYOND Framework Fund Program

The BEYOND launched in 2015 to support member agency efforts to improve quality of life in Western Riverside County. Over the two rounds of the Program, $4.1 Million has been awarded to member jurisdictions to support 83 projects. Each of these projects corresponds to at least one of the goals outlined by WRCOG's Economic Development & Sustainability Framework. These goals help steer a project's efforts to enhance local issues as they relate to the economy, education, health, energy & environment, transportation, and water initiatives.

Funds are programmed by the Western Riverside Council of Governments (WRCOG).

RIVERSIDE COUNTY COMMUNITY IMPROVEMENT DESIGNATION (CID) FUNDS

Each member of the Board of Supervisors has an approved CID allocation to be spent during any given fiscal year. CID funds are intended to augment the efforts of community organizations, non-profits, and government agencies to benefit residents, neighborhoods, and communities in Riverside County. Awards can be used to support programs, capital projects, and fundraising events or activities. The final and annual written reports shall include a brief narrative regarding the project, balance sheet and documentation of expenditures. The County shall require the recipient to return any funds not spent or documented per the signed agreement.

Funds are programmed by Riverside County Board of Supervisors.

MEASURE A

Measure A provides Riverside County's first half-cent sales tax for transportation improvements. This Measure is a proactive response to growing congestion by spelling out a list of transportation projects to address the problem. Funds go back to each of three geographic areas within Riverside County: Western Riverside County, Coachella Valley, and Palo Verde Valley, in proportion to the sales taxes they contribute. Each of the three geographic areas has its own transportation program.

Funds are programmed by the Riverside County Transportation Commission.

TRANSPORTATION UNIFORM MITIGATION FEE REGIONAL ARTERIAL ROADS (TUMF)

TUMF regional arterial funds are used for roadway improvement projects and Community Environmental Transportation Acceptability Process projects. To date, approximately $135 million has been programmed for TUMF regional arterial projects.

Funds are programmed by the Riverside County Transportation Commission.

TDA ARTICLE 3 BICYCLE AND PEDESTRIAN FACILITIES PROGRAM

Each year, 2% of the Local Transportation Fund (LTF) revenue is made available for bicycle and pedestrian facility projects under TDA Article 3, also known as SB 821. Eligible projects include sidewalks, access ramps, bicycle facilities, and bicycle plan development. A Call for Projects is issued biennially in February, and funds are allocated each June. In June 2019, RCTC awarded approximately $3.9 million to pedestrian and bicycle projects in Riverside County. RCTC will release its next call for projects in February 2021 for an estimated $3.5 million in available funding.

SUSTAINABILITY PLANNING GRANT PROGRAM

Projects are recommended by the Riverside County Transportation Commission. This grant is intended to support SCAG member jurisdictions in planning and non-infrastructure projects that promote safety and encourage people to walk and bicycle and to seed active transportation concepts that provide a preliminary step for future applicants. Active transportation projects including bicycle, pedestrian and Safe Routes to School Plans are limited to a maximum of $200,000 in funding.

Funds are programmed by the Southern California Association of Governments (SCAG).

Competitive Grant Programs

CALIFORNIA ACTIVE TRANSPORTATION PROGRAM (ATP)

California's Active Transportation Program funds infrastructure and programmatic projects that support the program goals of shifting vehicular trips to walking and bicycling, reducing greenhouse gas emissions, and improving public health. Competitive application cycles occur every one to two years, typically in the spring or early summer. Eligible projects include the construction of bicycling and walking facilities, new or expanded programmatic activities, or projects that include a combination of infrastructure and non-infrastructure components. Typically, no local match is required, though extra points are awarded to applicants who do identify matching funds.

Funds are programmed by the California Transportation Commission (CTC).

SUSTAINABLE TRANSPORTATION PLANNING GRANTS

Caltrans Sustainable Transportation Planning Grants are available to communities for planning, study, and design work to identify and evaluate projects, including conducting outreach or implementing pilot projects. Communities are typically required to provide an 11.47 percent local match, but staff time or in-kind donations are eligible to be used for the match provided the required documentation is submitted.

Funds are programmed by Caltrans.

HIGHWAY SAFETY IMPROVEMENT PROGRAM

Caltrans offers Highway Safety Improvement Program (HSIP) grants every one to two years. Projects on any publicly owned road or active transportation facility are eligible, including bicycle and pedestrian improvements. HSIP focuses on projects that explicitly address documented safety challenges through proven countermeasures, are implementation-ready, and demonstrate cost-effectiveness.

Funds are programmed by Caltrans.

SOLUTIONS FOR CONGESTED CORRIDORS PROGRAM

Funded by SB1, the Congested Corridors Program strives to reduce congestion in highly-traveled and congested corridors through performance improvements that balance transportation improvements, community impacts, and environmental benefits. This program can fund a wide array of improvements, including bicycle and pedestrian facilities. Eligible projects must be detailed in an approved corridor-focused planning document. These projects must include aspects that benefit all modes of transportation using an array of strategies that can change travel behavior, dedicate ROW for bikes and transit, and reduce vehicle miles traveled.

Funds are programmed by Caltrans.

OFFICE OF TRAFFIC SAFETY

Under the Fixing America's Surface Transportation (FAST) Act, five percent of Section 405 funds are dedicated to addressing non-motorized safety. These funds may be used for law enforcement training related to pedestrian and bicycle safety, enforcement campaigns, equipment projects for non-federally funded roadways and public education and awareness campaigns.

Funds are programmed by the California Office of Traffic Safety.

AFFORDABLE HOUSING AND SUSTAINABLE COMMUNITIES PROGRAM (AHSC)

The AHSC program funds land-use, housing, transportation, and land preservation projects that support infill and compact development that reduces greenhouse gas emissions. Projects must fall within one of three project area types: transit-oriented development, integrated connectivity project, or rural innovation project areas. Fundable activities include affordable housing developments, sustainable transportation infrastructure, transportation-related amenities, and program costs.

Funds are programmed by the Strategic Growth Council and implemented by the Department of Housing and Community Development.

URBAN GREENING GRANTS

Urban Greening Grants support the development of green infrastructure projects that reduce Greenhouse Gas (GHG) emissions and provide multiple benefits. Projects must include one of three criteria, most relevant: reduce commute vehicle miles traveled by constructing bicycle paths, bicycle lanes, or pedestrian facilities that provide safe routes for travel between residences, workplaces, commercial centers, and schools. Eligible projects include green streets and alleyways and non-motorized urban trails that provide safe routes for travel between residences, workplaces, commercial centers, and schools.

Funds are programmed by the CA Natural Resource Agency.

TRANSFORMATIVE CLIMATE COMMUNITIES PROGRAM (TCC)

The TCC Program funds development and infrastructure projects that achieve major environmental, health, and economic benefits in California's most disadvantaged communities. TCC empowers the communities most impacted by pollution to choose their own goals, strategies, and projects to reduce greenhouse gas emissions and local air pollution – all with data-driven milestones and measurable outcomes.

Funds are programmed by California's Cap-and-Trade Program.

Other State Funds

SENATE BILL 1: LOCAL PARTNERSHIP PROGRAM

This program provides local and regional agencies that have passed sales tax measures, developer fees, or other transportation-imposed fees to fund road maintenance and rehabilitation, sound walls, and other transportation improvement projects. Jurisdictions with these taxes or fees are then eligible for a formulaic annual distribution of no less than $100,000. These jurisdictions are also eligible for a competitive grant program. Local Partnership Program funds can be used for a wide variety of transportation purposes, including roadway rehabilitation and construction, transit capital and infrastructure, bicycle and pedestrian improvements, and green infrastructure.

Funds are programmed by CTC.

SENATE BILL 1: ROAD MAINTENANCE AND REHABILITATION PROGRAM

Senate Bill 1 created the Road Maintenance and Rehabilitation Program (RMRP) to address deferred maintenance on state highways and local road systems. Program funds can be spent on both design and construction efforts. On-street active transportation-related maintenance projects are eligible if program maintenance and other thresholds are met.

Funds are allocated to eligible jurisdictions and programmed by CTC.

SAFE ROUTES TO SCHOOL

The goal of this program is to empower communities to make walking and bicycling to school a safe and routine activity once again. Funding is available for a wide variety of programs and projects, from building safer street crossings to establishing programs that encourage children and their parents to walk and bicycle safely to school. Infrastructure and non-infrastructure projects are eligible within 2 miles of a grade school or middle school.

Funds are programmed by the California Department of Transportation (Caltrans).

REGIONAL SURFACE TRANSPORTATION PROGRAM

This program was originally established by California State Statute to support ongoing construction and maintenance of highways and bridges in California. However, this program can also fund bicycle transportation and pedestrian walkways on any public road as long as the bicycle facilities are used primarily for transportation purposes as opposed to recreational use.

Funds are programmed by the California Department of Transportation (Caltrans).

TABLE 4-26 ACTIVE TRANSPORTATION FUNDING

FUNDING SOURCE	ON-STREET BIKEWAYS	PEDESTRIAN INFRASTRUCTURE	SAFE ROUTES TO SCHOOL	BICYCLE PROGRAMS	PEDESTRIAN PROGRAMS	STUDIES
LOCAL AND REGIONAL PROGRAMS						
BEYOND Framework Fund Program	x	x	x	x	x	x
Riverside County Community Improvement Designation (CID) Funds			x	x	x	x
Measure A	x	x	x			
Transportation Uniform Mitigation Fee Regional Arterial Roads (TUMF)	x	x				
TDA Article 3 Bicycle and Pedestrian Facilities Program	x	x				x
Sustainability Planning Grant Program	x	x	x			x
COMPETITIVE GRANT PROGRAMS						
California Active Transportation Program (ATP)	x	x	x	x	x	
Sustainable Transportation Planning Grants						x
Highway Safety Improvement Program	x	x	x			
Solutions for Congested Corridors Program	x	x				
Office of Traffic Safety (OTS)	x	x		x	x	
Affordable Housing and Sustainable Communities Program (AHSC)	x	x		x	x	
Transformative Climate Communities Program (TCC)	x	x				x
Urban Greening Grants	x	x	x			
OTHER STATE FUNDS						
Senate Bill 1: Local Partnership Program	x	x				
Senate Bill 1: Road Maintenance and Rehabilitation Program	x	x				
Safe Routes to School	x	x				x
Safe Routes to Parks	x	x	x			x
Regional Surface Transportation Program	x	x				

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Section 4.8:
Project Prioritization


GUNS·AMMO
ACCESSORIES

Project Prioritization

BECAUSE FUNDING IS LIMITED, THE CITY APPLIES A STRATEGIC APPROACH TO IMPLEMENTING PROJECTS IN A WAY THAT IS ALIGNED WITH COMMUNITY PRIORITIES. A PRIORITIZATION FRAMEWORK ALLOWS RIVERSIDE TO IDENTIFY PRIORITY PROJECTS AND PHASE IMPLEMENTATION OVER MANY YEARS. SOME PROJECTS CAN ALSO BE IMPLEMENTED AS PART OF ROUTINE ROADWAY MAINTENANCE PROGRAMS OR AS PART OF DEVELOPMENT CONDITIONS.

PROJECTS ARE PRIORITIZED WITH CONSIDERATION OF SEVERAL KEY FACTORS INCLUDING SAFETY, USE, PROGRAM AND PLAN GOALS, AS WELL AS COMMUNITY INPUT.

Table 4-27 outlines the prioritization methodology used to evaluate bicycle network projects and pedestrian projects, which is consistent with bicycle project prioritization, yet calibrated for the walking environment. These criteria derive from the plan's goals of supporting health and equity, making Riverside's streets safer for everyone, and connecting people to the places they want to go both locally and regionally. Furthermore, this prioritization plan is aligned with the State's Active Transportation Program grant criteria, which is the primary source of state funding the City pursues for pedestrian and bicycle infrastructure.

For each criterion, projects received an individual score as well as a composite score based on the sum of all five factors evaluated. Total scores falling within the top third are considered high priority projects; total scores falling in the middle third are considered medium priority; and scores falling in the lowest third tier are considered lower priority projects.

The prioritization list acts as a guide to implementation for the City. When funding sources become available, the City will take all available opportunities to propose the most competitive projects. Should opportunities arise to complete projects on lower tiers of the prioritization list prior to those on higher priority tiers, they may be taken. For example, if a new development is required to provide a public benefit along these corridors, proposed bikeways or sidewalks can be considered as an option. If the City plans to repave a corridor that has a recommended bikeway or pedestrian project in this Plan, the City will explore ways to install facilities as the street is repaved.

Projects were given one of three priorities:

- Tier 1: High Priority Projects. These are projects that the City will actively seek funding for and dedicate resources to planning and implementation in the immediate years. Timelines for outreach, and identification of funding sources will be a high priority and immediate next step. The Tier 1 projects that are lower-scale and cost should be considered for immediate implementation in the coming fiscal years.
- Tier 2: Priority Projects. These are projects that the City will maintain as potential projects, in the event that funding sources (such as developer impact fees or applicable grant funding opportunities arise) become available. The City's repaving plan will also take these projects into account as street repaving plans are implemented. These projects may be combined with Tier 1 projects to strengthen the network and gap closure portions of grant applications, and to complement other projects.
- Tier 3: Other Projects. These are projects that the City will pursue longer-term.

Figure 4-30 shows the recommended bicycle projects throughout the City based on prioritization results. The following tables list Tier 1, 2, and 3 projects among the recommended bikeways.

TABLE 4-27 PROJECT PRIORITIZATION CRITERIA

CRITERIA	MEASURE	POINTS
Connectivity	Project connects to major destinations, close gaps in the existing bicycle network/sidewalk network, and serves demand for active transportation trips based on proximity to where people live, work, play, shop, learn, and access transit.	0 – 10
Health + Equity	Project is located within a disadvantaged community, as defined by CalEnviroScreen 3.0, Riverside Unified School District Free and Reduced Meal Program, and/or household income thresholds (Department of Housing and Community Development ACS 5-year estimates).	0 – 6
Safety	Project is located in areas with high pedestrian and/or cyclist activity such as public schools, parks, libraries, community and senior centers increasing the potential for collisions or street with high levels of traffic stress, and thereby, addresses safety barriers.	0 – 6
Community-Identified Need	Project was identified as needing improvement by community members through one or more community engagement efforts.	0 – 6
Regional Goals	Project improves and builds upon the regional network identified in the Riverside County Bike Master Plan and/or WRCOG Active Transportation Plan.	0 – 2
	Maximum Possible Points	30

Prioritized Bicycle Projects

Figure 4-30 displays the recommended bicycle projects throughout Riverside based on prioritization score. The following tables summarized the recommended bikeway projects by Tier.

FIGURE 4-30 PRIORITIZED BICYCLE PROJECTS

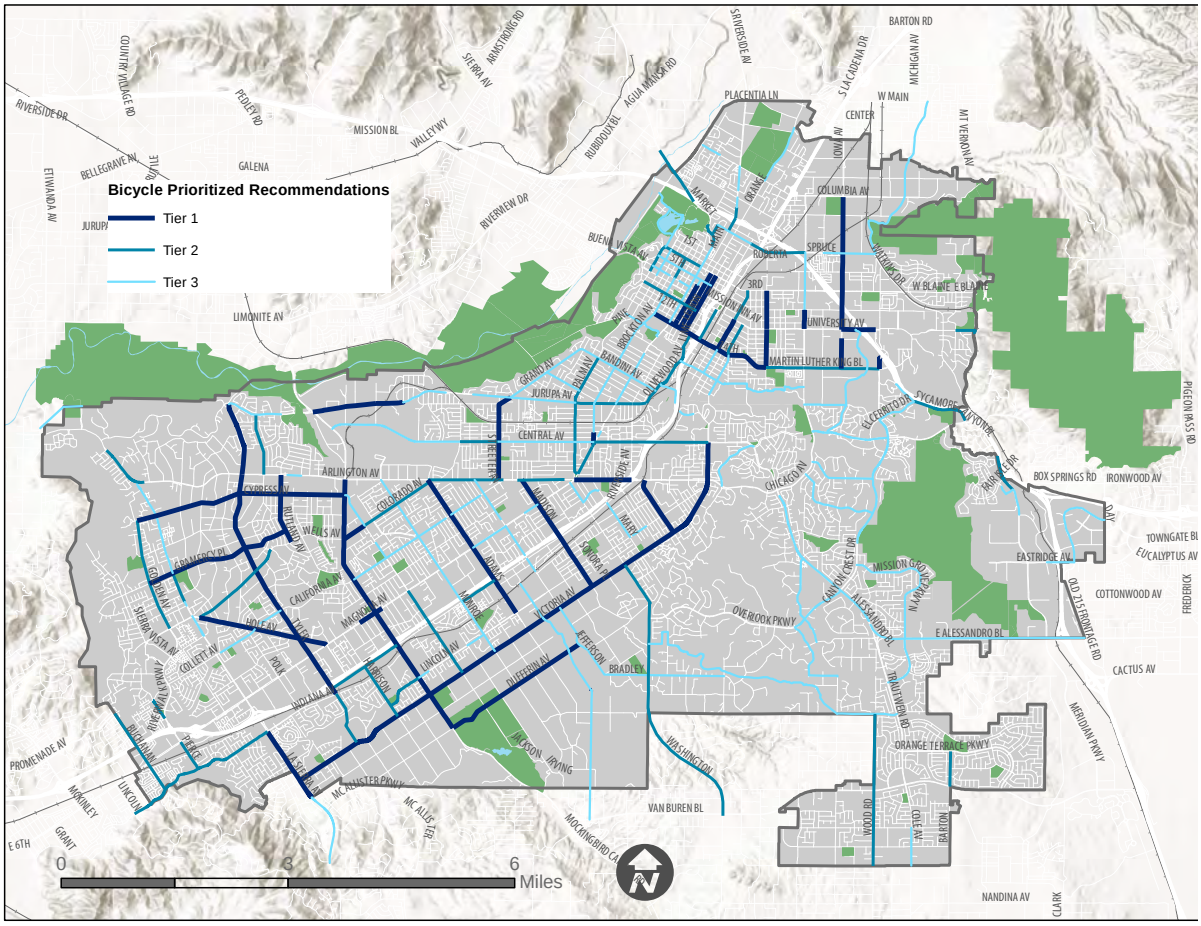


TABLE 4-28 RECOMMENDED BICYCLE PROJECTS: TIER 1

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)	WARD
14th St	Kansas Ave	Brockton Ave	II	1.7	2
Adams St	Lincoln St	California St	II	1.6	5
Arlington Ave	Indiana Ave	Magnolia Ave	II	0.5	3
Brockton Ave	Magnolia Ave	Beatty Dr	II	0.2	3
Chicago Av	W Linden St	Spruce St	IIB	0.8	1,2
Colorado Ave	Van Buren Blvd	Monticello Ave	II	0.3	6
Cypress Ave	Golden Ave	Van Buren Blvd	II	2.8	6,7
Dufferin Ave	Van Buren Blvd	Jefferson St	IIIB	2.0	5
Gramercy Pl	Tyler St	Rutland Ave	IIIB	0.6	6,7
Gramercy Pl	Golden Ave	Tyler St	II	1.4	7
Hole Av	Wells Ave	Tyler St	IIB	1.4	6
Hole Ave	Tyler St	Magnolia Ave	II	0.4	6
Iowa Ave	University Ave	Columbia Ave	IIB	1.8	1,2
Jurupa Ave	Crest Ave	Columbus St	IIB	1.7	3
Kansas St	University Ave	3rd St	IIIB	1.0	2
La Sierra Ave	Indiana Ave	City Limits	IIB	1.1	5
Lemon St	14th St	3rd St	IV	0.8	1
Madison St	Arlington Ave	Victoria Ave	IIIB	1.7	3,4
Magnolia Ave	Meyers St	McKenzie St	II	0.42	5
Main St Pedestrian Mall	10th St	6th St	I	0.31	1
Main St	14th St	13th St	II	0.08	1
Main St	13th St	10th St	IIIB	0.23	1
Maude	Victoria Ave	Arlington Ave	IIIB	0.81	3
Orange St	14th St	3rd St	IV	0.83	1
Rutland Ave	Wells Ave	Arlington Ave	IIIB	0.92	6
Streeter	Arlington Ave	Jurupa Ave	IIB	1.17	3
Tyler St	Wells Ave	Arlington Ave	II	1.4	7
Tyler St	Indiana Ave	Wells Ave	II	1.9	5,6
Tyler St	Arlington Ave	Jurupa Ave	IIB	1.0	7
University Ave	Iowa Ave	W Campus Dr	IIB	0.5	2
Van Buren Blvd	Victoria Ave	Jurupa Ave	IIB	3.7	5,6,7
Victoria Ave	La Sierra Ave	Central Ave	IV	7.3	3,4,5

TABLE 4-29 RECOMMENDED BICYCLE PROJECTS: TIER 2

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)	WARD
10th St	Lemon St	Redwood Dr	IIIB	0.8	1
3rd St	Market St	Redwood Ave	IIIB	0.6	1
Arlington Av	Adams St	Streeter Ave	II	1.0	3
Arlington Ave	Western Ave	Fairhaven Dr	IIB	0.7	7
Barton Rd	Van Buren Blvd	Orange Terrace Pkwy	III	0.5	4
Brockton Av	Mission Inn Ave	3rd St	IIIB	0.3	1
Buchannan Ave	SR-91	Indiana Ave	II	0.7	6, 7
Buchannan Ave	Collet Ave	SR-91 Overpass	III	0.5	7
Central Av	Hillside Ave	Streeter Ave	IIB	0.5	3
Central Ave	Victoria Ave	Brockton Ave	II	1.5	3
Colorado Ave	Jackson St	Adams Ave	IIIB	1.0	5, 6
Golden Ave	Pierce St	Cypress Ave	IIIB	1.5	7
Harrison St	Indiana Ave	Victoria Ave	IIIB	0.8	5
Indiana Av	Hillview Dr	La Sierra Ave	II	1.9	6
Indiana Av	Monroe St	Adams St	II	0.5	5
Indiana Ave	Tyler St	Van Buren Blvd	II	1.0	5
Jackson St	Diana Ave	Magnolia Ave	I	0.4	5
Jackson St	Victoria Ave	Diana Ave	II	0.9	5
Jurupa Ave	Riverside Ave	Palm Ave	II	0.8	1,3
La Sierra Ave	Hole Ave	Gramercy Pl	II	0.3	6,7
Lincoln Av	Harrison St	Van Buren Blvd	IIIB	0.6	5
Magnolia Ave	Brockton Ave	Central Ave	II	0.8	3
Main St	Oakley Ave	Spruce St	II	0.2	1
Main St	Strong St	Spruce St	IIB	0.3	1
Market St	Ridge Rd	Locust St	I	0.3	1
Market St	Rivera St	Santa Ana River Trail	II	0.6	1

TABLE 4-29 RECOMMENDED BICYCLE PROJECTS: TIER 2

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)	WARD
Market St	SR-60	Rivera St	II	0.2	1
Martin Luther King Blvd	Canyon Crest Dr	Kansas Ave	IIB	1.0	2
Martin Luther King Blvd	Kansas Ave	Chicago Ave	IIB	0.5	2
Northbend St	Spruce St	Market St	IIIB	0.1	1
Olivewood Ave	14th St	Jurupa Ave	IIB	1.1	1
Palm Av	Tibbets St	Bandini Ave	IIIB	1.6	1,3
Park Ave	University Ave	3rd St	IIIB	0.4	2
Redwood Dr	University Ave	3rd St	II	0.4	1
Spruce St	Chicago Ave	Mulberry Ave	II	0.8	1
Sycamore Canyon Blvd	Lochmoor St	City Limits	II	0.5	2
Sycamore Canyon Blvd	Central Ave	El Cerrito Dr	IIB	0.8	2
Tyler St	Indiana Ave	Victoria Ave	IIIB	0.7	5
Victoria Ave	14th St	University Ave	III	0.5	2
Vine St	14th St	Mission Inn Ave	IV	0.5	2
Washington St	Victoria Ave	City Limits	II	2.6	4
Wells Av	Hole Ave	Tyler St	IIIB	1.0	6,7
Wood St	John F Kennedy Dr	Krameria St	IIB	2.0	4

TABLE 4-30 RECOMMENDED BICYCLE PROJECTS: TIER 3

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)	WARD
5th St	Lemon St	Redwood Dr	IIIB	0.8	1
Alessandro Blvd	Chicago Ave	I-215	IIB	5.0	2,3,4
Bandini Ave	Olivewood Ave	Palm Ave	IIIB	0.9	1
Bradley St	Jefferson St	Harbart Dr	II	1.7	4
Cactus Ave	Crystal View Terrace	Dauchy Ave	II	0.3	4
Canyon Crest Dr	Via Vista Dr	El Cerrito Dr	IIB	1.8	2
Canyon Crest Dr	Martin Luther King Blvd	UC Riverside Parking Lot 30 Driveway	IV	0.2	2
Canyon Springs Pkwy/Valley Springs Pkwy	Eucalyptus Ave	Day St	IIB	1.3	2
Prince Albert Dr	Sedgwick Ave	Ottawa Ave	IIIB	0.5	2
Central Av	Van Buren Blvd	Hillside Ave	II	1.8	3
Central Ave	Canyon Crest Dr	Chicago Ave	IIB	1.0	2,3
Chicago Av	Spruce St	W Linden St	II	0.3	1,2
Cole Av	Lurin Ave	Krameria St	II	0.5	4
Columbia Av	American Dr	Salmon River Rd	II	0.3	1
Country Club Dr	Chicago Ave	Canyon Crest Dr	IIIB	0.9	2
Crystal View Terrace	Overlook Pkwy	Cactus Ave	IIIB	0.8	4
Dexter Dr	Redwood Dr	SART Trail Head	IIIB	0.1	1
Eastridge Ave/ Eucalyptus Ave	Sycamore Canyon Blvd	Valley Springs Pkwy	II	0.4	2
El Cerrito Dr	Sycamore Canyon Blvd	Canyon Crest Dr	II	0.5	2
Jefferson St	Victoria Ave	Gage Canal	II	1.0	4
Jurupa Ave	Crest Ave	Rutland Ave	II	0.3	7
Jurupa Ave	Crest Ave	Tyler St	IIB	0.4	7
La Sierra Ave	Schulyer Ave	Pierce St	IIB	0.3	6,7
Lincoln Av	Van Buren Blvd	Antares Dr	II	0.2	5
Main St	6th St	5th St	IIIB	0.2	1

TABLE 4-30 RECOMMENDED BICYCLE PROJECTS: TIER 3

CORRIDOR	FROM	TO	FACILITY TYPE	LENGTH (MILES)	WARD
Market St	1st St	Ridge Rd	II	0.2	1
Mary St	Lincoln Ave	Indiana Ave	II	0.5	3,4
Mission Grove Pkwy	Canyon Crest Dr	E Alessandro Blvd	IIIB	1.9	2,4
Mission Grove Pkwy S	Trautwein Rd	Alessandro Blvd	IIB	0.8	4
Monroe	California St	Diana Ave	II	1.0	5
Monroe St	California St	Arlington Ave	IIIB	0.9	5,6
N Orange St	Colombia Ave	Riverside Canal	IIB	0.8	1
Nixon Dr	Brockton Ave	Washington St	II	0.3	3
Overlook Pkwy	Easterly Terminus	Via Vista Dr	I	0.1	4
Overlook Pkwy	Dead end	Dead end w/ Sandtrack Rd	I	0.1	4
Overlook Pkwy	Crystal View Terrace	Alessandro Blvd	II	0.8	4
Park Ave	Cridge St	14th St	IIIB	0.4	2
Pine St	University Ave	3rd St	II	0.4	1
Ransom Rd	Chicago Ave	Canyon Crest Dr	IIIB	1.2	2
Redwood Dr	3rd St	Field Ln	IIIB	0.7	1
Spruce St	Mulberry Ave	Norhtbend St	IIIB	0.5	1
Sycamore Canyon Blvd	Box Springs Blvd	Lochmoor Dr	II	0.4	2
Sycamore Canyon Blvd	El Cerrito Dr	N University Dr	II	0.3	2
Via Vista Dr/ Corinthian Way	Alessandro Blvd	Berry Rd	IIIB	1.2	3,4
Washington St	Nixon Dr	Magnolia Ave	IIIB	0.3	3
S of Lot 4731 Chicago Ave	Chicago Ave	Ottawa Ave	I	0.3	2

Prioritized Pedestrian Projects

Figure 4-31 displays the recommended pedestrian projects throughout Riverside based on prioritization score. The following tables summarized the recommended pedestrian projects by Tier.

FIGURE 4-31 PRIORITIZED PEDESTRIAN PROJECTS

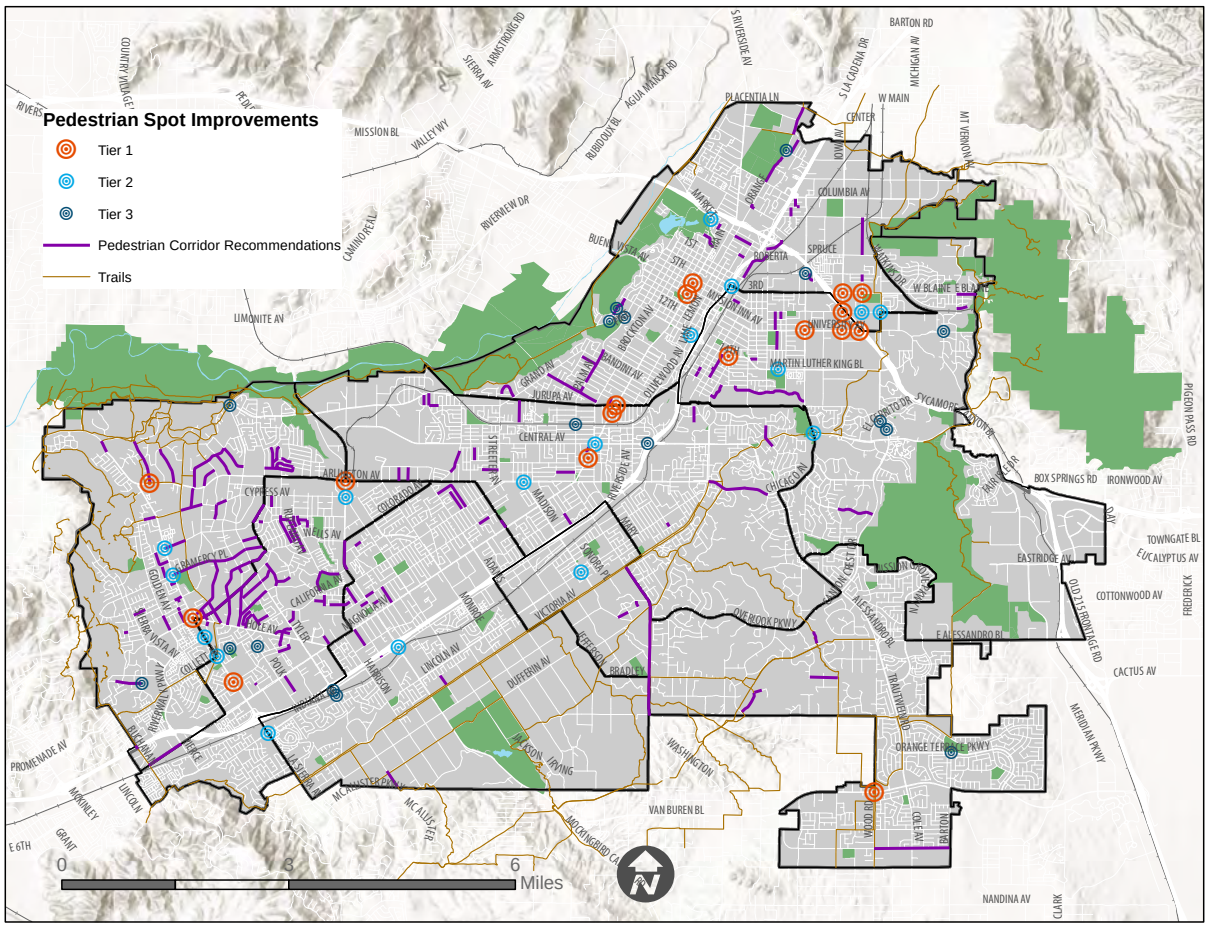


TABLE 4-31 PRIORITIZED PEDESTRIAN PROJECTS: TIER 1

CORRIDOR	CROSS STREET	IMPROVEMENT	WARD
Rustin Ave	Blaine St	Intersection Typology B	1
University Ave	Market St	Intersection Typology E	1
Blaine St	Iowa Ave	Intersection Typology A	1
Chicago Ave	University Ave	Intersection Typology A	2
Iowa Ave	W Linden St	Intersection Typology A	2
Magnolia Ave	Between Brockton Ave and Nelson St	Improve mid block crossing, Intersection Typology D	3
Western Ave	Arlington Ave	Intersection Typology C	7
University Ave	South entrance to University Village	Intersection Typology B, pedestrian scramble	2
14th St	Victoria Ave	Intersection Typology B	2
Jurupa Ave	Magnolia Ave	Intersection Typology A	3
University Ave	I-215 interchange	Intersection Typology F	2
Magnolia Ave	Elizabeth St	Intersection Typology B	3
La Sierra Ave	Pierce St and Hole St	Upgrade intersection. Bushnell pedestrian plaza with removable bollards and historic signage. Typology A	7
Wood Rd	Van Buren Blvd	Intersection Typology A	4
La Sierra Ave	Cochran Ave	Intersection Typology B. High visibility crosswalk	6
Van Buren Blvd	Arlington Ave	Intersection Typology A	3

TABLE 4-32 PRIORITIZED PEDESTRIAN PROJECTS: TIER 2

CORRIDOR	CROSS STREET	IMPROVEMENT	WARD
Rustin Ave	W Linden St	Intersection Typology B	2
Madison St	Arlington Ave	Intersection Typology A	3
14th St	Olivewood Ave	Intersection Typology B	1
W Linden St	Canyon Crest Dr	Intersection Typology C	2
MLK Blvd	Douglass Ave	Improve mid block crossing, Intersection Typology D	2
Third St	Vine St	Intersection Typology C	2
Central Ave	Magnolia Ave	Intersection Typology A	3
Van Buren Blvd	Jackson St	Intersection Typology B	6
Indiana Ave	La Sierra Ave	Intersection Typology A	5
Madison St	Lincoln Ave	Intersection Typology C	4
Chicago Ave	Central Ave	Intersection Typology A	3
Van Buren Blvd	Indiana Ave	Intersection Typology F	5
Gramercy Pl	La Sierra Ave	Intersection Typology B	7
Fairmount Blvd	Market St	Intersection Typology B add crosswalks	1
La Sierra Ave	Collett Ave	Intersection Typology B. High visibility crosswalk	6
La Sierra Ave	Minnier	Typology B. High visibility crosswalk	7
Campbell Ave	La Sierra Ave	Intersection Typology B. High visibility crosswalk	7

TABLE 4-33 PRIORITIZED PEDESTRIAN PROJECTS: TIER 3

CORRIDOR	CROSS STREET	IMPROVEMENT	WARD
Collett Ave	Newby Dr	Intersection Typology C. Upgrade intersection	6
Canyon Crest Dr	Via Pueblo	Install crossing, Intersection Typology B	2
Cass St	Polk St	Intersection Typology C	6
Tequesquite Ave	Glenwood Dr	Intersection Typology C	1
Watkins Dr	W Big Springs Rd	Intersection Typology C	2
El Cerrito Dr	Canyon Crest Dr	Intersection Typology B	2
Central Ave	SR-91 Interchange	Intersection Typology F	3
Mt Rubidoux Trail Head	Glenwood Dr	Intersection Typology D. Install mid block crossing on Glenwood Dr at trail head	1
Chicago Ave	Massachusetts Ave	Install Traffic Signal. Intersection Typology B	1
Tyler St	Jurupa Ave	Intersection Typology D. Upgrade crossing for SART Trail Head.	7
Reid Park Ruth H Lewis Center	Orange St	Intersection Typology D. Install mid block crossing on Orange St at park entrance	1
Knoefler Dr	Ambs Dr	Intersection Typology C and install sidewalks along Knoefler Dr	7
Tyler St	Indiana Ave N of Tracks	Intersection Typology F	5
Palm Ave	14th St	Intersection Typology C	1
Palm Ave	Dewey Ave	Intersection Typology C and improve railroad crossing	3
Tyler St	Indiana Ave S of Tracks	Intersection Typology F	5
Barton St	Orange Terrace Pkwy	Install mid block crossing across Orange Terrace Pkwy, Intersection Typology D	4

Section 4.9: Implementation Plan


NO

Implementation Plan

WITH LIMITED AND COMPETITIVE FUNDING OPTIONS, IMPLEMENTING OVER 110 MILES OF BIKEWAYS AND OVER 50 PEDESTRIAN SPOT IMPROVEMENT PROJECTS MUST BE PRIORITIZED IN A THOUGHTFUL AND FEASIBLE MANNER. THE FOLLOWING EVALUATION STRATEGY REFLECTS A SYSTEMATIC APPROACH TO DETERMINE EACH PROJECT'S COMMUNITY BENEFIT IN A MANNER THAT IS FEASIBLE, FUNDABLE, AND SUSTAINABLE. PROJECTS ARE SORTED INTO FOUR IMPLEMENTATION CATEGORIES BASED ON THE COMBINED RESULTS OF TWO EVALUATIONS: PROJECT PRIORITY AND PROJECT FEASIBILITY. EACH EVALUATION SCORES PROJECTS ON SPECIFIC CRITERIA.

PROJECT FEASIBILITY

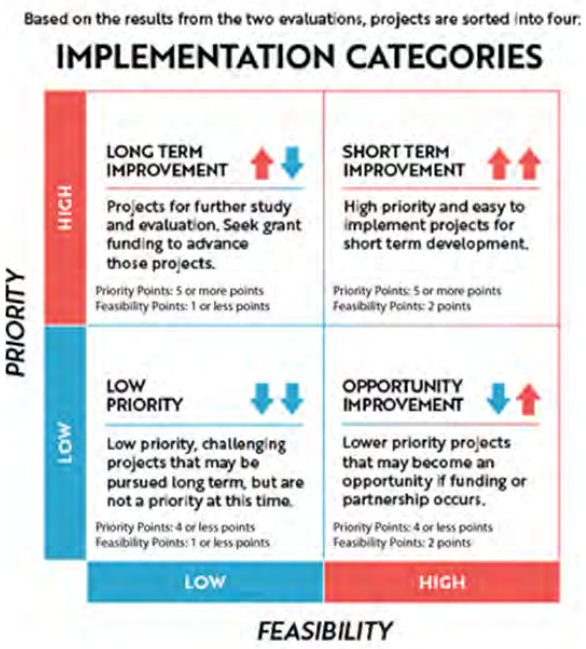
The project feasibility evaluation categorizes projects based on their complexity and high-level costs. In general, projects that only require signage and striping changes are considered highly feasible. Projects that require interagency coordination, hardscape changes, right-of-way acquisition or potential road diets (including parking removal) are considered low-feasibility projects. A feasibility breakdown is below:

- Cost - Projects that only require signage and striping (Class II, Class IIB, Class III, Class IIIB, and some pedestrian crossing improvements) score one point
- Complexity - Projects that will not require interagency coordination (i.e., Caltrans rights-of-way) or will not require a potential road diet score one point

Projects earning two points are considered highly feasible. Projects with zero or one point are considered low-feasibility projects.

IMPLEMENTATION CATEGORIES

Based on the aforementioned evaluations, projects are then placed into four categories: Long term improvements, short term improvements, low priority improvements, and opportunity improvements. Projects are listed by a combined point total within each category. See the graphic to the right:



Short term improvement projects are rated high priority and high feasibility, and represent projects that could be pursued for implementation within the first three to five years.

Long term improvement projects are rated high priority and low feasibility. They may require more study or analysis than short term projects, more significant interagency coordination, and/or additional funding for construction.

Opportunity improvements are those projects rated lower priority and high feasibility and may be pursued when nearby development or an overlapping project creates an opportunity to include these easy to implement projects or if appropriate for applicable grant funding opportunities.

Low priority improvements are those projects rated lower priority and low feasibility. They represent challenging projects that may not add significant value for a greater portion of the community walking or bicycling network on their own, but are part of a long-term vision for active transportation.

PROJECT CONSIDERATIONS

While some of the projects outlined within this Plan may be implemented more quickly, other projects require further community involvement, additional study of trade-offs, or multi-jurisdictional coordination. These pieces require additional time and resources that add complexity to the project.

PROJECT STUDIES AND PHASING

Some of the projects outlined in the Plan require additional study to evaluate trade-offs. For example, some of the proposed bikeways would require the removal of parking or of travel lanes. For many of these projects, the City will study how changing the roadway design impacts local residents and through traffic. Both Orange St and Lemon St have proposed Class IV facilities that would require the removal of existing travel lanes or parking. For other projects like Victoria Ave, project phasing (or sequencing) is also a consideration, due to the length of the project and connection to existing facilities.

INTERAGENCY COORDINATION

Specific proposed projects require the City of Riverside to coordinate with other agencies and stakeholders to coordinate design, implementation, and funding. For example, creating a Class I on the Pedestrian Mall will require coordination with Riverside Downtown Partnership. Likewise, the proposed additions to Victoria Ave will require coordination with community groups like Victoria Avenue Forever. Improvements at and along SR-91 highway crossings and interchanges will require coordination with Caltrans.

Bicycle Projects

Prioritized bicycle projects can be seen in Table 4-34.

TABLE 4-34 PRIORITIZED BICYCLE PROJECTS WITH PLANNING-LEVEL COSTS

CORRIDOR	FROM	TO	RECOMMENDED FACILITY	LENGTH (MILES)	IMPLEMENTATION CATEGORY	ESTIMATED TOTAL PROJECT COST	WARD
14th St	Chicago Ave	Brockton Ave	II	1.68	Short Term	$3,885,000	2
Adams St	Lincoln St	California St	II	1.56	Long Term	$602,837	5
Arlington Ave	Indiana Ave	Magnolia Ave	II	0.51	Short Term	$1,174,689	3
Brockton Ave	Magnolia Ave	Beatty Dr	II	0.16	Short Term	$62,605	3
Chicago Av	W Linden St	Spruce St	IIB	0.75	Opportunity	$290,250	1,2
Colorado Ave	Van Buren Blvd	Monticello Ave	II	0.33	Long Term	$759,999	6
Cypress Ave	Golden Ave	Van Buren Blvd	II	2.80	Long Term	$2,859,106	6,7
Dufferin Ave	Van Buren Blvd	Jefferson St	IIIB	2.02	Short Term	$4,672,260	5
Gramercy Pl	Tyler St	Rutland Ave	IIIB	0.61	Short Term	$1,399,719	6,7
Gramercy Pl	Golden Ave	Tyler St	II	1.37	Long Term	$1,394,676	7
Hole Av	Wells Ave	Tyler St	IIB	1.35	Short Term	$2,022,849	6
Hole Ave	Tyler St	Magnolia Ave	II	0.37	Short Term	$864,065	6
Iowa Ave	University Ave	Colombia Ave	IIB	1.76	Long Term	$2,634,476	1,2
Jurupa Ave	Van Buren Blvd	Columbus St	IIB	1.21	Long Term	$1,820,501	3
Kansas St	University Ave	3rd St	IIIB	1.01	Opportunity	$1,516,086	2
La Sierra Ave	Cleveland Ave	Indiana Ave	IIB	1.05	Short Term	$2,428,650	5

Planning level cost estimates using 2020 unit cost assumptions

TABLE 4-34 PRIORITIZED BICYCLE PROJECTS WITH PLANNING-LEVEL COSTS

CORRIDOR	FROM	TO	RECOMMENDED FACILITY	LENGTH (MILES)	IMPLEMENTATION CATEGORY	ESTIMATED TOTAL PROJECT COST	WARD
Lemon St	14th St	3rd St	IV	0.83	Long Term	$1,912,658	1
Madison St	Arlington Ave	Victoria Ave	IIIB	1.69	Opportunity	$2,532,356	3,4
Magnolia Ave	Meyers St	McKenzie St	II	0.42	Short Term	$14,747	5
Main St	10th St	6th St	I	0.31	Short Term	$120,93	1
Main St	14th St	13th St	II	0.08	Short Term	$30,555	1
Main St	13th St	10th St	IIIB	0.23	Short Term	$521,947	1
Maude	Victoria Ave	Arlington Ave	IIIB	0.81	Short Term	$1,215,000	3
Orange St	14th St	3rd St	IV	0.83	Long Term	$29,187	1
Rutland Ave	Wells Ave	Arlington Ave	IIIB	0.92	Opportunity	$121,680	6
Streeter	Arlington Ave	Jurupa Ave	IIB	1.17	Short Term	$1,752,162	3
Tyler St	Wells Ave	Arlington Ave	II	1.35	Long Term	$3,126,658	7
Tyler St	Indiana Ave	Wells Ave	II	1.94	Long Term	$1,979,468	5,6
Tyler St	Arlington Ave	Jurupa Ave	IIB	0.97	Opportunity	$2,242,315	7
University Ave	Iowa Ave	W Campus Dr	IIB	0.46	Opportunity	$682,713	2
Van Buren Blvd	Victoria Ave	Jurupa Ave	IIB	3.73	Opportunity	$8,631,186	5,6,7
Victoria Ave	La Sierra Ave	Central Ave	IV	7.31	Long Term	$16,897,911	3,4,5

Planning level cost estimates using 2020 unit cost assumptions

Pedestrian Projects

Prioritized pedestrian projects can be seen in Table 4-35

TABLE 4-35 PRIORITIZED PEDESTRIAN PROJECTS WITH PLANNING-LEVEL COSTS

LOCATION	CROSS STREET	IMPROVEMENT	IMPLEMENTATION CATEGORY	ESTIMATED TOTAL PROJECT COST	WARD
University Ave	Market St	Intersection Typology E	Long Term	$626,000	1
Iowa Ave	W Linden St	Intersection Typology A	Long Term	$610,000	2
Jurupa Ave	Magnolia Ave	Intersection Typology A	Opportunity	$85,000	3
Wood Rd	Van Buren Blvd	Intersection Typology A	Long Term	$447,000	4
Indiana Ave	La Sierra Ave	Intersection Typology A	Long Term	$590,000	5
La Sierra Ave	Pierce St and Hole St	Upgrade intersection. Bushnell pedestrian plaza with removable bollards and historic signage. Typology A	Long Term	$650,000	6
Western Ave	Arlington Ave	Intersection Typology C	Opportunity	$205,250	7