



Gardnerville Town Board
AGENDA ACTION SHEET

1. **For Possible Action:** Discussion on a Master Plan Amendment (ref. DA 14-012), a request by County staff for the Town Board to review, comment, and provide a recommendation on the adoption of the 2014 Douglas County Bike Plan, funded and prepared by the Nevada Department of Transportation (NDOT), affecting areas outside of the Tahoe Basin and amending a portion of the 2003 Comprehensive Trails Plan.
2. **Recommended Motion:** Motion to approve providing the County, town staff comments, along with the additional comments mentioned this evening, and recommend to the County Planning Commission and County Commissioners future adoption of the plan, once staff comments are implanted into the proposed plan.

Funds Available: Yes N/A

3. **Department:** Administration

Prepared by: Tom Dallaire

4. **Meeting Date:** March 4, 2014 **Time Requested:** 20 minutes

5. **Agenda:** Consent Administrative

Background Information: Dirk asked if the town would participate in the meetings and workshops for the development of this plan as support staff to the state and Kimley-Horn who developed the plan. The board members now have the opportunity to review and make additional comments to the plan components or add to or modify staff comments. See the 13-2 for staff's comments on the plan. It appears the state plans required each county to develop a county plan. The county plan encourages the towns to create a town bike plan (see strategy 1B on page 11 of the county plan) The plan is not ready for adoption but there is not enough time in the process to come back to all the entities involved in the plan for final plan adoption. So county staff is requesting we provide a recommendation to the county planning commission and county commissioners to adopt the plan once the corrections and comments have been addressed. There is not enough time in the process now to come back after everyone's comments to adopt the final plan.

6. **Other Agency Review of Action:** Douglas County N/A
 GID's and Town of Genoa and Minden

7. **Board Action:**

Approved Approved with Modifications
 Denied Continued

Douglas County Bike Plan February 2014 – Town Staff Comments;

The comments are items town staff identified in the existing proposed Draft plan.

Page 3 : Change Tim to “Tom” Dallaire

Page 11: Define “mode share”

Goals: Should we add increase existing bike route awareness

Increase existing and new bike route or lane signage

Create an existing bike lane route plan for education and visitors?

Strategy 1B states the towns will need to create a bike plan as well?

Strategy 1E is blank?

Page 12:

Strategy 2C – Add signage or route marking to this?

Add Strategy 3F: county to initiate a bicycle and or pedestrian advisory committee as indicated in 8.3 of the recommendations.

Page 14 Can a generic detail be added to show what each facility looks like. The county will need to establish a new development code section for this. But a generic detail would be helpful with all these facility types. The guide is \$144 to obtain a copy of it.

Is 12’ wide enough for a shared lane. Not if the vehicle is required to give 3’ of clearance, or they travel in the other lane. What is a recommended minimum width of this facility?

Bold the labels.

Shared Lane marking – what does a typical marking look like?

Pave shoulder does not have bike lane markings.

Buffered bike lane Need to add description and detail

Bike Lane – a photo of these would work well also marked on the street and signage.

Bike Boulevard. Add detail for this. This will be difficult to do in town because there are not many roads that do not access homes. So what would this look like. I had a different image of this at the workshop.

The existing highway 395 width is not wide enough to accommodate a bike Lane from Mill Street to Toler. The shoulder ends at Mill and at the Village motel at Toler and 395. Can we show an alternative route around this area? Mission to Ezell to Gilman. Or direct the bike lane down the shared trail in the future when is finished.

The alignment of Muller does not appear to be accurate. Muller does not continue along Decker Road which is currently gated off for access. The section from Grant to Toler does not appear to be accurate as well. Can we add the shared use path as identified in the Specific plan to this plan as well to Carrick and the terminus at the Virginia Ranch Regional Detention Pond path. there will be a shared use path off of Muller in the 100' from behind the Industrial parks?

Can show Chichester with bike lanes like Gilman? It would be Chichester Drive from Gilman to harvest, Harvest; Chichester to Waterloo Lane.

Toler Lane from Harvest to 395 has a bike lane on the street. Do we need it or can we put parking on both sides of the local street?

Page 26 – Table 4 needs to add the Asterisk symbol to the title so people refer to the footnote at the bottom of the sheet.

The table has a blank section

A sections stating "Shared" Do we want to add Mission, Ezell to Gilman, Douglas; Gilman to Spruce to Wildrose , Wildrose to 2nd, 2nd from Wildrose to County in order to avoid the narrow section of US highway 395. Or do these need to be on the town plan?

Page 27 Can Item 8.3 be added as a strategy 3F

Field review notes:

Show "W" & "RS" & "FS" in the legend.

assume the SRd is the same as SRD.



COMMUNITY DEVELOPMENT

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Planning Division
Engineering Division
Building Division
Code Enforcement

MEMORANDUM

Date: February 26, 2014

To: Towns of Gardnerville, Genoa, and Minden, and the Gardnerville Ranchos and Indian Hills General Improvement Districts.

From: Dirk Goering, AICP, Associate Planner, Direct Line 782-6212

Subject: 2014 Douglas County Bike Plan, funded and prepared by the Nevada Department of Transportation (NDOT) (ref. DA 14-012)

I. REQUEST

Douglas County Community Development Department and NDOT are requesting comments on the Draft 2014 Douglas County Bike Plan.

II. BACKGROUND/DISCUSSION

Since August 2013, the Community Development Department has been working with the Nevada Department of Transportation and their consultants, Kimley-Horn and Associates, Inc, to create a Douglas County bike plan. The proposed plan focuses on documenting the existing and proposed bicycle facilities desired within Douglas County. The plan does not incorporate areas within the Tahoe Basin and the Carson Area Metropolitan Planning Organization. The plan builds on the 2013 Nevada State Bike Plan and supplements and updates the Douglas County 2003 Comprehensive Trails Plan. If adopted, the 2014 Bike Plan will update certain figures in the 2003 Comprehensive Trails Plan and additional objectives and strategies.

Adopted 2003 Comprehensive Trails Plan

Within the 2003 Trails Plan, there are figures that identify high and low priority on and off street trails. The off street trails are not specific to bike facilities, but rather a comprehensive designation of future trails for walking, hiking, horseback riding, biking, and multi-purpose trails. The focus of the 2014 Bike Plan is to update the figures and policies related to bikeways and on-street trails.

13-4

The 2014 Bike Plan is proposing to update the following figures adopted with the Douglas County Trails Plan in June 2003 (Attachment 2):

- Figure 10.48 Carson Valley – Lake Tahoe, page 19
- Figure 10.49 East Valley Trails, page 21
- Figure 10.50 North Valley Trails, page 23
- Figure 10.51 Tahoe/Foothill, page 28
- Figure 10.52 South Valley Trails, page 31
- Figure 10.53 topaz Trails, page 33

Public Comment

The development of this Plan was guided by local coordination and public input. Input was initially gathered during the development of the State Plan in November 2011. In addition, a two day workshop was held on August 27 and 28, 2013, in Minden, specifically for the 2014 Bike Plan. During the workshop, representatives of the local community provided input on specific bicycling conditions in Douglas County and recommendations on proposed bicycle facility improvements as well as recommendations for policy, program, legislation, and tourism improvements to bicycling.

Summary of Proposed Updates to the 2014 Douglas County Bike Plan

The 2014 Bike Plan proposes a vision along with goals, objectives and strategies to achieve the vision. The vision, goals, and objectives are identified below. In addition, starting on page 11, the plan identifies a number of strategies to help focus implementation and to support the main objectives.

Vision

For Douglas County residents and visitors of all ages and abilities to experience a convenient, pleasant, and safe bicycling environment.

There are two major goals of the Douglas County Bicycling Program that will guide the specific objectives and strategies within this plan.

- Goal 1: Increase bicycling's mode share throughout Douglas County in and between communities, both by residents and tourists.
- Goal 2: Reduce crashes involving bicyclists and eliminate all bicyclist fatalities in support of Nevada's "Zero Fatalities" and the national "Towards Zero Deaths" initiatives.

The following objectives are the specific tasks to be evaluated to determine the success of this Plan and bicycling in Nevada.

- Objective 1: Increase local support of bicycling
- Objective 2: Increase bicycle tourism
- Objective 3: Accommodate appropriate bicycling facilities on all roadways in Nevada open to bicycling
- Objective 4: Increase motorists and bicyclists compliance with laws associated with bicycling

Notable changes and additions to the 2003 Trails Plan:

- The proposed maps will create a consolidated network work of designated bike lanes and facilities, focusing on better connectivity through the County and between population centers with fewer bike facilities.
- Adoption of a High Priority Bicycle Improvement project to prioritize critical bicycle improvements aimed at improving connectivity and geotourism.
 - Improvement Projects
 - * Bicycle Lane: Centerville Lane, Hwy. 395 to Dresslerville Road
 - * Bicycle Lane: Buckeye Road, Hwy 395 to Orchard Road
 - * Bicycle Lane: Hwy 395, Riverview Drive to Ironwood Lane
 - * Buffered Bicycle Lane: Jacks Valley Rd/Foothill Road, Hwy 395 to State Route 88 (Pony Express Route)
 - * Bicycle Lane: Tillman Lane, Kimmerling Road to Dresslerville Road
 - * Bicycle Lane, Vista Grande –Clear Creek through Indian Hills and out through Mica
 - * Shared Use Path: Hwy 395 between Carson City and Minden.
- The Adoption of historical rights-of-ways and corridors as multi-use trails to build a community connected by trails, making it easy and inviting for residents and visitors to enjoy the outdoors, including:
 - Old Kingsbury Multi-use Trail (Part of the Pony Express Route)
 - Virginia and Truckee Multi-use Trail

The following Goals from the 2011 Master Plan Update are identified to support the proposed bike plan.

Transportation Element

- TP Policy 5.29 - Establish and preserve a transportation corridor in the vicinity of the former Virginia & Truckee railroad right-of-way between Minden and the Carson City line, parallel to Heybourne Road.

Economic Development Element

- Focus Area – Outdoor Recreation & Lifestyle - #5: Tremendous Trails Goal – To build a sustainable community connected by trails, making it easy and inviting for residents and visitors to connect outdoors and enjoy more than 22-types of outdoor activities year round in Douglas County.
- ED Action 2.6 Support the development of itinerates focused on outdoor activities, natural amenities, environmental education, and geotourism. Rebrand the visitor experience to focus on environmental quality, health and wellness, and recreation activities.

Conclusion

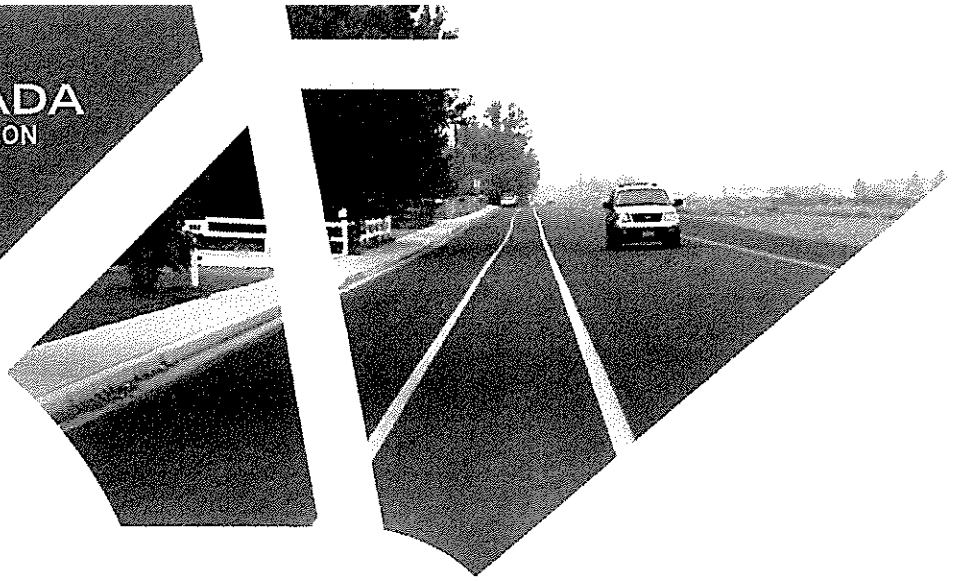
The development of the Douglas County Bike Plan has involved collaboration from State and local agencies. NDOT has funded and contracted with Kimly-Horn and Associates, Inc. to write and manage the project. County staff is working closely with NDOT and Kimly-Horn and Associates, Inc. to provide local knowledge and coordination with the local agencies.

County staff is requesting comments from the towns, general improvement districts, and all interested parties regarding all aspects of the proposed plan. The draft 2014 Douglas County Bike Plan provided with this report is still a working draft.

While the entire bike plan will be used to assist the State and County in planning for and implementing bicycle facilities, there are a few sections of the plan that are critical to its success. The critical sections are Section 5 Vision, Goals, Objectives, and Strategies, Section 6 Recommended Bicycle Network, specifically the maps which identify a proposed network, and Section 8 Implementation Plan, which identifies a High Priority Bicycle Improvement Project.

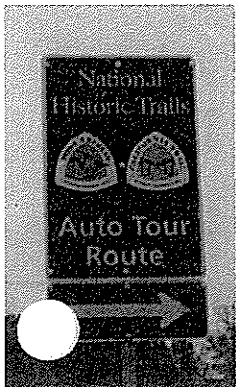
Attachments:

1. Draft 2014 Bike Plan
2. 2003 Comprehensive Trails Plan



DOUGLAS COUNTY Bicycle Plan

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Bicycle Plan**



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LIST OF ACRONYMS

AASHTO	American Association of State Highway and Transportation Officials
FHWA	Federal Highway Administration
GIS	Geographic Information Systems
HSIP	Highway Safety Improvement Program
MAP-21	Moving Ahead for Progress in the 21st Century Act
MPO	Metropolitan Planning Organization
NACTO	National Association of City Transportation Officials
NBPAB	Nevada Bicycle and Pedestrian Advisory Board
NDOT	Nevada Department of Transportation
NHPP	National Highway Performance Program
NHS	National Highway System
NHTSA	National Highway Traffic Safety Administration
SHSP	Strategic Highway Safety Plan
SRTS	Safe Routes to School
STP	Surface Transportation Program
TAP	Transportation Alternatives Programs
TMA	Transportation Management Areas



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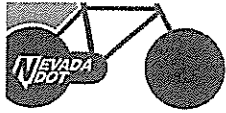
1. ACKNOWLEDGEMENTS

The Nevada Department of Transportation (NDOT) Transportation Planning Division would like to express its appreciation to the dedicated individuals who provided valuable input in the development of Douglas County Bicycle Plan. The following individuals representing local, regional and state agencies or organizations were instrumental in the preparation of the plan:

- Dirk Goering, Douglas County Planning
- Jeff Foltz, Douglas County Public Works
- Dan Doenges, Carson Area MPO
- Tim Mueller, NDOT Planning
- John Stevens, Local Cyclist/Town of Minden Board Member
- Tom Dallaire, Gardnerville Town Manager

Project Team

- NDOT Project Manager – Bill Story
- NDOT Safe Routes to School – Tim Rowe
- Consultant Project Manager – Mike Colety, P.E., PTOE, Kimley-Horn and Associates, Inc.
- Plan Development – Peter Lagerwey, Toole Design Group
- Plan Preparation – Molly O'Brien, P.E., PTOE, Kimley-Horn and Associates, Inc.
- GIS Mapping and Crash Analysis – Devin Moore, Kimley-Horn and Associates, Inc.
- GIS Mapping – Matt Farnen, Kimley-Horn and Associates, Inc.



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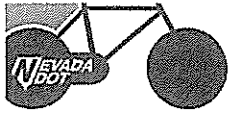


2. INTRODUCTION

Communities throughout Nevada have been steadily expanding their emphasis on improving bicycling over the last few decades. In February 2013, NDOT formalized this momentum in the Nevada Statewide Bicycle Plan (State Bike Plan), which focused on areas outside of the four Metropolitan Planning Organizations (MPOs) in Nevada. Representatives from NDOT and other public and private organizations throughout the state came together to support bicycle planning within the development of this plan. This State Bike Plan focused on recommendations to improve bicycling through Policies, Programs, Legislation, Tourism, and Infrastructure improvements.

The first strategy listed within the State Bike Plan is for NDOT to assist local jurisdictions with adopting local bicycle plans that are endorsed by the Nevada Bicycle and Pedestrian Advisory Board (NBPAB). This Douglas County Bicycle Plan has been prepared in support of that strategy. This Plan references the major elements of the State Bike Plan that are relevant to Douglas County with a focus on documenting the existing and proposed infrastructure improvements desired within Douglas County, as well as, adjacent areas.

This Plan is being developed with significant input from county and local representatives as well as cycling advocates from Douglas County. The project is being led by NDOT in coordination with the Nevada Bicycle and Pedestrian Advisory Board.



3. PUBLIC INVOLVEMENT

The development of this Plan was guided by local coordination and public input. Public input was gathered during the development of the State Bike Plan. A public meeting for the State Plan was held in Minden on November 18, 2011. This meeting was attended by seven people and the following summarizes the key topics identified at the meeting:

Largest Need:

- Wider shoulders, additional bike lanes and paths

Biggest Issue:

- Lack of connectivity within Douglas County

Greatest Asset:

- Proximity to Lake Tahoe

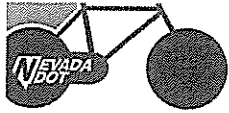
Additional Information:

- A driving tour and field review of bike facilities was done by members of the project team and local representatives;
- There is a need to improve connectivity between residential and commercial centers of the County. ;
- There are limited bike education events in Douglas County;
- Alternative design standards for roads should be explored to allow for the addition of bike facilities; and
- Douglas County is working to preserve and utilize historic rights-of-ways and corridors, such as the Virginia & Truckee Railroad and the Old Kingsbury Grade.

Section 3 of the State Bike Plan includes a summary of all public input received, which was from 15 public meetings throughout the state and 777 responses to a user survey. The State Bike Plan includes a summary of the user survey on Page 22 and of the issues identified at the public meetings on Page 23 of the State Bike Plan. This information from the State Bike Plan was used as a baseline for a workshop held specifically for development of the Douglas County Bicycle Plan.

A two day workshop was held on August 27 and 28, 2013, in Minden, Nevada. The two day workshop was held in order to gain input from representatives of the local community on specific bicycling conditions in Douglas County and to develop recommendations on proposed bicycle facility improvements as well as recommendations for policy, program, legislation, and tourism improvements to bicycling. The following is a list of attendees at the workshop:

- Dirk Goering, Douglas County Planning
- Jeff Foltz, Douglas County Public Works
- Dan Doenges, Carson Area MPO
- Tim Mueller, NDOT Planning
- John Stevens, Local Cyclist/Town of Minden Board Member
- *Tim* Tim Dallaire, Gardnerville Town Manager
- Bill Story, NDOT Project Manager
- Mike Colety, Kimley-Horn and Associates, Inc.
- Peter Lagerwey, Toole Design Group



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The two day workshop covered a variety of bicycling topics, including a field review. The schedule is included below:

DAY 1	8:00 – 8:30	Meet-and-Greet
	8:30 – 9:00	Overview of planning process, review Statewide Bike Plan
	9:00 – 9:30	Review bicycle facility types
	9:30 – 12:00	Review maps, identify opportunities, barriers
	12:00	Adjourn
	1:00 – 6:00	Field assessment*
DAY 2	8:00 – 12:00	Field assessment*
	1:00 – 2:30	Review maps
	2:30 – 5:00	Plan development – interactive exercise
	5:00	Adjourn

**The field assessment was attended by a subset of the workshop attendees and then presented to the group*

The attendees provided input on good existing bicycling conditions, existing issues, desired routes, needed programs and policies, and then provided input on priorities. The field assessment reviewed existing conditions and potential for improvements. Notes from the countywide field assessment are included in **Appendix A**.



4. EXISTING CONDITIONS

4.1 Countywide Observations

Bicycling conditions throughout Douglas County were observed as part of the development of the State Bike Plan and during the field review as a part of the workshop. The following are examples of good existing bicycling conditions in Douglas County:

- Bike lanes
- Shared use path
- Wide shoulders
- Bike parking
- Bike shops
- Bike amenities and lodging

Similarly, the following are examples of non-desirable conditions that can be observed in Douglas County:

- Narrow shoulders
- No shoulders
- Pinch points for bicyclists
- Lack of directional signage
- Lack of amenities
- Lack of funding
- Development requirements to provide bicycle facilities not always followed
- Lack of advocates or champions

Figure 1 shows a map of the existing bicycle infrastructure in Douglas County and the U.S. Prioritized and Alternate Corridors within Nevada. In addition, the map shows major bicycle traffic generators. The U.S. Prioritized and Alternate Corridors are a preliminary designation by the American Association of State Highway and Transportation Officials (AASHTO) and Adventure Cycling Association with state and local officials responsible for designating the specific route within 50 miles of the highway corridor.



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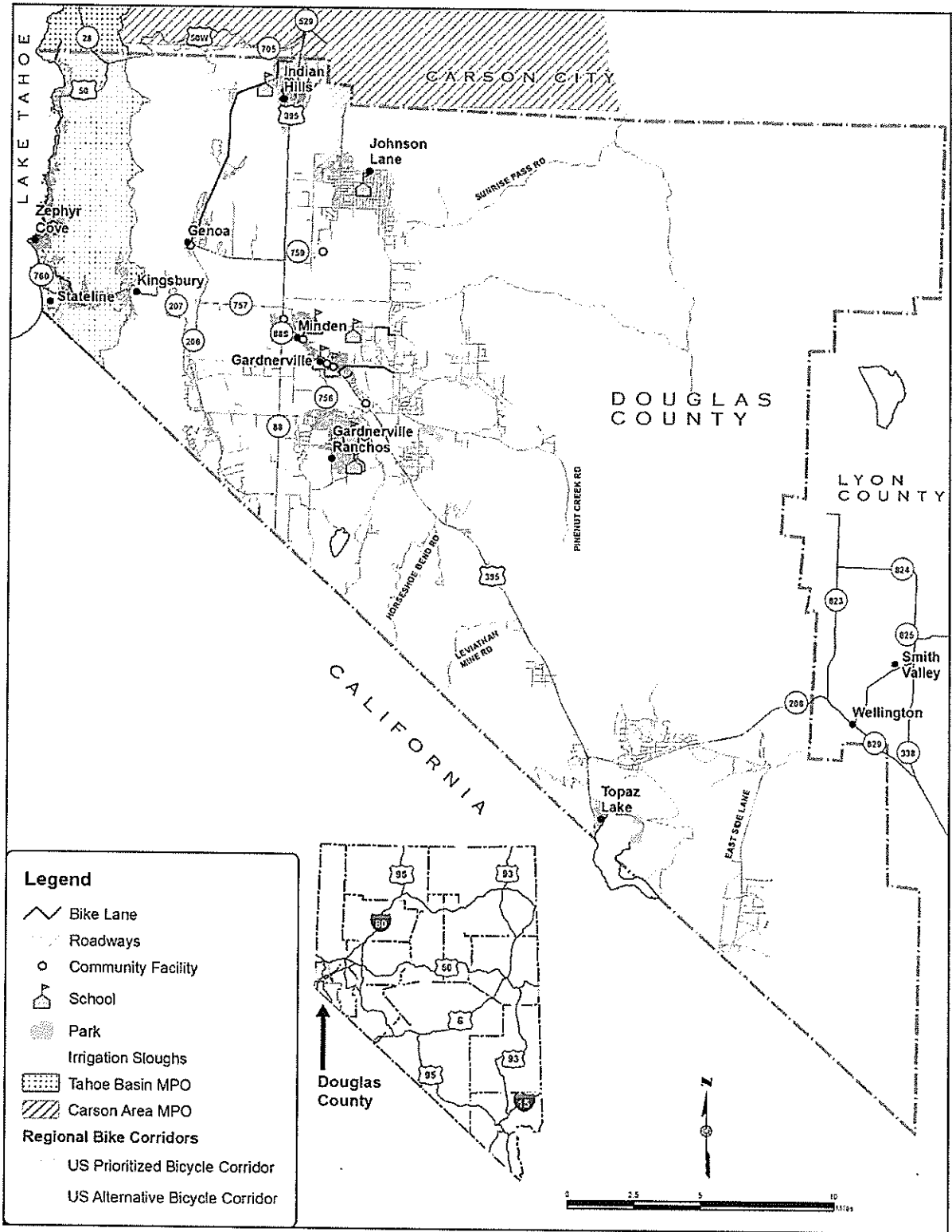


Figure 1 – Existing Bike Facilities and Corridors



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4.2 Existing Documents, Policies, Programs and Legislation

Existing bicycle related documents from Douglas County were collected as part of the development of the State Bike Plan. The following sections are a summary of bicycle related documents, policies, programs and legislation in Douglas County in matrix form (Table 1) and paragraph form.

Table 1 – Douglas Countywide – Existing Bicycling Documents, Policies, Programs, and Legislation

	Douglas County
Douglas County Comprehensive Trails Plan (Not Approved by NBAB) Existing/Proposed Facility Map	2003
Major Bikeway Initiatives	No
Laws	No
Policies	Yes
Safe Routes to School Program	Limited
Construction Standards	Yes
Maintenance Expectations and Protocols	No
Cycle Tourism Initiatives	No

4.2.1 Douglas County Comprehensive Trails Plan 2003

The purpose of the 2003 Douglas County’s Comprehensive Trails Plan was to provide enhancement and development of a coherent, workable community trails program which will assist towards the creation of a system of hard and soft surface multi-use paths, through Douglas County. The Plan established specific public access points, trailhead, and trail locations to be developed over the life of the Master Plan.

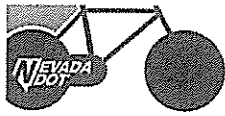
This Plan was submitted to the Nevada Bicycle Advisory Board (later changed to the Nevada Bicycle and Pedestrian Advisory Board) for adoption in 2010. On November 22, 2010, NDOT received a response letter stating the Board did Not Approve the Plan. The letter identified 13 issues that needed to be addressed for the Plan to be approved. A copy of that letter is included in **Appendix B**. The Douglas County Bicycle Plan addresses all of the 13 issues identified in the response letter.

4.2.2 Safe Routes to School Program

Douglas County has access to resources within the Carson City Health and Human Services Safe Routes to School Program (SRTS). The program incorporates the Five Es: evaluation, education, encouragement, engineering and enforcement. The goal of SRTS is to get more children bicycling and walking to schools safely on an everyday basis. This improves the built environment and increases opportunities for healthy physical activity for everyone. The State currently funds a SRTS coordinator who is available to assist the county and school district personnel in program expansion and implementation.

4.2.3 Construction Standards

The 1998 Douglas County Design Criteria and Improvement Standards include bicycle access (bicycle parking and bicycle connections), path design standards, roadway design standards with bike lane (urban) and shoulder (rural) bikeways, definitions as well as pedestrian access standards.



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4.2.4 Legislation

Although there was no specific bicycle related legislation identified in Douglas County, existing statewide legislation related to bicycling is summarized in Section 4.3.9 on Page 39 of the State Bicycle Plan.

4.3 Crash Data

As part of the State Bike Plan, bicycle crashes with motor vehicles were reviewed. NDOT annually completes a crash data review for the preceding 3 years. The most recent report is the 2008 to 2010. It is important to recognize that most bicycle crash data only includes bicycle crashes with motor vehicles that are significant enough to require a police report. The data included in NDOT's report does not include minor collisions with bicycles and motor vehicles that do not have a police report, nor does it include bicycle crashes that do not include a motorist (i.e., crashes between two bicycles or a single bicycle crash). The following is a summary of the bicycle and motor vehicle crashes for years 2008 to 2010 in Douglas County.

Table 2 – Summary of Churchill County Bicycle and Motor Vehicle Crashes 2008-2010

COUNTY	2008				2009				2010			
	TOTAL INJURY CRASHES	TOTAL INJURIES	TOTAL FATAL CRASHES	TOTAL FATALITIES	TOTAL INJURY CRASHES	TOTAL INJURIES	TOTAL FATAL CRASHES	TOTAL FATALITIES	TOTAL INJURY CRASHES	TOTAL INJURIES	TOTAL FATAL CRASHES	TOTAL FATALITIES
CARSON	11	12			6	6			8	8		
CHURCHILL	5	5	1	1	3	3			1	1		
DOUGLAS	6	6			9	9			10	10		
ELKO	3	3			4	4			1	1		
ESMERALDA												
EUREKA												
HUMBOLDT	2	2										
LANDER												
LINCOLN												
LYON	1	1			4	4			2	2		
MINERAL												
NYE					2	2			4	4		
PERSHING												
STOREY	1	1										
WASHOE	111	115			106	112	1	1	98	102	3	3
WHITE PINE												
TOTAL	383	395	7	7	555	572	6	6	504	527	6	6

Source: NDOT Crash Data Report 2008-2010

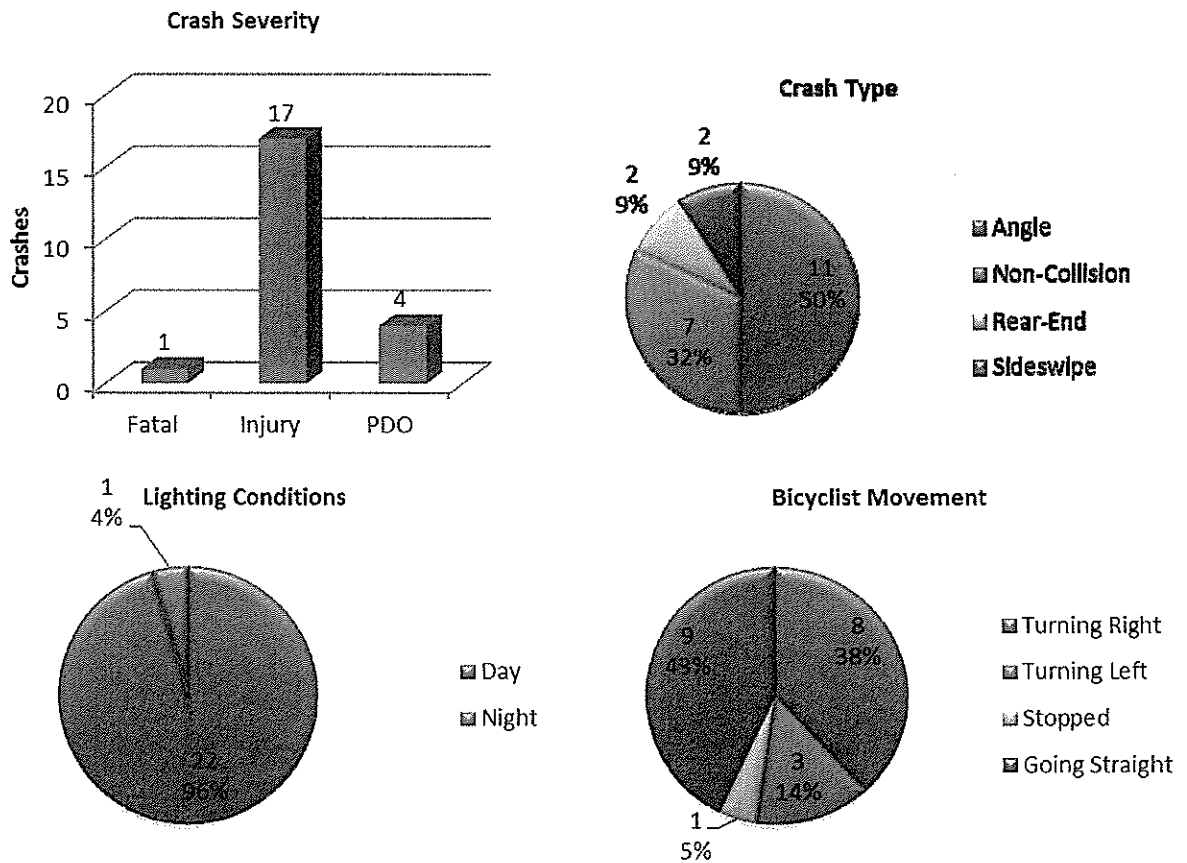
The following are additional key results from the NDOT crash data for all of the crashes that occurred outside of the four MPOs within Nevada between the years 2008 and 2010:

- Bicycle crashes trended up over the three years, but fatalities decreased slightly.
- Failure to yield is the most common motorist factor.
- Improper crossing and wrong side of road are most common bicyclist factor, followed by darting, failure to obey signs, signals or officer, and failure to yield right of way. Not visible, inattentive and lying in roadway are minor contributing factors.
- There are typically more bicycle crashes and fatalities per day on weekdays than on weekends. Most collisions are between 3 and 5 PM, with noon to 3 being secondary.

NDOT also provided Geographic Information System (GIS) bicycle crash data for Nevada from 2006 to 2011. The data is spatially located where the event occurred, and is coded with information related to the incident including crash severity and type. **Figure 2** contains a summary of the GIS crash data provided for Douglas County. **Figure 3** is a map to the exact location of each crash within Douglas County.

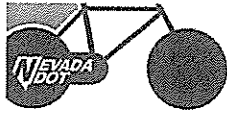


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Source: NDOT Crash Data 2006-2011

Figure 2 – Summary of Douglas County Bicycle and Motor Vehicle Crashes 2006-2011



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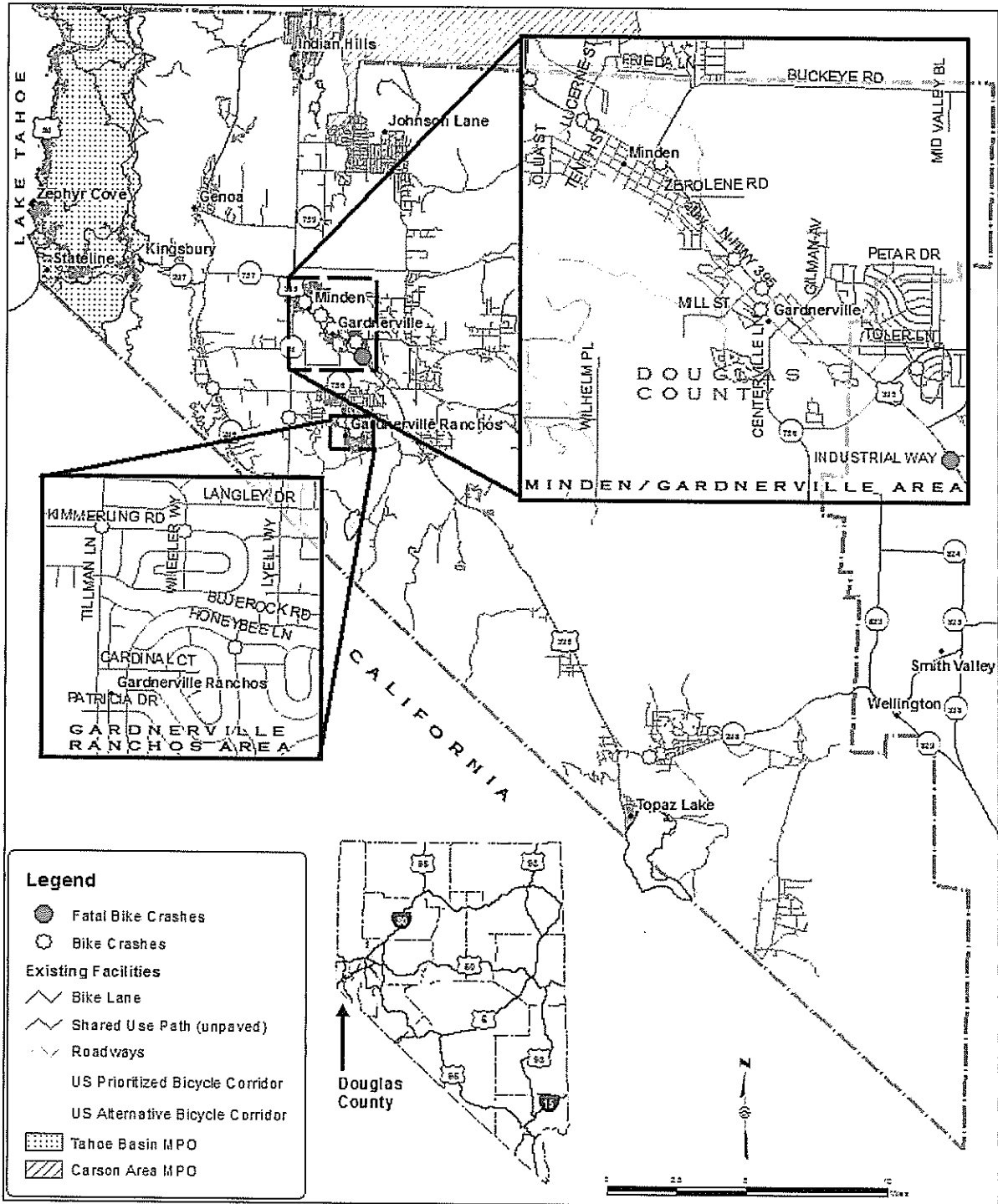


Figure 3 – Reported Bicycle and Motor Vehicle Crashes in Douglas County



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5. VISION, GOALS, AND OBJECTIVES

The Vision, Goals, and Objectives for the Douglas County Bicycle Plan are:

5.1 Vision

For Douglas County residents and visitors of all ages and abilities to experience a convenient, pleasant, and safe bicycling environment.

5.2 Goals

There are two major goals of the Douglas County Bicycling Program that will guide the specific objectives and strategies within this plan.

- Increase bicycling's mode share throughout Douglas County in and between communities, both by residents and tourists. *Define -*
- Reduce crashes involving bicyclists and eliminate all bicyclist fatalities in support of Nevada's "Zero Fatalities" and the national "Towards Zero Deaths" initiatives.

What about signage, maps & route education

5.3 Objectives

The following objectives are the specific tasks to be evaluated to determine the success of this Plan and bicycling in Nevada.

- Objective 1: Increase local support of bicycling
- Objective 2: Increase bicycle tourism
- Objective 3: Accommodate appropriate bicycling facilities on all roadways in Nevada open to bicycling
- Objective 4: Increase motorists and bicyclists compliance with laws associated with bicycling

Douglas County

5.4 Strategies in Support of Objectives

The following strategies have been developed to support the four main objectives of this Plan.

Objective 1: Increase Local Support of Bicycling

Strategy 1A: Improve the connectivity of bicycle facilities between population centers in a safe and effective manner.

Strategy 1B: Provide guidance and technical support to the local jurisdictions, including the towns and general improvement districts for developing bicycle plans that are consistent with the County and State Bicycle Plans.

Strategy 1D: Douglas County should collaborate with the towns and general improvement districts to employ consistent design and maintenance policies for bicycle facilities.

Strategy 1E:

Strategy 1F: To work with local agencies on the creation of funding mechanisms for bicycle related projects. *LD Plans?*

Strategy 1G: To collaborate with local agencies in applying for available state and federal funding opportunities and programs that are available for bicycle related projects.

Strategy 1H: To work with the Douglas County School District and other health advocates and agencies to promote bicycling as part of a healthy lifestyle for children and adults, including SRTS, Bike Month, and Nevada Moves Day.



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Strategy 1: To work with the Douglas County School District, Towns, and General Improvement Districts to develop bicycle plans that identify safe routes and identify needed bike facilities for each school and incorporate the needs of each school into the County's Community Development overall planning.

Strategy 2 Increase Bicycle Tourism

Strategy 2A: To encourage the County's Economic Vitality Division to collaborate with the State's Office of Economic Development, local governmental agencies, and business organizations to promote bicycle tourism.

Strategy 2B: If supported by local business and local agencies, the County should assist in the development of bicycle tourism materials related to road and mountain bicycling, including maps that show destinations and designated routes.

Strategy 2C: To encourage NDOT to establish US Bicycle Routes and regional bicycle routes in Douglas County, Nevada.

LAND MARKER SIGNS

Strategy 2D: To review the County's existing permit process for bicycle events, and if needed, develop a streamlined permitting process that establishes clear rules and guidelines along with acceptable temporary wayfinding methods.

Strategy 3 Accommodate appropriate bicycling facilities on all roadways in Nevada open to bicycling

Douglas County

Strategy 3A: To adopt Countywide design guidelines and specifications that address bicycle facility design, including wayfinding and informational signs, and accommodating bicycle facilities in work zones.

Strategy 3B: Develop protocols with the state and local agencies that review maintenance projects which require restriping, to evaluate redesign options for adding bicycle facilities.

Strategy 3C: County to define, inventory, and preserve, as necessary, alternate corridors such as railroad, irrigation easements, utility, and roadway rights-of-way for bicycling.

Strategy 3D: County to maintain and evaluate, every two years, a list of high priority bicycle improvement projects.

Strategy 3E: Strengthen requirements for developers to provide the space for a bicycle facility through street design standards. Provide guidance on when developer is to install the bicycle facility and when the developer must provide the space and funding for a future County improvement if it is not appropriate to install the facility at the time of development.

Strategy 4 Increase motorists and bicyclists compliance with laws associated with bicycling

Strategy 4A: County, in partnership with the state, local, and private sector organizations, will encourage bicycle training for youth and adult bicyclists.

Strategy 4B: County should provide assistance with state and local bicycle media and safety campaigns, materials, and outreach.

Strategy 4C: County should work with the Douglas County Sheriff's Office and state law enforcement agencies to encourage the enforcement of state laws related to bicycling from a motorist's and bicyclist's perspective, regarding unsafe and unlawful behaviors.

Strategy 4D: County to encourage a state sponsored Bicycle Infraction Diversion Program that allows violators of bicycling related infractions (motorists and bicyclists) to complete a training course instead of paying a fine.

Strategy 4E: County to continue to work with advocates and the state to address legislative issues and needed changes related to bicycling during Nevada's bi-annual legislative sessions.



6. RECOMMENDED BICYCLE NETWORK

Recommendations within the State Bicycle Plan are based upon the Vision, Goals and Objectives developed from the review of existing conditions and bicyclists' needs discovered through public input and stakeholder improvement processes.

The Douglas County Bike Plan's primary focus is to document the proposed bicycle infrastructure in Douglas County. The facility recommendations take into account that bicycle accommodation is not a one size fits all approach and that bicycling accommodation should be responsive to the preferences of different bicycling user groups and trip types. The 2012 AASHTO Guide for the Development of Bicycle Facilities (2012 AASHTO Bike Guide) defines two user groups based on bicyclist skill and comfort level:

Experienced and Confident:

- Most comfortable riding with vehicles on streets and are able to navigate streets like a motor vehicle, including using the full width of a narrow travel lane when appropriate and using left-turn lanes
- While comfortable on most streets, some prefer on-street bike lanes, paved shoulders or shared use paths when available
- Ride with the flow of traffic on streets and avoid riding on sidewalks
- Typically ride at speeds of 15 to 25 miles per hour on level grades and can reach up to 45 miles per hour on steep descents

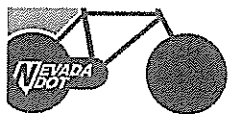
Casual and Less Confident:

- Prefer shared use paths, bicycle boulevards, or bike lanes along low-volume streets
- May have difficulty gauging traffic and may be unfamiliar with rules of the road as they pertain to bicyclists; more likely to walk bike across intersections
- May use less direct route to avoid arterials with heavy traffic volumes
- May ride on sidewalk if no on-street facility is available
- Typically ride around 8 to 12 miles per hour
- Typically cycle shorter distances, one to five miles

Bicyclists generally also have different preferences based on if the trip is local versus long distance. Local trips are often more utilitarian (e.g., biking to a shopping destination or school) and long trips more recreational (e.g., biking for exercise or sport), although there are also short recreation trips and long utilitarian trips. Local trips typically do not go much further beyond the populated area; whereas, long distance trips may be cross-state, touring type trips, or regional trips between destinations. These trip types are also based on information in the 2012 AASHTO Bike Guide and generally have the following characteristics:

Long-Distance Trips:

- Directness of route not as important as visual interest, shade, and protection from wind
- Loop trips may be preferred to back tracking; start and end points are often the same with an exception being bicycle touring trips
- Trips typically range from under a mile to over 50 miles
- Short term parking is needed at recreational sites, parks, trailheads and other activity centers
- Varied topography may be desired, depending on the fitness and skill level of the bicyclist
- More likely to be riding in a group
- Sometimes drive with bicycle to starting point of ride



- Typically ride on the weekend or on weekday before or after commute hours

Local Trips:

- Directness of route and connected, continuous facilities more important
- Trips generally travel from residential to schools, shopping or work areas
- Trips typically range from 1 to 10 miles in length
- Short-term and long-term bicycle parking is needed at destinations
- Flat topography preferred
- Often ride individually
- Bicycle is primary mode of transportation for the trip; may transfer to public transportation and may not have access to a car for the trip

Table 2 summarizes the preferences of both trip types for the two user groups.

Table 3 – User Group and Trip Types

		Experienced/Confident Bicyclists		Casual/Less Confident Bicyclists	
		Long Distance	Local	Long Distance	Local
Facility Type	Bicycle Lane	✓	✓	✓	✓
	Paved Shoulder	✓	✓	✓	✓
	Shared Lanes	✓	✓		
	Marked Shared Lanes		✓		✓
	Shared Use Path			✓	✓

As displayed in Table 2, all of the different facility types are preferred by at least one particular user group for either a local or long distance trip. Therefore, the recommendations of this Plan recognize that all of these different facility types serve a particular purpose and should be considered for particular conditions and in some cases two facilities may be appropriate within the same area or corridor.

6.1 Bicycle Facility Types

The following bicycle facility type terms and descriptions from the 2012 AASHTO Guide for the Development of Bicycle Facilities (AASHTO Bike Guide) will be used for this plan:

On-street Bicycle Facilities

- Shared Lane – Bicycles may be operated on all roadways except where prohibited by statute or regulation. There are no roadways in Douglas County that prohibit bicycles. Generally speaking, roadways that carry very low to low volumes of traffic, and may also have traffic typically operating at low speeds, may be suitable as shared lanes in their present condition.
- Marked Shared Lane – In situations where it is desirable to provide a higher level of guidance to bicyclists and motorists, marked shared lanes include the shared-lane marking.
- Paved Shoulder – adding or improving paved shoulders can greatly improve bicyclists’ accommodation on roadway with higher speeds or traffic volumes as well as benefit motorists, and are most often used on rural roadways.



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- Add description of buffered bike lanes.
- **Bike Lane** – a portion of the roadway designated for preferential use by bicyclists. One-way facilities that typically carry bicycle traffic in the same direction as adjacent motor vehicle traffic. Bike lanes are the appropriate and preferred bicycle facilities for thoroughfares in both urban and suburban areas.
- **Bicycle Boulevard** – A bicycle boulevard is a local street or series of continuous street segments that have been modified to function as a through street for bicyclists, while discouraging through automobile travel.

Off-street Bicycle Facility

- **Shared Use Path** – Bikeways that are physically separated from motorized vehicular traffic by an open space or barrier and either within the highway right-of-way or within an independent right-of-way. Paths are most commonly designed for two-way travel. Shared use paths can be paved or unpaved. A paved surface is generally preferred over un-paved surfaces, however unpaved surface may be appropriate on rural paths or as a temporary measure before funding is available for paving.
- **Side-path** – a shared use path that is adjacent to a roadway. Provision for a side-path is not a substitute for an on-street bicycle accommodation. Side-paths can create operational issues, but can function along highway for short sections, or for longer sections where there are few street and/or driveway crossings.

All bicycle facilities recommended in this Plan should be designed and constructed based on the most current version of the AASHTO Guide for the Development of Bicycle Facilities, the National Association of City Transportation Officials (NACTO) Urban Bikeway Design Guide and any applicable NDOT and County design standards. In addition to the recommended on-street and off-street bicycle facilities, individual improvement projects should include:

- Signage and marking
- Bicycle guide signs and wayfinding
- Bicycle parking at destinations
- Roadway crossings and intersection accommodations (including signal detection)

Schools within Douglas County are a part of the SRTS Program operated by Carson City Health and Human Services. As such, the bicycle facility recommendations took into account SRTS within Douglas County.

6.2 Bicycle Network

The Bicycle Network identified as part of this Plan is included in the following Figures:

- **Figure 4** – Bicycle Network – Douglas County
- **Figure 5** – Bicycle Network – Genoa
- **Figure 6** – Bicycle Network – Minden
- **Figure 7** – Bicycle Network – Gardnerville
- **Figure 8** – Bicycle Network – Gardnerville Ranchos
- **Figure 9** – Bicycle Network – Johnson Lane and Indian Hills



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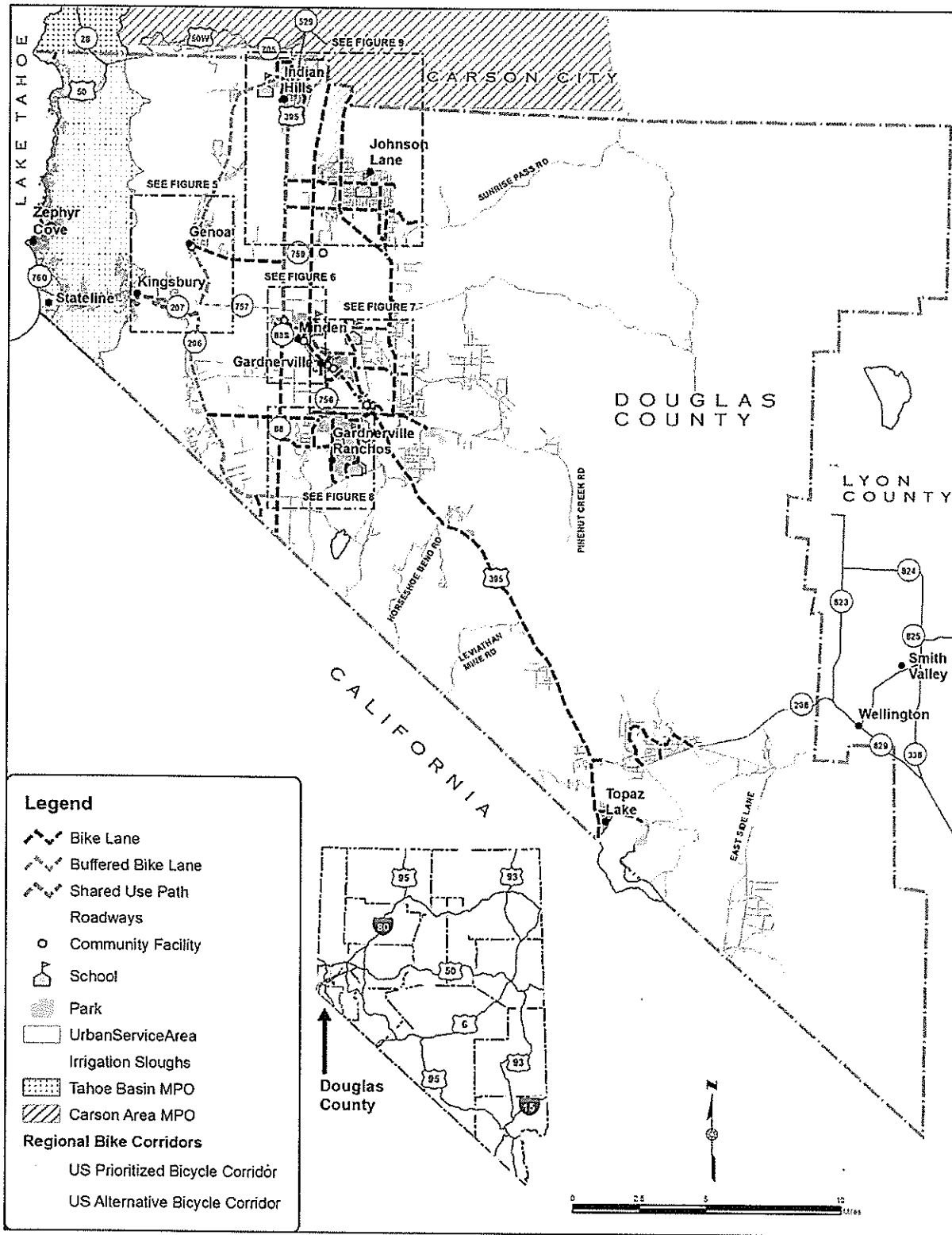


Figure 4 – Bicycle Network – Douglas County

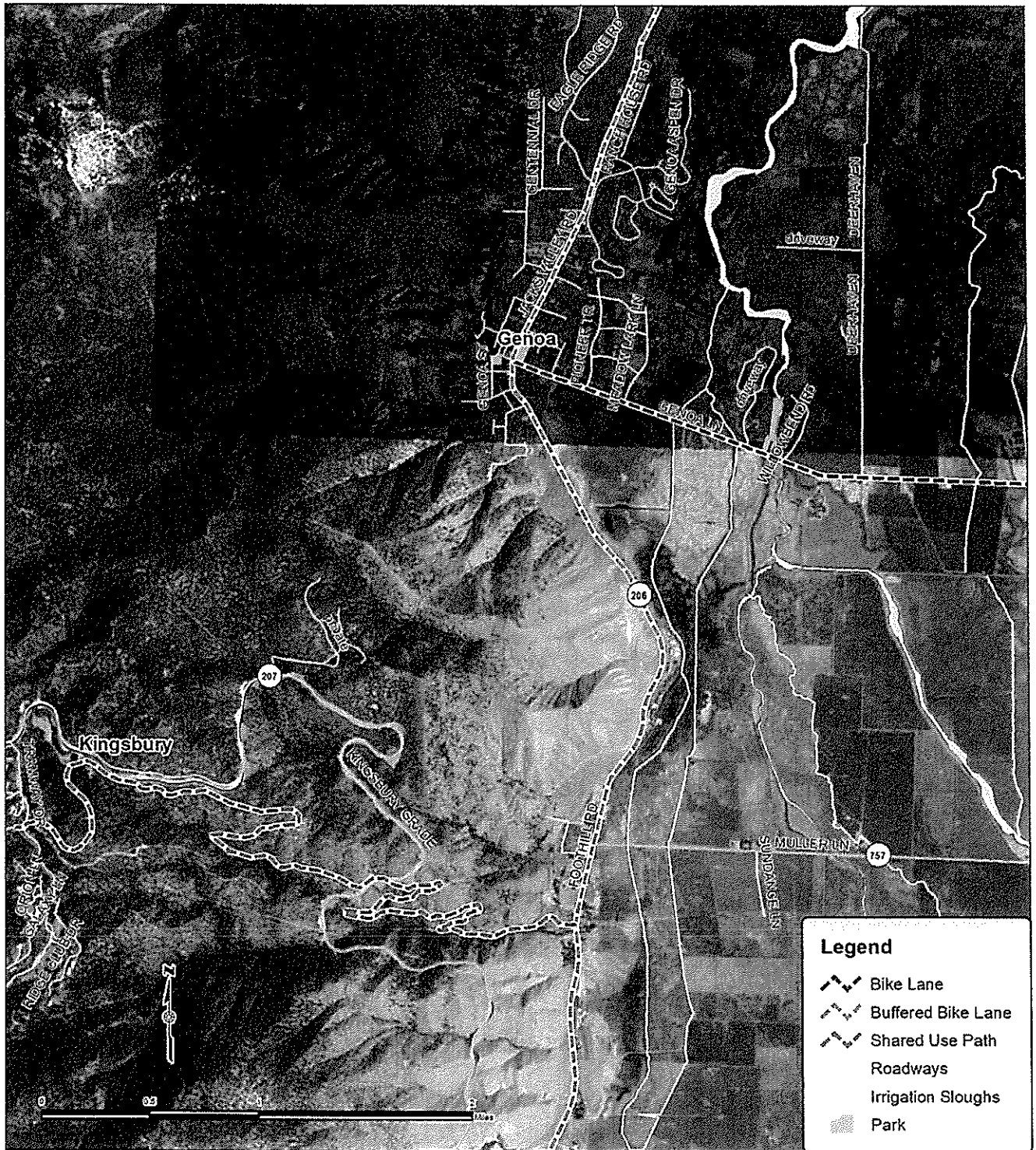


Figure 5 – Bicycle Network – Genoa



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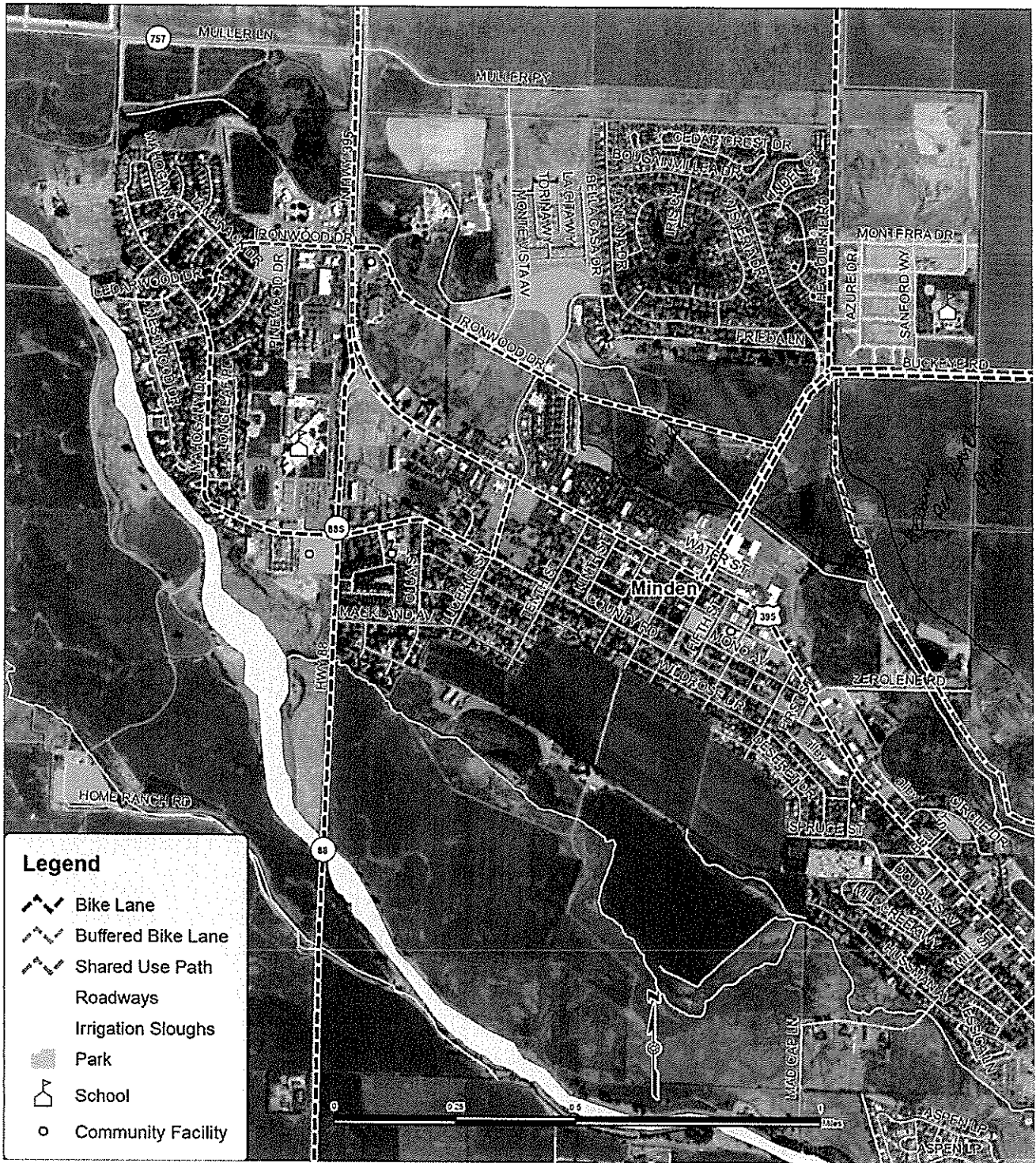


Figure 6 – Bicycle Network – Minden



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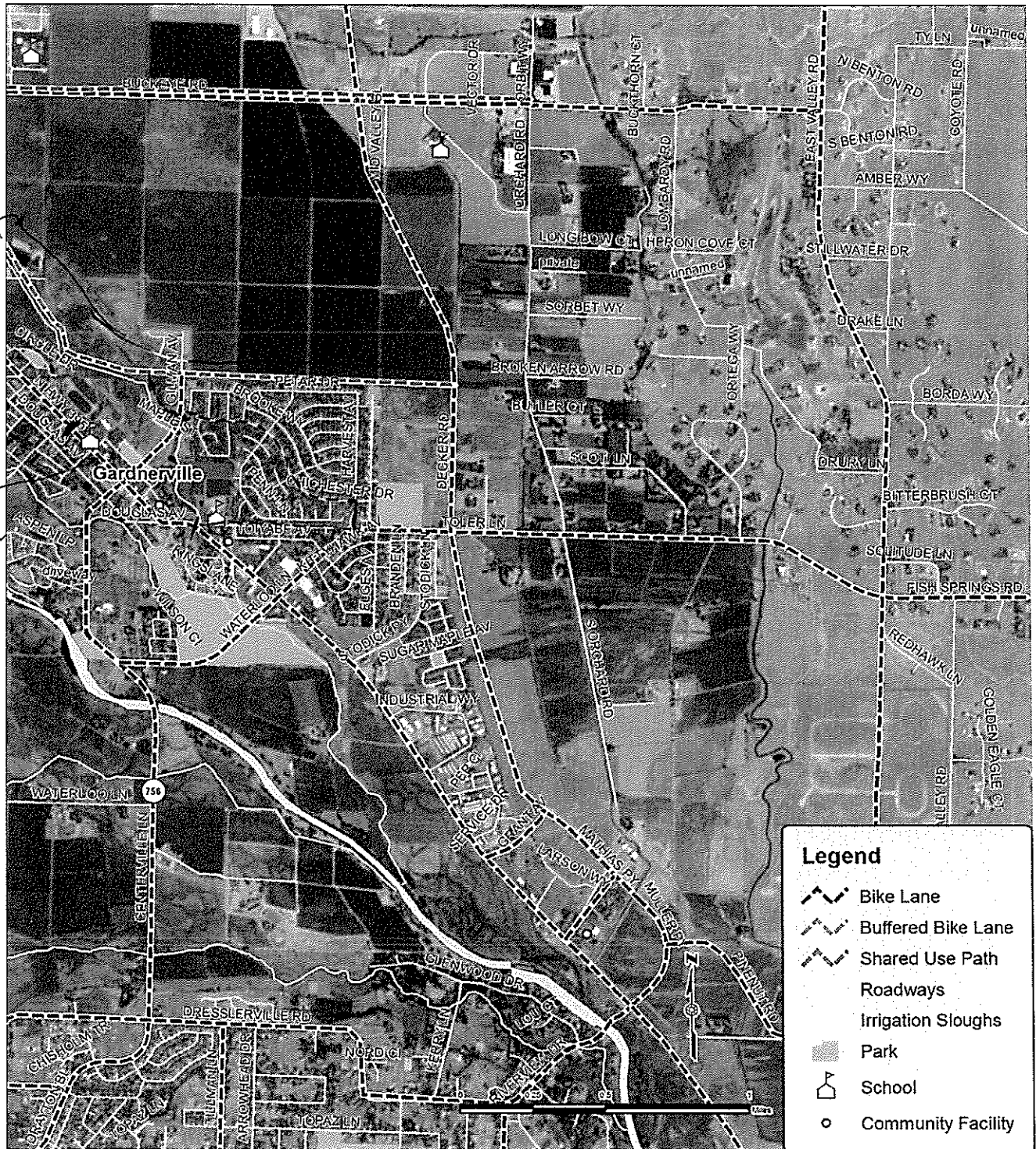
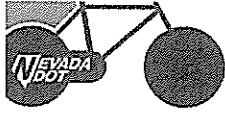


Figure 7 – Bicycle Network – Gardnerville



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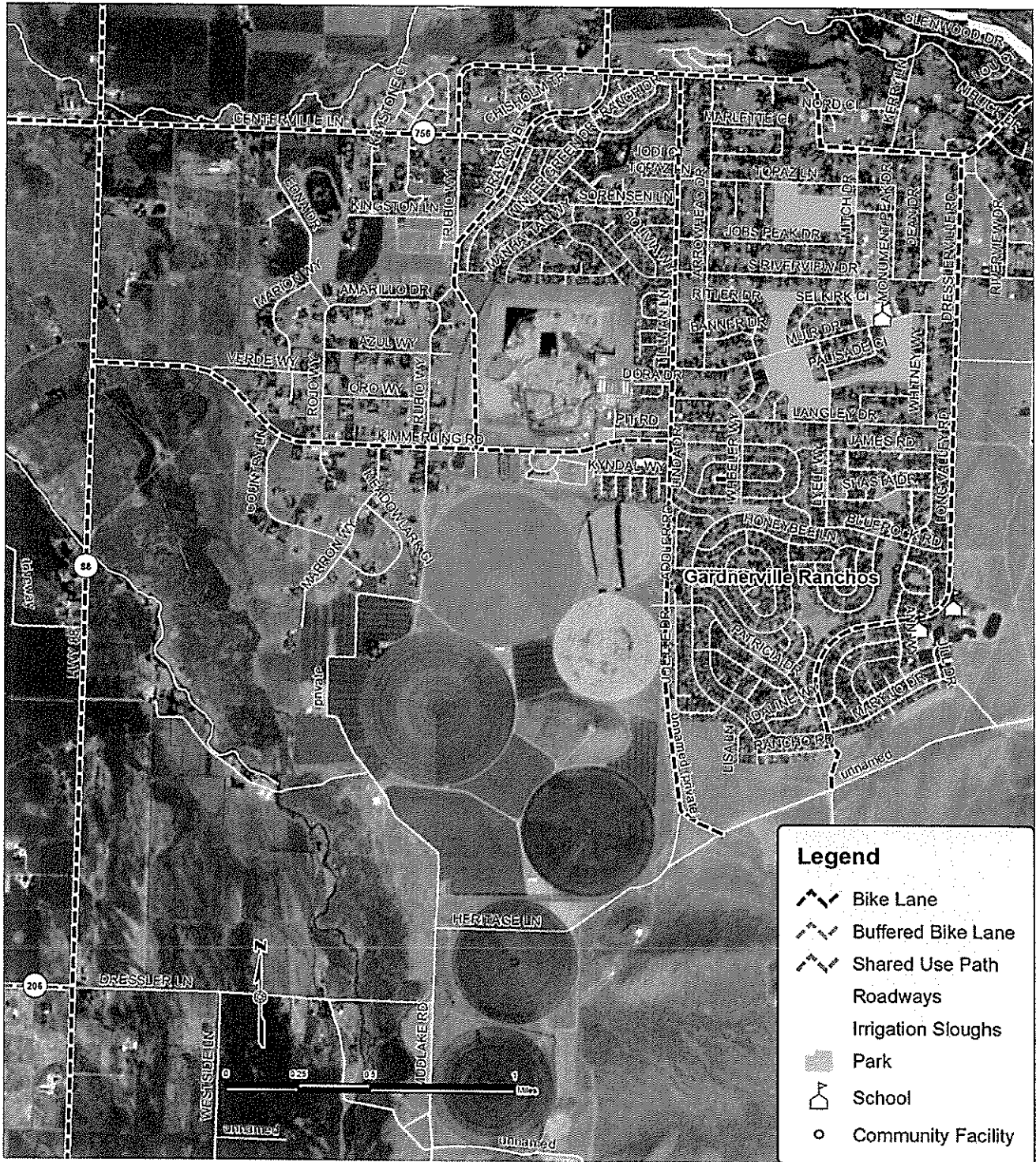


Figure 8 – Bicycle Network – Gardnerville Ranchos



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Figure 9 – Bicycle Network – Johnson Lane and Indian Hills



7. FUNDING

Funding bicycling improvements can come from federal, state, and local sources. At the state level, Plan recommendations may be implemented by incorporating bicycle infrastructure local improvements into NDOT's Statewide Transportation Improvement Program. Localities may take similar actions by dedicating staff and budget resources to support bicycle planning and programs (e.g., education, encouragement, and enforcement), incorporating bicycle improvements into capital improvement programs, and routinely accommodating bicycle facilities when making major roadway improvements.

Federal transportation funding is an important source of funding for states and localities. With passage of the most recent federal transportation bill, Moving Ahead for Progress in the 21st Century Act (MAP-21), the Transportation Enhancements, SRTS, Recreational Trails, and redevelopment of underused highways to boulevards programs have been consolidated into the Transportation Alternatives Program (TAP). The TAP builds upon the legacy of the Transportation Enhancement program by expanding travel choices, strengthening the local economy, improving the quality of life, and protecting the environment.

The TAP is one component of the total federal transportation funding apportionment that states receive. Other programs that are part of the federal apportionment to states, and which could be important for supporting this Plan's recommendations, include the National Highway Performance Program, the Surface Transportation Program (STP), and the Highway Safety Improvement Program (HSIP). The Section 402 State and Community Highway Safety Grant Program is another potential source of funding for certain types of projects that may benefit bicyclists. The following are details for each of these funding sources.

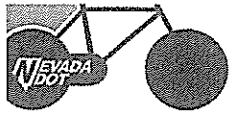
7.1 Transportation Alternatives

MAP-21 gives states more flexibility in how they allocate federal monies. States have the option to increase funding that supports walking and bicycling, keep funding levels the same, or decrease funding. Under the new bill, state DOTs are to distribute 50% of TAP funding to defined Transportation Management Areas (TMA), which consist of cities or metro areas with populations greater than 200,000. TMAs (Regional Transportation Commissions in Nevada and often MPOs) are required to distribute these funds through a competitive grant process. The other 50% of funds are distributed directly by state DOTs through a competitive grant process with no sub-allocation of funding by population. Governors are given the authority to opt-in or out of the Recreational Trails program on an annual basis. If they choose to opt-out funding set aside for the Recreational Trails program automatically goes into the TAP.

7.1.1 Eligible Activities for Transportation Alternatives Program

The following activities are eligible to receive funding from TAP:

- Construction, planning, and design of on-road and off-road trail facilities for pedestrians, bicyclists, and other nonmotorized forms of transportation, including sidewalks, bicycle infrastructure, pedestrian and bicycle signals, traffic calming techniques, lighting and other safety-related infrastructure, and transportation projects to achieve compliance with the Americans with Disabilities Act of 1990.
- Construction, planning, and design of infrastructure-related projects and systems that will provide safe routes for non-drivers, including children, older adults, and individuals with disabilities to access daily needs.
- Conversion and use of abandoned railroad corridors for trails for pedestrians, bicyclists, or other nonmotorized transportation users.
- Construction of turnouts, overlooks, and viewing areas.
- Inventory, control, or removal of outdoor advertising.



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- Historic preservation and rehabilitation of historic transportation facilities.
- Vegetation management practices in transportation rights-of-way to improve roadway safety, prevent against invasive species, and provide erosion control.
- Archaeological activities relating to impacts from implementation of a transportation project eligible under this title.
- Any environmental mitigation activity, including pollution prevention and pollution abatement activities and mitigation to address stormwater management, control, and water pollution prevention or abatement related to highway construction or due to highway runoff, including activities described in sections 133(b)(11), 328(a), and 329; or reduce vehicle-caused wildlife mortality or to restore and maintain connectivity among terrestrial or aquatic habitats.

In addition to the eligibilities listed above from Section 101 of MAP-21, eligible TAP projects also include any projects eligible under the Recreational Trails Program or SRTS Program. Major changes to SRTS funding include elimination of the requirement that states spend between 10 and 30 percent of SRTS funds on non-infrastructure activities (e.g., public awareness campaigns and outreach to press and community leaders, traffic education and enforcement, student training, and funding for training, volunteers, and managers of SRTS programs), and state SRTS coordinators are no longer mandated, but are an eligible use of funds. Law enforcement activities within 2 miles of a K-8 school remain eligible for funding as SRTS projects. SRTS-related law enforcement activities can also be funded by HSIP funds, if SRTS is identified in the Strategic Highway Safety Plan (SHSP).

Eligible TAP projects also include the “planning, designing, or constructing boulevards and other roadways largely in the right-of-way of former Interstate System routes or other divided highways” as stated in Section 213(b)(4) of title 23 U.S.C. Lastly, although the language for the national Scenic Byways program will stay intact, funding for projects has not been included in the new transportation bill. There will be no national Scenic Byways funding program.

The TAP is a part of the Federal-aid Highway Program. Although the program is a “grant” program under federal regulation, it is not an “up-front” grant program and funds are available only on a reimbursement basis. Only after a project has been approved by the State Department of Transportation or MPO and the Federal Highway Administration (FHWA) division office can costs become eligible for reimbursement. This means project sponsors must incur the cost of the project prior to being repaid. Costs must be incurred after FHWA division office project approval or they are not eligible for reimbursement.

7.1.2 Relevance of MAP-21 to the Douglas County Bicycle Plan

Funding from MAP-21’s TAP may be instrumental for making bicycling improvements in areas such as Douglas County with a population less than 200,000. For areas with populations less than 200,000, MAP-21 directs state DOTs to administer a competitive grant process.

Recreational trails, and the development of new trails, are an important component of Douglas County’s bicycling system, and therefore the Recreational Trails program could prove to be a vital funding source for expanding the county’s trail system.

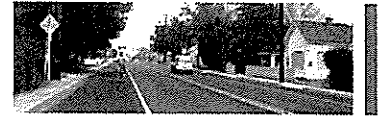
More information, including updates, on MAP-21 and final rulemaking can be found at Advocacy Advance <http://www.advocacyadvance.org/MAP21> and from the FHWA at <http://www.fhwa.dot.gov/map21/>.

7.2 Surface Transportation Program

The STP provides flexible funding that may be used by States and localities for projects on any Federal-aid highway, including the National Highway System (NHS), bridge projects on any public road, transit capital



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projects, and intracity and intercity bus terminals and facilities. Among the eligible activities under STP are projects relating to intersections that: have disproportionately high accident rates; have high congestion; and are located on a Federal-aid highway.

7.3 Highway Safety Improvement Program

The HSIP emphasizes a data-driven, strategic approach to improving highway safety that focuses on results. A highway safety improvement project corrects or improves a hazardous road location, or addresses a highway safety problem. Funds may be used for projects on any public road or publicly owned bicycle and pedestrian pathway or trail. Each State must have a SHSP to be eligible to use up to 10 percent of its HSIP funds for other safety projects under 23 USC (including education, enforcement and emergency medical services).

7.4 State and Community Highway Safety Grant Program

Highway Safety Funds are used to support State and community programs to reduce deaths and injuries on the highways. In each State, funds are administered by the Governor's Representative for Highway Safety. Pedestrian safety has been identified as a National Priority Area and is therefore eligible for Section 402 funds. Section 402 funds can be used for a variety of safety initiatives including conducting data analyses, developing safety education programs, and conducting community-wide pedestrian safety campaigns. Since the 402 Program is jointly administered by the National Highway Traffic Safety Administration (NHTSA) and FHWA, Highway Safety Funds can also be used for some limited safety-related engineering projects. A State is eligible for these formula grants by submitting a Performance Plan, which establishes goals and performance measures to improve highway safety in the State, and a Highway Safety Plan, which describes activities to achieve those goals.

Additional information is available from the following web sites:

- NHTSA 402 Programs and Grants
 - <http://www.nhtsa.gov/>
- Traffic Safety Fact Sheets for Section 402 and Related Programs
 - <http://www.nhtsa.gov/Laws+&+Regulations/Section+402+SAFETEA-LU+Fact+Sheet>
- Uniform Guidelines for State Highway Safety Programs
 - <http://www.nhtsa.gov/nhtsa/whatsup/tea21/tea21programs/>
- Traffic Safety Fact Sheets—Links to laws
 - <http://www.nhtsa.dot.gov/people/injury/TSFLaws/PDFs/810728W.pdf>

7.5 National Highway Performance Program

The National Highway Performance Program (NHPP) provides support for the condition and performance of the NHS, for the construction of new facilities on the NHS, and to ensure that investments of Federal-aid funds in highway construction are directed to support progress toward the achievement of performance targets established in a State's asset management plan for the NHS.

NHPP projects must be on an eligible facility and support progress toward achievement of national performance goals for improving infrastructure condition, safety, mobility, or freight movement on the NHS, and be consistent with Metropolitan and Statewide planning requirements. Eligible activities include:

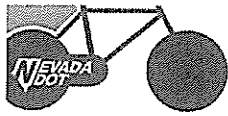
- Construction, reconstruction, resurfacing, restoration, rehabilitation, preservation, or operational improvements of NHS segments.



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- Construction, replacement (including replacement with fill material), rehabilitation, preservation, and protection (including scour countermeasures, seismic retrofits, impact protection measures, security countermeasures, and protection against extreme events) of NHS bridges and tunnels.
- Bridge and tunnel inspection and evaluation on the NHS and inspection and evaluation of other NHS highway infrastructure assets.
- Training of bridge and tunnel inspectors.



8. IMPLEMENTATION PLAN

8.1 Introduction

This Plan primarily contains infrastructure improvement recommendations for Douglas County. While there are a number of criteria that could be considered when prioritizing what actions and roadway improvements to pursue and when, this Plan focuses on projects and programs that are pragmatic, e.g., low cost/high benefit and result in improved mobility for all roadway users. Recommendations have been prioritized using the following criteria:

- Level of expected improvement to bicycle mobility and safety
- Degree to which action is likely to encourage ridership
- Stakeholder input
- Feasibility in terms of required funding and staff resources and level of coordination

Recommendations that meet multiple criteria are favored in the short-term, particularly those recommendations that are relatively low cost/high benefit.

8.2 High Priority Bicycle Improvement Projects

Table 4 is a list of high priority bicycle improvement projects identified through the creation of this plan. The initial projects list was developed through the two day bike plan workshop where input was collected from individuals representing local, regional and state agencies or organizations and a few members of the public who participated in the workshop. Some of these projects were originally identified in the 2003 trail plan developed by Douglas County.

Table 4 – High Priority Bicycle Improvement Projects

Improvement Projects	
	Bicycle Lane: Centerville Lane, Hwy. 395 to Dresslerville Road
*	?
	Bicycle Lane: Buckeye Road, Hwy 395 to Orchard Road
	Bicycle Lane: Hwy 395, Riverview Drive to Ironwood Lane
	Buffered Bicycle Lane: Jacks Valley Rd/Foothill Road, 395 to Highway 88 (Pony Express Route)
	Bicycle Lane: Tillman Lane, Kimmerling Road to Dresslerville Road
	Bicycle Lane, Vista Grande – Jacks Valley Road to Clear Creek (future road connection)
*	Shared ?
	Shared Use Path: Old Kingsbury ROW
	Shared Use Path: Virginia and Truckee ROW

* - ADD PER Reference?

CANT GET FROM MILL TO TOLER

*All bicycle facilities should be designed and constructed based on the most current version of the AASHTO Guide for the Development of Bicycle Facilities, the NACTO Urban Bikeway Design Guide and any applicable NDOT and County design standards.



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8.3 Douglas County Bicycle Advisory Committee

Implementing this Plan and improving bicycling conditions in Douglas County will depend on collaboration and cooperation among county, local, and state representatives as well as bicycle advocates. In order to keep momentum on implementation of this Plan, it is recommended that Douglas County initiate a Bicycle Advisory Committee and/or a Bicycle and Pedestrian Advisory Committee.

8.4 Bicycle Facility Design Training

It is recommended that Douglas County coordinate with state or national training resources to have key staff attend bicycle facility design training, such as the one day bicycle facility design course hosted as part of the State Bike Plan in 2012.

8.5 Complete Streets Policy

In support of Strategy 1B of the State Bike Plan, it is recommended that Douglas County adopt a complete streets policy. The following is the recommended policy included in the State Bike Plan, see page 58 of the State Bike Plan for more information.

“Douglas County shall provide for the needs of motor vehicle drivers, public transportation vehicles and patrons, bicyclists, and pedestrians of all ages and abilities in all planning, programming, design, construction, reconstruction, retrofit, operations, and maintenance activities and products. Douglas County shall view all transportation improvements as opportunities to improve safety, access, and mobility for all travelers in Nevada and recognizes bicycle, pedestrian, and transit modes as integral elements of the transportation system.”

8.6 Education and Enforcement

It is recommended that in coordination with the facility improvements recommended in this plan, that Douglas County focus on educational and enforcement strategies identified in the State Bike Plan. See the State Bike Plan Implementation Matrix on Pages 89 to 96 of the State Bike Plan for more details.



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**APPENDIX A
NOTES FROM COUNTWIDE OBSERVATIONS**

Field Review Notes (Not Final Recommendations)

EXISTING			PROPOSED							
ID	STREET NAME	FROM	TO	ONEWAY	NUMBER LANES	MEDIAN	WIDTH	RECOMMENDED FACILITY	RECOMMENDED ACTION	CROSS SECTION WIDTH
D001	Spurce Street	Willrose Drive	Douglas Avenue	N	2	NONE	37	BBldvd	W	0
D002	Douglas Avenue	Spurce Street	Gilman Avenue	N	2	NONE	37	BBldvd	W	0
D003	Gilman Avenue	Douglas Avenue	Cottonwood Slough	N	2	NONE	44	BL	RD	44
D004	Gilman Avenue	Cottonwood Slough	Dressler Road	N	2	NONE	27	BL	WS	34
D005	Drayton Boulevard	Dressler Road	Pleasantview Drive	N	2	Striped	38	BL	RS	38
D006	Pleasantview Drive	Drayton Boulevard	Rubio Way	N	2	NONE	28	BL	WS	34
D007	Centerville Lane	Rubio Way	Edna Drive	N	2	Striped	44	BL	RS	44
D008	Centerville Lane	Edna Drive	HWY 88	N	2	Striped	26	PS	WS	32
D009	Centerville Lane	HWY 88	Foothill Road	N	2	Striped	24	PS	WS	32
D010	Foothill Road	Centerville Lane	Fredericksburg Road	N	2	Striped	25	BFBL (1)	WS	40
D011	Foothill Road	Foothill Road	HWY 88	N	2	Striped	24	BL	WS	34
D012	Fredericksburg Road	Foothill Road	CA State Line	N	2	Striped	23	SR	NAC	0
D013	Dressler Lane	HWY 88	Mudlake Road	N	2	Striped	33.5	PS	WS	36
D014	HWY 88	Dressler Lane	Kimberling Road	N	2	Striped	28	PS	WS	32
D015	Kimberling Road	HWY 88	Rubio Way	N	2	Striped	38.5	BL	WS	43
D016	Kimberling Road	Rubio Way	Tillman Lane	N	2	Striped	35	SRD	NAC	0
D017	Tillman Lane	Kimberling Road	Redwood Circle	N	2	Striped	24	BL	MC	44
D018	Tillman Lane	Redwood Circle	Dressler Road	N	2	Striped	24	SH	RS	0
D019	Dressler Lane	Tillman Lane	River View Drive	N	2	Striped	24	PS	WS	32
D020	Mitch Drive	Dressler Lane	Muir Drive	N	2	NONE	0	SRD	NAC	0
D021	Mitch Drive	Mitch Drive	Dressler Road	N	2	NONE	0	SRD	NAC	0
D022	Long Valley Road	Dressler Road	Bluerock Road	N	2	Striped	44	BL	MC	44
D023	Bluerock Road	Patricia Drive	Cardinal Court	N	2	Striped	61	SH	RS	0
D024	Open Space	Lyle Way	Lyle Way	N	0	NONE	0			0
D025	Langley Drive	Tillman Lane	Long Valley Road	N	2	Striped	25	SH	NAC	0
D026	Muir Drive	Tillman Lane	Mitch Drive	N	2	NONE	0	SH	NAC	0
D027	Riverview Drive	Dressler Road	Fairway Drive	N	2	Striped	24	CT1-1 WB, SH, EB	RS	18
D028	Riverview Drive	Fairway Drive	HWY 395	N	2	Striped	36	BL	FS	0
D029	Glenwood Drive	Carson River	Carson River	N	0	NONE	0	BL	FS	0
D030	Mueller Parkway	HWY 395	Pinecut Road	N	2	Curb	0		FS	0
D031	Pinecut Road	Mueller Parkway	Sawmill Road	N	2	Striped	0			0
D032	Dump Road	Pinecut Road	Fairgrounds	N	2	Striped	24	PS	WS	32
D033	East Valley Road	Pinecut Road	Red Hawk Lane	N	2	Striped	32.5	PS	NAC	0
D034	East Valley Road	Red Hawk Lane	Fish Springs Road	N	2	Striped	24.5	PS	WS	32
D035	Fish Springs Road	Toler Avenue	Elges Avenue	N	2	Striped	33	BL	RS	33
D036	Orchard Road	Toler Avenue	Buckeye Road	N	2	Striped	27	PS	RS	32
D037	Waterloo Lane	Toler Avenue	Harvest Avenue	N	2	Striped	0	BC	NAC, ASM	0
D038	Douglas Avenue	Lamae Park	Centerville Lane	N	2	Striped	30	BL	WS	34
D039	Meadow Lane	Douglas Avenue	Meadow Lane	N	2	NONE	0	BBldvd	ASM	0
D040	Meadow Lane	Douglas Avenue	Lamplung Park	N	2	NONE	0	BBldvd	ASM	0
D041	Gilman Avenue	HWY 395	Ezell Street	N	2	Curb	0	BL		0
D042	Gilman Avenue	HWY 395	Heybourne Road	N	2	NONE	46	BL	RS	46
D043	Gilman Avenue	Ezell Street	Harvest Avenue	N	2	NONE	0	BBldvd		0
D044	Chichester Drive	Gilman Avenue	Toler Lane	N	2	NONE	0	BBldvd		0
D045	Harvest Avenue	Chichester Drive	Stoddick Lane	N	2	NONE	0	BBldvd		0
D046	Kittyhawk Avenue	Elges Avenue	Grant Avenue	N	2	NONE	30	BL	RS	30
D047	Mathias Parkway	Mueller Parkway	HWY 395	N	2	Curb	0	PS, SUP	NAC	0
D048	Grant Avenue	Mathias Parkway	HWY 395	N	2	Striped	29	PS, SUP	FS	49
D049	Buckeye Road	Orchard Road	HWY 395	N	2	Striped	42	BL	RS	42
D050	County Road	3rd Street	Olus Street	N	2	Striped	42	BL	RS	42
D051	County Road	Olus Street	HWY 88	N	2	Striped	42	BL	RS	42
D052	Mahogany Drive	HWY 88	Westwood Drive	N	2	Striped	42	BBldvd	ASM	0
D053	Mahogany Drive	Westwood Drive	Ironwood Drive	N	2	NONE	42	BBldvd	ASM	0
D054	Ironwood Drive	Mahogany Drive	Tamarack Drive	N	2	NONE	42	BBldvd (1)	RS	0
D055	Ironwood Drive	Tamarack Drive	HWY 395	N	2	Striped	25	PS	WS	34
D056	Mueller Lane	HWY 395	Foothill Road	N	2	Striped	25	PS	WS	34
D057	Foothill Road	Centerville Lane	Mueller Lane	N	2	Striped	25	BFBL (1)	WS	40
D058	Mottsville Lane	Foothill Road	HWY 88	N	2	Striped	24	PS	WS	34

LEGEND

FACILITY CODE
 SRD - Shared Roadway
 SH - Sharrow
 PS - Paved Shoulder
 BL - Bike Lane

BFBL (1) - Buffered Bike Lane (Bl. & Travel Lane)
 BFBL (2) - Buffered Bike Lane (Bl. & Parked Car)
 SUP - Shared Used Path
 SWBP - Sidewalk w/ Bike Permitted
 S - Further Study Needed
 CT1-1 - Cycle Track (1 Side 1 Way)
 CT2-1 - Cycle Track (2 Sides 1 Way)
 CT2-2W - Cycle Track (2 way operation)
 BBldv - Bicycle Boulevard
 CFBL - Contra-Flow Bike Lane
 CL - Climbing Lane & Sharrow
 WOL - Wide Outside Lane
 B/BL - Bus/Bike Lane
 PH6/BL - Peak Hour Bus/Bike Lane

Action Code
 NCA - No Action Needed
 ASM - Add Striping/Marking
 LD - Lane Diet
 RD - Road Diet
 RP1 - Remove Parking 1 Side
 RP2 - Remove Parking 2 Sides
 FTP1 - Add Full Time Parking 1 Side
 FTP2 - Add Full Time Parking 2 Sides
 WS - Widened Street
 WSW - Widened Sidewalk

CFD - Construct Bike Facility w/ Future Development
 S - Further Study Needed
 MC - Move Center Line
 RHEB - Rehabilitate Existing Bike Fac.
 PSldr - Pave Existing Shoulder
 RECON - Reconstruct Roadway

Field Review Notes (Not Final Recommendations)

ID	EXISTING		PROPOSED						
	STREET NAME	FROM	TO	ONEWAY	NUMBER LANES	MEDIAN WIDTH	RECOMMENDED FACILITY	RECOMMENDED ACTION	CROSS SECTION WIDTH
D061	Foothill Road	Muller Lane	Genoa Lane	N	2	Striped	BFBL (1)	WS	40
D062	Genoa Lane	Foothill Road	HWY 395	N	2	Striped	BL	WS	34
D063	Jacks Valley Road	Genoa Lane	W. of schoolhouses	N	2	Striped	BFBL (1)	WS	40
D064	Jacks Valley Road	W. of schoolhouses	Vista Grande Boulevard	N	2	Striped	BFBL (1)	WS	40
D065	Vista Grande Boulevard	Jacks Valley Road	Old Clear Creek Road	N	0	Striped			
D066	Vista Grande Boulevard	Jacks Valley Road	S. of Home Depot	N	2	Striped	BFBL (1)	WS	42
D067	Vista Grande Boulevard	S. of Home Depot	Plymouth Drive	N	2	Striped	BBld	ASM	0
D068	Mica Drive	Vista Grande Boulevard	HWY 395	N	2	NONE	BL	ASM	0
D069	Plymouth Drive	Vista Grande Boulevard	Tennant Lane	N	2	Striped	BBld	ASM	0
D070	Plymouth Drive	Tennant	HWY 395	N	2	Striped	BBld	ASM	0
D071	HWY 395	Plymouth Drive	Ironwood Drive	N	4	Striped	SUP	ASM	0
D072	Stephanie Way	HWY 395	End of Pavement	N	2	Striped	BL	WS	34
D073	Vicky Lane	Johnson Lane	End of Pavement	N	2	Striped	PS	WS	34
D074	Johnson Lane	HWY 395	Sunrise Pass Road	N	2	Striped	BL	WS	34
D075	Fremont Street	East Valley Road	Johnson Lane	N	2	Striped	BL	WS	34
D076	East Valley Road	East Valley Road	Fremont Street	N	2	Striped	BL	WS	34
D077	Heybourne Road	Johnson Lane	Airport Road	N	2	Striped	PS	WS	0
D078	Heybourne Road	Johnson Lane	HWY 395	N	2	Striped	PS	WS	34
D079	Airport Road	Heybourne Road	Lucerne Street	N	2	Striped	SH	ASM	0
D080	Ironwood Drive	HWY 395	Lucerne Street	N	2	Curb			
D081	Lucerne Street	Lanchna Drive	HWY 395	N	2	NONE	SRD	NAC	0
D082	Frieda Lane Easement	Frieda Lane Easement	Frieda Lane Easement	N	2	NONE	SRD	NAC	0
D083	Heybourne Road	Buckeye Road	End of Pavement	N	2	Striped	NAC	NAC	0
D084	HWY 395	Muller Parkway	HWY 88	N	4	Striped	BL, SH if Constrained		0

LEGEND

FACILITY CODE
 SRD - Shared Roadway
 SH - Shoulder
 PS - Paved Shoulder
 BL - Bike Lane

BFBL (1) - Buffered Bike Lane (BL & Travel Lane)
 BFBL (2) - Buffered Bike Lane (BL & Parked Car)
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 WSw - Widen Sidewalk

S - Further Study Needed
 MC - Move Center Line
 RHEXB - Rehabilitate Existing Bike Fac.
 PShdr - Pave Existing Shoulder
 RECON - Reconstruct Roadway

CFD - Construct Bike Facility w/ Future Development



APPENDIX B

NEVADA BICYCLE ADVISORY BOARD LETTER

*Robinette Bacon
Dept. Of Education*

*Dennis Taylor
Dept. Of Transportation*

*Rick Keller
Div. of State Parks*

*Dean Reynolds
Dept of Public Safety*

*Kandi Qualls
Health Division*

*Connie Mancillas
Commission on Tourism*

SIGURD JAUNARAJIS, Chair
*Div. of Environmental
Protection*

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State of Nevada
JIM GIBBONS
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*Denis Coyne
Org. on Bicycle Safety/Education*

*Robin Munier
General Public*

*Richard Staley
Bicycle Business*

*Mark Kimbrough
Org. on Environmental Issues*

*Dennis Stark
General Public*

*Noah Jennings
Under 21 Years of Age*

November 22, 2010

Susan Martinovich, P.E., Director
Nevada Department of Transportation
1263 South Stewart Street
Carson City, NV 89712

Subject: Douglas County Bicycle Plan

Dear Susan,

The Nevada Bicycle Advisory Board has recently reviewed the Douglas County Comprehensive Trails Plan submitted by Douglas County to satisfy an update to their Bicycle Plan. The members of the Nevada Bicycle Advisory Board (Board) independently and in an unbiased manner have reviewed the plan submitted. Issues and concerns with the plan were discussed at our meeting and are outlined below. The Board unanimously agreed to NOT RECOMMEND APPROVAL of the plan.

Some of the issues raised with the plan in its current form are:

- It is very out of date (2003 – 8 years old).
- It does not reflect the newer planning jurisdictions of Tahoe MPO and Carson Area MPO and the connectivity with respect to their adopted Bicycle & Pedestrian Elements of their Regional Transportation Plans.
- It is written as a recreational trails plan and not a transportation plan providing for a functional integrated network of bicycle facilities as an alternative to vehicle use.
- Many of the maps are either difficult or impossible to read.
- It is difficult to determine on which side of a roadway a path facility is proposed.
- The plan does not follow FHWA, MUTCD and/or AASHTO nomenclature and definitions (shared-use path, bicycle lane, bicycle route, signed shared roadway, shared roadway, shared lane marking (sharrow), etc.)
- It does not identify and characterize potential bicycle traffic generators (major employers, schools, shopping centers, community centers, etc.) on which a non-motorized network would be based.
- It does not address user types and abilities as it relates to facility type selection.
- It does not address bicycle parking issues or improvements.
- It does not identify existing network gaps, intermodal connections (transit, park-and-rides, etc.), or linkages with nationally recognized bicycle routes such as the Western Express Route, etc..
- It does not discuss directional signage or a wayfinding plan for the network.

- There is no discussion of bicycle crash data analysis, conflict points, mode shift goals, bicycle/vehicle education, Safe Routes to School needs, or local codes, ordinances or laws related to bicyclists use of the network.

The Board does not take its recommendation to Not Approve a plan lightly. We would be happy to assist Douglas County in any way we can towards their development of an effective and current Bicycle Transportation Plan.

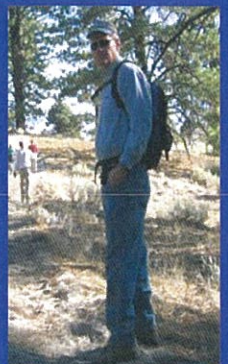
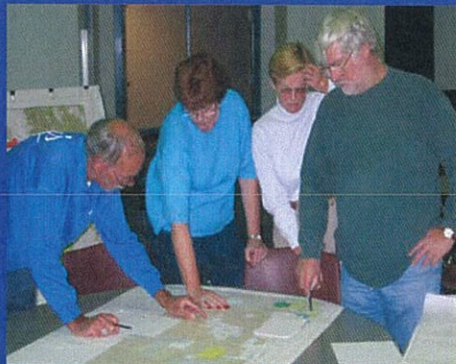
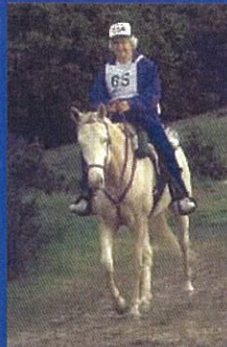
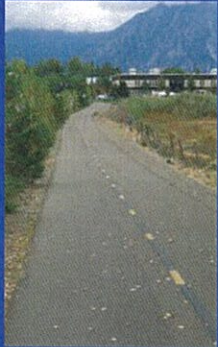
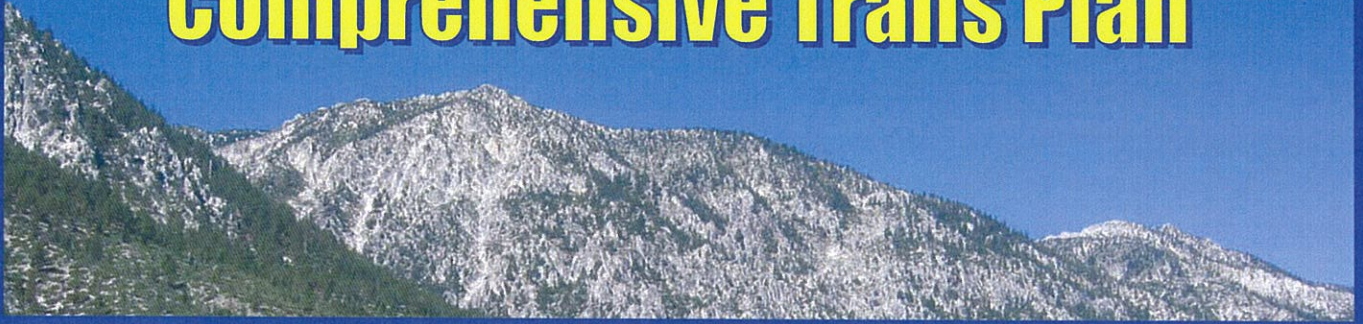
The Board was glad to again be of service to you on this issue. We look forward to working with you and NDOT on future Bicycle Plans and other bicycle projects.

Sincerely,

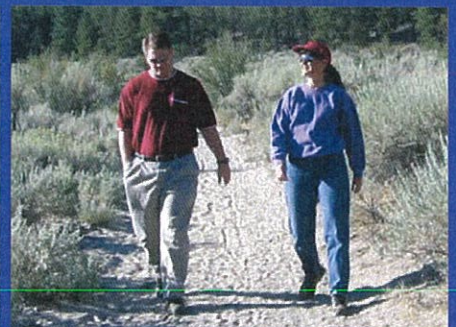


Sigurd Jaunarajs
Chairman
Nevada Bicycle Advisory Board

Douglas County Comprehensive Trails Plan



**Adopted
June 5, 2003**



Douglas County
Comprehensive Trails Plan

Final
Adopted
June 5, 2003

***Prepared by the Douglas County Community Development Department,
the Douglas County Manager's Office, the Douglas County Geographic
Information Systems Division and the people of Douglas County***

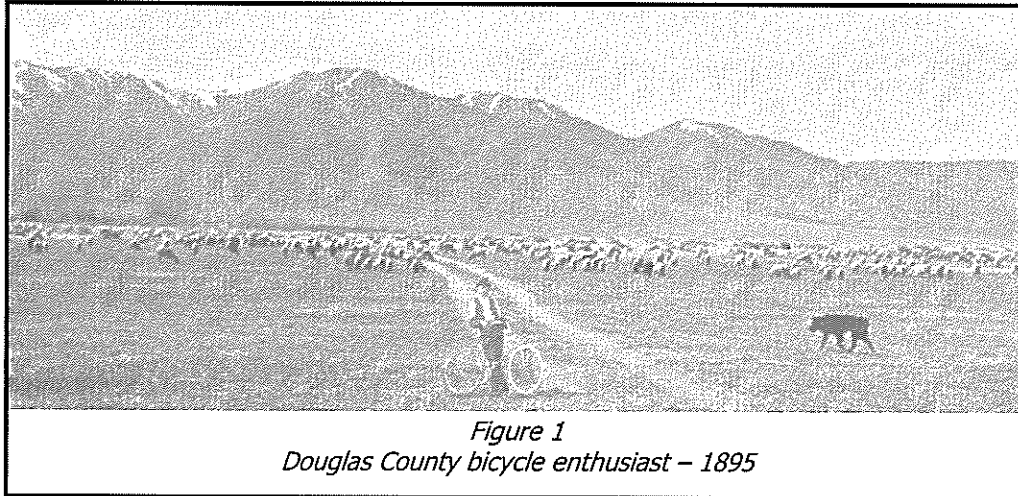
***Technical assistance provided by the United States Forest Service, the
United States Bureau of Land Management, the Carson Valley Trails
Association, the Pony Express Association and the Alta Alpina Bicycle Club***

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1.

Introduction, Authorization and Direction



Overview

The adopted 1996 Douglas County Master Plan lays out the basic structure for the development of a County-wide Public Trails Plan. The Master Plan generally identifies a number of areas that should be considered for the development of public access into public lands; however, detailed design and placement of trails, trailheads and other amenities are not specifically identified within the Master Plan. This Comprehensive Trails Plan lays out a detailed trails plan for Douglas County.

The purpose of this Comprehensive Trails Plan is to provide for the enhancement and development of a coherent, workable community trails program which will assist Douglas County's elected and appointed officials toward the creation of a system of hard and soft surface multi-use paths throughout Douglas County. The Plan establishes specific public access points, trailhead and trail locations to be developed over the life of the Master Plan. The Trails Plan also updates the County's bicycle plan to include connection points across the Carson Valley and between various community areas.

Douglas County contains an almost unlimited variety of outdoor recreational opportunities with seasonal climate types, variances in topography and a substantial amount of public land. Public access to public lands is a critical aspect of recreational opportunities in Douglas County. The outdoor recreational

opportunities in Douglas County add to the quality of life enjoyed by residents and visitors to Douglas County. A well-defined and integrated public trails plan not only enhances the recreational opportunities of residents, but also serves to bolster the tourism economy in Douglas County, providing a greater level of outdoor experience. The availability and development of outdoor recreational opportunities is not only compatible with the quality of life standards established for Douglas County, but also compliments the State of Nevada's tourism efforts, which encourages visitors to enjoy the outdoor recreational opportunities afforded throughout the Silver State.

As Douglas County continues to experience various development pressures, legal passage from existing rights-of-way onto public lands and through new development is of utmost importance. Specific access points and trails need to be identified to provide a guideline for future development. This need is recognized in the 1996 Master Plan as amended, and provisions for planning a multi-purpose countywide trail system have been identified. By combining trail designation with development, Douglas County will effectively ensure lasting legal access to a wide variety of outdoor activities that await residents and visitors alike.

The first draft of the Douglas County Trails Plan was initiated at public community workshops and includes input from Douglas County staff, U. S. Forest Service and Bureau of Land Management representatives, the Carson Valley Trails Association, the Alta Alpina Bicycle Club and representatives from the Towns of Minden, Gardnerville and Genoa, the Indian Hills General Improvement District and homeowner associations, various user groups and individual residents and property owners.

The Trails Plan has attempted to follow and incorporate the various goals and objectives as provided for in the County's Master Plan. In a number of areas the Trails Plan also recognizes that specific access points and trails may be modified based upon specific development, other opportunities and funding. Therefore the plan will be used as a guideline and planning tool for an integrated trails plan, but also not imposed as a strict standard, limiting the County and communities to take advantage of opportunities as they may be presented throughout the life of the plan. The Plan provides adequate detail to require specific access and trails as a condition of future development projects within the County.

The Plan is designed to allow additional sections to be added with more detail for specific areas within the County. This includes specific sections to be developed for the Tahoe Planning Area as well as South Douglas County. Specific community sections may also need to be strengthened as additional trails, bikeways and pedestrian access points are more clearly defined in existing developed communities or as new developments come forward that provide public access points.

This plan intends to provide information that will be useful for real estate easement acquisition and dedications required as part of land subdivision activity, development, maintenance, and funding. In addition, it provides information regarding implementation priorities and direction on special projects, such as projects undertaken by the *Carson Valley Trails Association*, *Alta Pina Bicycle Club* and other community volunteer organizations.

A successful integrated trails plan also requires the support of U. S. Forest Service, and the Bureau of Land Management officials through the implementation and updates of the agencies land use plans. This proposed Comprehensive Trails Plan has been developed in conjunction with U. S. Forest Service and Bureau of Land Management representatives.

In general, the trails proposed within this comprehensive plan connect key population centers and recreational amenities such as the Gardnerville Ranchos, Gardnerville, Lampe Park, Minden, the Swim Center, Library and Douglas High School. Furthermore, the trails proposed are linked from Douglas County to Carson City as well as California's public trail systems developed on USFS, BLM, around Lake Tahoe and throughout California.

Any reference to "public lands" within this document shall refer to USFS, BLM, State, County, General Improvement Districts or other public agencies, except for State owned waterways.



Figure 2
Multi-use trails provide recreational, aesthetic and health benefits to all residents.

Advantages of Trails and Bikeways

A well planned, safe network of bicycle, hiking, equestrian and walking Trails offer both recreational opportunities as well as a real alternative to commuting to and from work via motor vehicles. The creation of a Comprehensive Trails Plan

will offer Douglas County residents and visitors a tangible amenity based upon the following advantages:

1. reduced automobile use will improve the regional air quality,
2. leg and peddle power equate to increased exercise and public health benefits,
3. empirical evidence indicates that trails increase property values,
4. economic benefits will accrue based upon increased tourism,
5. provision of educational opportunities through interpretation of the environment,
6. environmental benefits will accrue when trails serve as an open space buffer, and,
7. communities become more livable; simply put, trails make life enjoyable.

The following paragraphs offer a brief summary of the advantages offered by a comprehensive trails network:

Transportation: Trails can increase the transportation mode split of bicycling and walking trips, and they can also improve safety and increase access. The trail system should include a commuter system for employees and students that will encourage non-motorized travel by connecting residential areas with major destinations. This system may ultimately reduce or avoid traffic congestion and air pollution in future years.

Historic and Culture: Trails can educate and increase awareness about the history and culture of Douglas County. Preserved historic sites, (the Pony Express Trail and California Overland Trails), provide unique locations for cultural, local and social events. Methods, such as on site interpretive material and promotional literature, can aid in Douglas County's effort to preserve historic sites and help establish our sense of place.

Recreation: Trails provide an easily accessible outdoor resource for many forms of recreation, most notably bicycling, horse back riding and walking. Trails greatly increase community access to physical activity and fitness opportunities by providing more miles of safe, attractive bicycling, equestrian, walking, and hiking facilities.

Economic: Walkable communities can produce income from shared utility leases, increase the value of real estate, and generate income from tourist, special events, and other users. Improved walking conditions improve the quality of life by making an area more attractive for business relocations and in-migration. Costs of developing and maintaining the road access infrastructure are also reduced.

Land Use Planning: Trails and other green way corridors promote park and recreation development, and buffered environmental protection. Trails preserve undeveloped lands in urban areas and serve to separate and buffer contradicting land uses.

Environment: An established access trail system promotes wildlife preservation, water quality protection, storm water management, preservation of vegetation, and other benefits, such as firebreaks by focusing trails in disturbed or less sensitive areas. Noise and visual pollution is reduced where non-motorized trails are developed.

Education: A trail corridor often encompasses several different environments along its route and can be thought of as an outdoor classroom full of educational materials. The scientific community, educators and students can realize the value of trails through a wide range of studies, such as biology, geography, history, recreation management, and art.

Quality of Life: Increases in the quality of life associated with non-motorized trails are realized through expressions of community character and pride, aesthetics of the local environment, economic stimulation of Douglas County, access to the outdoors, opportunities for socialization, and easy increase of mobility.

Master Plan Authorization and Direction

In 1996 the Board of County Commissioners adopted the *Douglas County Master Plan* including a *Transportation Element*. The *Transportation Element* includes a "Trail System" Section and a "Bicycle and Pedestrian Systems" Section.

Authorization for this Comprehensive Trails Plan is contained within *Master Plan* Goal 10.24 which states:

Adopt and implement a safe comprehensive bikeway and pedestrian trail plan that provides opportunity for non-motorized transportation within the County that meets both recreational and commuter needs.

Further direction for this Comprehensive Trails Plan is contained within *Master Plan* Objectives 10.23.01 and 10.24.02 stating:

- 1. Prepare a comprehensive trails plan and map for Douglas County, and**

2. Provide adequate pedestrian/biking facilities to serve the needs of County residents.

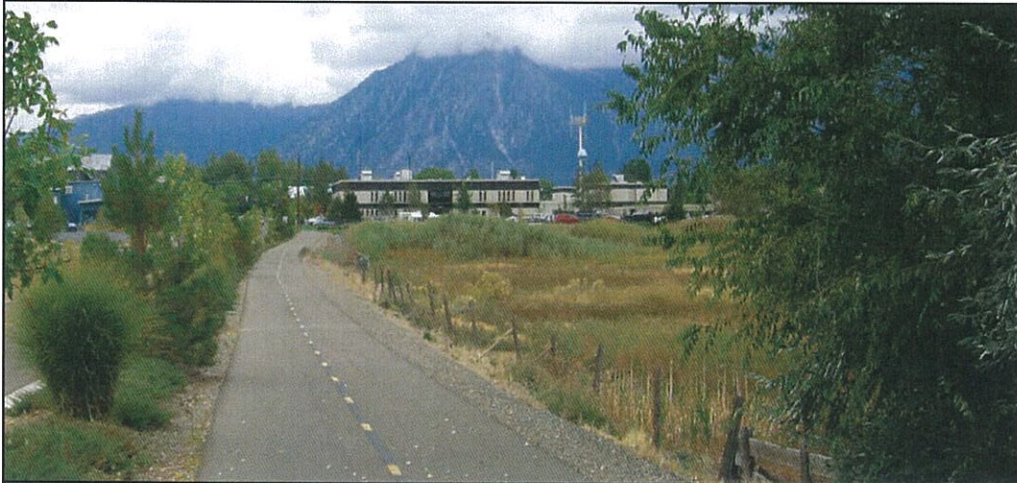
The *Master Plan* contains numerous Implementation Strategies establishing criteria for this Comprehensive Trails Plan including the following direction:

- cooperate with Federal and State agencies to develop a County-wide Trail Plan and Map,
- integrate the bikeway and pedestrian system with the Transportation Plan,
- establish design criteria and evaluate and address trail systems adjacent to river and other water corridors,
- evaluate individual public and private projects relative to access to public lands and address means of acquiring, constructing, and maintaining trails,
- designate and construct regional bicycle routes to connect residential areas with major activity centers,
- class I, II & III Bikeways shall be provided on roadways as indicated in the Transportation Element,
- trail systems and bicycle lanes shall be connected at appropriate points to maximize the accessibility of the system to commuter and recreational users, and,
- design of commercial and industrial facilities should include provisions for bicycle and pedestrian facilities, including parking of bicycles.

The Comprehensive Trails Plan summary, goals and implementation strategies and accompanying maps are also identified in Chapter 10, (Transportation Element) of the adopted Master Plan.

2.

Plan Formulation, Review and Approval Process



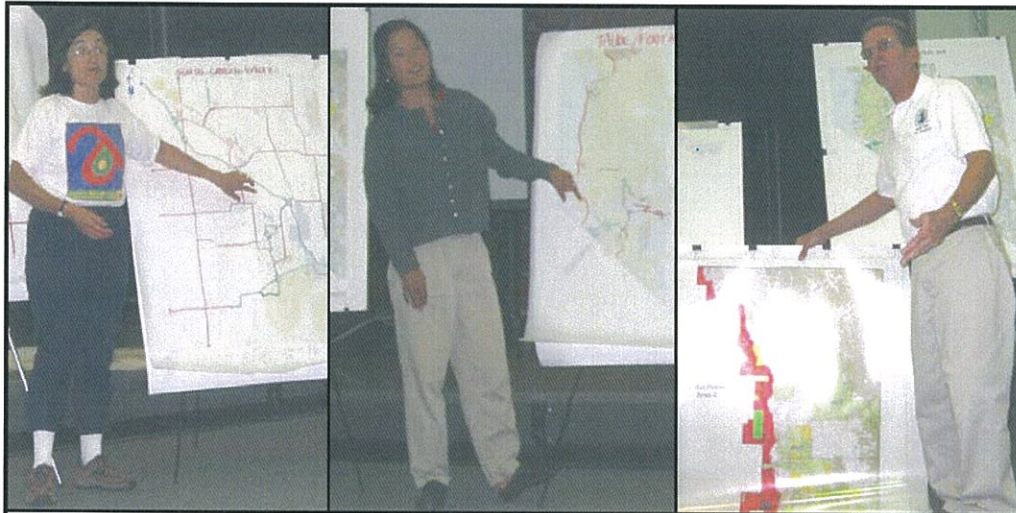
*Figure 3
Class I Bicycle Path located on Buckeye Road*

The Trails Plan Formulation, Review, Approval and Adoption

The Comprehensive Trails Plan Formulation, Review, Approval and Adoption Process encompasses approximately seven months from October, 2002 through April 2003. This time period set aside for Plan formulation and review was established in order to ensure ample opportunity for broad public input, review and consideration.

Appendix Exhibit 1 provides the *Comprehensive Trails Plan Formulation, Review and Adoption Timeline* undertaken within this process. The seven month plan process includes the preparation of draft maps, mailout of public notices, property owner committee and commission meetings, re-notification of the public and property owners, plan revisions, final review and plan adoption.

In order to generate public interest and attendance at the workshops, a press release was sent to the local and regional media. Local radio and feature newspaper articles also encouraged County residents to attend the Trails Workshops and public meetings. Over 400 citizens have provided input on the plan.



*Figure 4
Trails Workshop Participants sharing their recommendations.*

Emphasis of the workshops was directed toward locating desirable on-street, off-street and other trails, (including hard and soft surface trails), as well as prioritizing the proposed trails into low, medium, high and very high priority categories.



*Figure 5
Approximately 300 attend public forum on the Draft Trails Plan, 1/09/03*

Based upon public input as well as direction received from the Douglas County Water Conveyance Advisory Committee, the Park and Recreation Commission,

the Planning Commission and Ad Hoc Trails Committee, (comprised of various volunteers representing a cross section of perspectives and/or knowledge about trails), draft maps were evaluated and revised.

In summary, based upon public input, the criteria utilized to determine revisions to the proposed future trail head and trails maps includes the following:

- Remove trails adjacent to rivers and sloughs, (except on public or Nature Conservancy land),
- Re-route trails from private to public land where possible,
- Trails shall be included within all public lands,
- Trails shall be included within all undeveloped Receiving Areas,
- Trails shall be considered for all developments proposed adjacent to or within most undeveloped property zoned RA-10, RA-5, SFR-2, SFR-1, SFR-1/2, SFR-12,000, SFR-8,000, MFR, NC, OC, GC, MUC, TC, LI, GI PF, AP and PR, and,
- Trails may be included within undeveloped property zoned A-19 or FR-19 where necessary in order to preserve historic trail access or provide access to public lands.

Table 1 summarizes the on-street and off-street trails, (typically synonymous with hard and soft surfaced trails respectively), proposed to comprise the Comprehensive Trails Plan. Included within this Table are the proposed trail lengths recommended for each geographic sub area.

In all, and based upon the remapping process which resulted from public input, the total length of proposed trails within Douglas County was reduced by 18% from 593.6 miles recommended following the community workshops in November, 2002 to 488.3 miles recommended in March, 2003. In reality, however, the reduction in the length of proposed trails proposes removing much more than 105.3 miles from private property located on the Draft Trails Map. In many instances, the remapping process called for the removal or the addition of new trails on public lands.

<i>Table 1 Douglas County Comprehensive Trails Plan Miles of Trails by Priority</i>								
	Existing Trails	Proposed Trails by Priority				Total	Subtotal	Subtotal
		very high	high	medium	low			
TAHOE/FOOTHILL								
On-street	8.9		30.5	17.8	2.1	67.0	59.3	
Off-street	46.0		25.9	19.7	13.0	104.6		104.6
NORTH VALLEY								
On-street	1.5		22.0	10.0	11.0	44.5	44.5	
Off-street	2.5		10.2	3.5	1.4	17.6		17.6
EAST VALLEY								
On-street	2.0		23.5	16.2	6.2	47.9	47.9	
Off-street	22.4		25.0	7.2	4.7	59.3		59.3
SOUTH VALLEY								
On-street	2.6	6.7	28.7	14.7	15.3	68.0	68.0	
Off-street			10.1		1.8	11.9		11.9
TOPAZ								
On-street			1.9	19.1		21.0	21.0	
Off-street			27.7			27.7		27.7
OUTSIDE								
On-street			4.3	2.0	3.4	9.7	9.7	
Off-street				1.8		1.8		1.8
Total On-street							260.0	
Total Off-street								228.3
Grand Totals	89.9	6.7	216.0	111.5	64.2	488.3		

Note: Add 26.8 miles of HISTORIC TRAILS not classified within this Table

Table 2 identifies the impact to property owners resulting from the revisions to the Draft Trails Plan Map made during January, 2003 and March, 2003. The First Draft Trails Plan Map indicated that preliminary trails or trailheads may affect 879 parcels of land owned by 438 property owners. Following the remapping process, the Second Draft Trails Plan Map indicated that preliminary trails or trailheads may affect 438 parcels of land owned by 155 property owners. Finally, following additional direction from the Planning Commission and the Board of Commissioners, the Draft Trails Plan Maps were further modified to reduce the number of parcels possibly impacted by the placement of future trails to 315, affecting 51 property owners.

The number of property owners, (including public and quasi-public agencies), possibly impacted by the Trails Plan Maps has been reduced from 438 last December, 2002 to 51 in May 2003.

Draft Trails Map	Parcels Possibly Impacted by Trail or Trailhead	Property Owners
FIRST DRAFT TRAILS MAP DECEMBER, 2002	879	438
1ST REVISED DRAFT TRAILS MAP JANUARY, 2003	435	155
2ND REVISED DRAFT TRAILS MAP MARCH 11, 2003	306	97
3RD DRAFT TRAILS MAP MARCH 24, 2003	287	53
4TH REVISED DRAFT TRAILS MAP MAY 13, 2003	315	51

While the revised trails map proposes trails or trailheads that may impact 287 parcels, it is noteworthy to point out that 162 of the parcels belong to public or quasi public agencies, (i.e., 85 belong to USFS, 29 belong to the BLM, 15 belong to the Gardnerville Ranchos GID and 14 belong to Douglas County). Most of the trails now proposed on private lands are located on lands that are already designated for future arterial or collector road connections on the County's adopted Transportation Plan, part of an approved subdivision, (i.e., Job's Peak Ranch, Clear Creek, Mountain Meadows, Skyridge, Nevada Northwest), or already designated as part of the currently adopted Trails Plan, (i.e., the multi-purpose trail proposed adjacent to the Martin and Cottonwood Sloughs).

3. Maps and Trail Designations

Master Plan Adopted Maps

The following two maps – *Map 1) South County Bikeways, Trails and Community Access Map* and *Map 2) Carson Valley Bikeways, Trails and Community Access Map*, were adopted as part of the Douglas County Master Plan Transportation Element in April, 1996. These plans generally recognize future proposed trails and bikeways within existing rights-of-way and generally identify access points to United States Forest Service and Bureau of Land Management property.

