MEETING OF THE BOARD OF COUNTY COMMISSIONERS
BOULDER COUNTY
AGENDA

Thursday, August 28, 2025, 9:00 a.m.
Thursday, August 28, 2025, 1:00 p.m.
Third Floor Hearing Room
County Court House
1325 Pearl Street, Boulder

This agenda is subject to change. Please call ahead to confirm an item of interest (303-441-3500). In-person meetings are held in the Third Floor Hearing Room, County Courthouse, 1325 Pearl Street, Boulder. Public comments are taken at meetings designated as Public Hearings. Meetings and hearings on this agenda are open to the public.

Boulder County wants to ensure that everyone has equal access to our programs, activities, and services. To request an Americans with Disability Act (ADA) accommodation, please email ADA@bouldercounty.gov, or call 303-441-1386. Submit your request as early as possible, and no later than two business days before the event.

To view a two-week forecast agenda of the commissioners' schedule, visit the Commissioners' Advance Agenda.

All Commissioners' public hearings and meetings will be offered in a hybrid format where attendees can join through Zoom or in-person at the Boulder County Courthouse, 3rd Floor, 1325 Pearl Street, Boulder. The commissioners retain the right to switch all hearings and meetings to in-person only instead of hybrid if technical difficulties arise. To sign up for in-person public comment, please use the link in this agenda for each respective hearing. There will also be a kiosk located in the lobby of the 3rd Floor to sign up for in-person public comment. For questions regarding in-person hearings call 303-441-3500.

Pages

1. Call to Order
2. 9:00 a.m. Public Hearing on Vision Zero Action Plan Adoption and Business Meeting
   - Virtual Attendee Link for Commissioners' August 28 Morning Session
   - Registration Required
   - Call-in information: 1-833-568-8864, Webinar ID: 161 564 3331

- In-Person Comment Sign-up for Commissioners' August 28 Morning Session

3. **Public Hearing on Vision Zero Action Plan Adoption** 4

Community Planning and Permitting Department: Vision Zero Action Plan Adoption; Vision Zero is a strategy to eliminate all serious injury and fatal traffic crashes, while increasing safe, healthy, equitable mobility for all. Dedicated to meeting its Vision Zero target, Boulder County has embarked on its Vision Zero Action Plan effort to gain an in-depth understanding of current crash trends and risk factors and chart an effective course of action. There will be opportunities for live virtual and in-person public comment, and written comments can be submitted to: Vision Zero Action Plan Public Comments. More information on this matter is available at: Vision Zero and Boulder County Vision Zero Action Plan.

- **Action Requested: Decision**
- **Presenter(s): Liv Lewin, Community Planning & Permitting (In Person); Alexander Hyde-Wright, Community Planning & Permitting (In Person)**
- **Location: Hybrid (Hearing Room and Zoom Webinar)**

4. **Business Meeting**

5. **Commissioners' Discussion Items**

5.a **Commissioners' Office – Reconsideration of Resolutions 2025-036 and 2025-037 Placing the Open Space Sales Tax Extension Measure on the Ballot** 429

- **Action Requested:** Decision
- **Presenter(s):** Natalie Springett, Commissioners' Office (In Person)

5.b **Commissioners' Office – Reconsideration of Resolutions 2025-038 and 2025-039 Placing the Mental and Behavioral Health Sales Tax Measure on the Ballot** 442

- **Action Requested:** Decision
- **Presenter(s):** Natalie Springett, Commissioners' Office (In Person)

6. **1:00 p.m. Public Meeting on Benefits Advisory Board Benefits Workshop for 2026**

- Virtual Attendee Link for Commissioners' August 28 Afternoon Session
- **Call-in information: 1-833-568-8864, Webinar ID: 161 267 9421**

6.a **Public Meeting on Benefits Advisory Board Benefits Workshop for 2026**

Human Resources Department: Boulder County Human Resources, the Benefits Advisory Board (BAB), Office of Financial Management, and MJ Companies will present an overview of the Employee Benefits Health and Dental Fund performance in 2025 and the BAB's recommendations for plan designs and premiums for 2026. Commissioners will vote on recommendations during this meeting.

- **Presenter(s):** Emily Cooper, Human Resources (In Person)
- **Location:** Hybrid (Hearing Room and Zoom Webinar)

1. Consumer Choice Plan (CCP) Plan Design

The BAB recommends changing the CCP to a non-embedded deductible of $1,700 for individuals and $3,400 for families with coinsurance of 80%/20% and out-of-pocket maximums of $3,000 individuals and $6,000 family.

- **Action Requested:** Decision

2. Weight Loss Drug Coverage
   The BAB recommends removing coverage for GLP-1 weight loss drugs starting in 2026, while maintaining coverage for GLP-1s for diabetes.

   - **Action Requested:** Decision

3. Cancer Screenings and Prevention
   The BAB recommends adding enhanced cancer screenings and supports through Color.

   - **Action Requested:** Decision

4. Medical/Rx Premium Cost Share
   The BAB recommends maintaining the current cost sharing for medical and pharmacy premiums.

   - **Action Requested:** Decision

5. Dental Premium Cost Share
   The BAB recommends maintaining the current cost sharing for dental premiums.

   - **Action Requested:** Decision

Community Planning & Permitting
Courthouse Annex • 2045 13th Street • Boulder, Colorado 80302
Mailing Address: P.O. Box 471 • Boulder, Colorado 80306
303-441-3930 • www.BoulderCounty.gov

Vision Zero Action Plan Public Hearing

TO:	Boulder County Board of County Commissioners
FROM:	Liviana Lewin, Vision Zero Program Manager
FOR:	BOCC Public Hearing, 9:00 a.m., Thursday, August 28, 2025
RE:	Vision Zero Action Plan Adoption
MEMO DATE:	August 21, 2025

Table of Contents

ACTION REQUESTED 1
OVERVIEW 1
TIMELINE 2
STUDY AREA 3
PLAN ELEMENTS 3
COMMUNITY ENGAGEMENT 4
KEY ACTIONS 5
NEXT STEPS 6
ACKNOWLEDGMENTS 6
ATTACHMENT A: PROJECT BUDGET PAGE A-1
ATTACHMENT B: HIGH-INJURY NETWORK WITH PROJECTS UNDERWAY PAGE B-1

Action Requested

Staff requests that the Boulder County Board of County Commissioners (BOCC) adopt the Boulder County Vision Zero Action Plan ("VZAP"). This VZAP will serve as the foundation for future actions to improve safety for all users with a focus on unincorporated Boulder County and the mountain towns of Jamestown, Nederland, and Ward. Future projects to implement recommendations may be led by Boulder County, the Colorado Department of Transportation ("CDOT"), and/or other local governments. The Vision Zero Action Plan and Appendices are available at boco.org/visionzeroactionplan.

Overview

In support of Boulder County's commitment to our Vision Zero policy goal and transportation safety for all users, the county has developed a Vision Zero Action Plan (VZAP) for unincorporated Boulder County and the mountain towns of Jamestown, Nederland, and Ward. As a part of this process the county partnered with the City of Lafayette and the Town of Superior, with these municipalities creating their own VZAPs. These three VZAPs were funded through a single federal Safe Streets and Roads for All (SS4A) grant with local match contributions from Boulder County, the City of Lafayette, and the Town of Superior (see

Attachment A). The remaining jurisdictions in Boulder County, including the cities of Boulder, Longmont, Louisville and the towns of Erie and Lyons are also committed to Vision Zero and have local VZAPs or similar safety plans either completed or planned (see more under the Municipal Vision Zero Action Plans section). The county's VZAP is being coordinated with all of these local safety plans.

Vision Zero Action Plans identify specific, prioritized strategies to comprehensively improve transportation safety for all roadway users with the goal of eliminating serious and fatal traffic crashes. Recommended actions include a variety of infrastructure changes (e.g., roadway and traffic signal changes) and non-infrastructure initiatives (e.g., public education campaigns and increased enforcement strategies, such as automated speed enforcement).

The plan includes a list of implementation strategies and actions. This is not a fiscally constrained plan; the county does not have all of the funding needed to implement this plan. Next steps include pursuing funding from a variety of sources and refining the prioritization of actions.

The Boulder County VZAP project kicked off in April 2024 and will be complete (assuming adoption by the BOCC), with implementation ongoing as resources and scheduling allow. The Project Management Team met regularly and included members from the consultant team and county staff from Community Planning & Permitting (CP&P)-Transportation Planning and Public Works-Engineering, as well as staff from the City of Lafayette and the Town of Superior. The team also had a Steering Committee with other key partners, such as the Colorado Department of Transportation (CDOT), advocates, and law enforcement representatives.

> The final deliverable includes specific action plans for Boulder County, Lafayette (adopted 7/15/25), and Superior (adopted 8/11/25), each adopted by their respective elected bodies. Note that the information in this memo and the request for consideration of adoption is for the Boulder County Vision Zero Action Plan only.

The Vision Zero Action Plan supports the BOCC's 2024-2026 Strategic Priorities in the following ways:

- Economic Security and Social Stability: Motor vehicle crashes have a high cost, both for society and the individuals involved. For those involved, costs include property damage, medical expenses, lost wages, and legal fees. Preventing and lessening the severity of these destabilizing events increases the economic security of Boulder County residents. Improving safety encourages more walking, biking, and transit ridership, which allows residents to reduce their daily transportation costs by shifting trips to less expensive modes.
- Climate Action and Environmental Stewardship: Improving transportation safety and comfort—particularly for people walking, biking, and taking transit—can encourage shifting trips from driving to other modes. This can yield individual cost savings, and this shift also reduces local air pollution and greenhouse gas emissions that contribute to climate change.

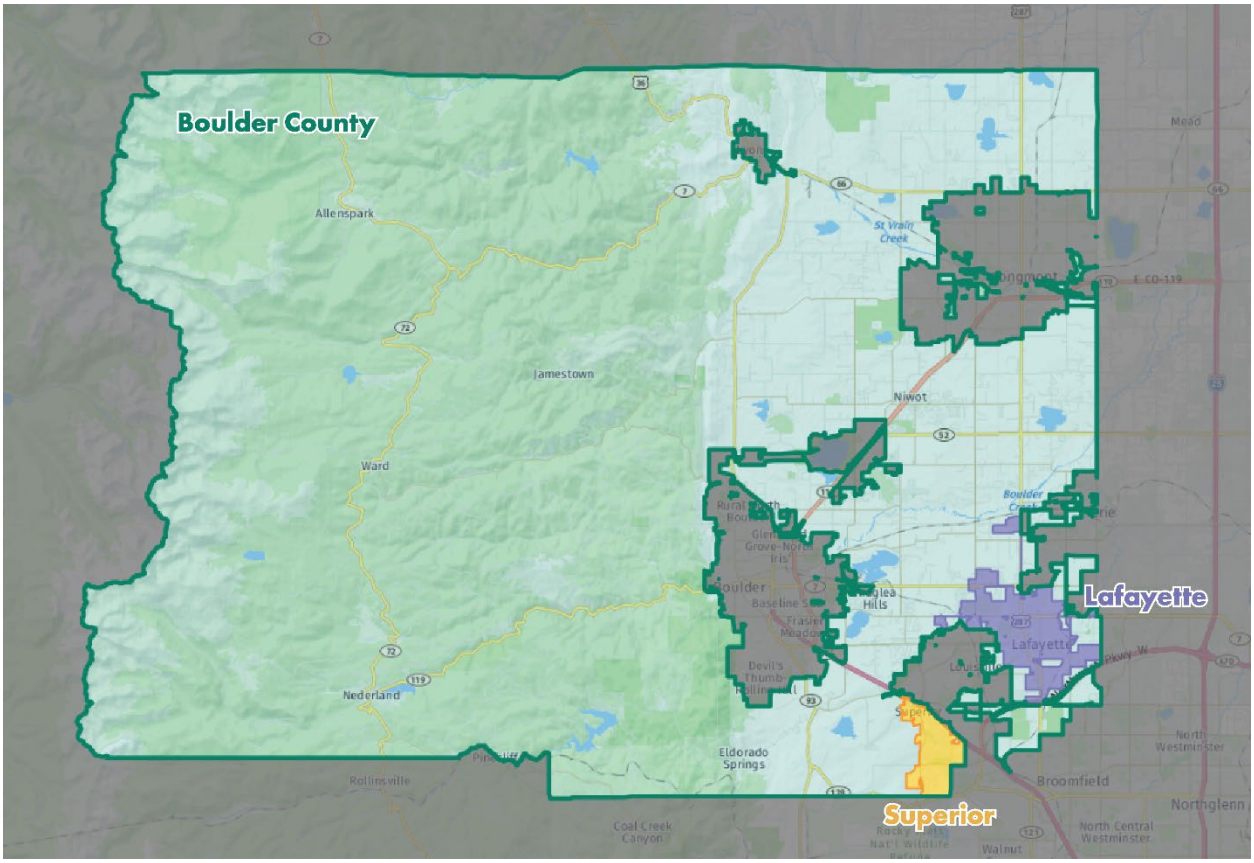
Timeline

Beginning in April 2024, the VZAP project is culminating in this adoption hearing. The process included a technical analysis of historical crash data (2013-2022) with three main phases of community engagement and working with a Steering Committee throughout the project. An initial draft VZAP was delivered in early summer for community review which was updated based on community and BOCC feedback for consideration of adoption.

Study Area

The study area includes Unincorporated Boulder County (both county-owned roads and state highways owned and operated by CDOT), as well as the mountain towns of Jamestown, Nederland, and Ward. The SS4A grant also funded separate (and concurrent) VZAPs for the City of Lafayette and the Town of Superior. The full study area for all three plans is shown in Figure 1: Study Area Map.

Figure 1: Study Area Map



Plan Elements

The Boulder County VZAP includes the following elements:

Executive Summary: includes an overview of the plan, safety analysis highlights, the high-injury network, the action plan at-a-glance, and next steps

1. **Introduction:** includes an overview of the plan, a study area map, an introduction to Vision Zero and the Safe System Approach, goals, schedule, as well as related studies and programs and key partners.
2. **Community Engagement:** documents three rounds of community outreach to understand the public's safety concerns and gather feedback on proposed recommendations and an initial draft of the plan.
3. **Understanding the Safety Issues:** includes safety analysis highlights, the study area roadway network, maps of severe crash locations, the High-Injury Network (HIN), overlay of safety data with community input, HIN scoring, and identification of the top severe crash types.

4. **How We Will Achieve Vision Zero**: includes an overview of the Safe System Approach and a description of the key strategies identified in the plan:
    - Prioritizing improvements on the HIN and Bike/Pedestrian HIN on county roads.
    - Working with CDOT to address improvements on the CDOT highway HIN and Bike/Pedestrian HIN.
    - Systemwide improvements, particularly addressing the Top Severe Crash Types.
    - Speed management-related measures, including speed safety cameras.
5. **Action Plan:** identifies Safe System strategies and actions with next steps, leads/partners, anticipated timeframe, cost estimate, and status of funding.
6. **Next Steps:** outlines a phased approach for the implementation of recommendations that acknowledges the need for additional funding and ongoing, multi-agency partnerships. (The Next Steps section below has more information.)

Community Engagement

Community engagement played a critical role in the development of the VZAP. The project team used a multi-faceted approach to gather diverse perspectives from the public, non-profits, agency partners, and elected officials. This outreach included public meetings and events, online videos and surveys, a Project Management Team (PMT), and a Steering Committee. This multi-pronged approach provided a wide range of experiences and perspectives from which to build an understanding of the needs and desires of community members.

Overview

The role of the project webpage was to provide information on the project to the community, notify the public of upcoming meetings and events, and provide contact information for project staff. Engagement to typically hard-to-reach communities included offering Spanish translation of materials and interpretation at meetings, providing presentations and project information to Mobility for All Ambassadors and including several ambassadors on the project Steering Committee, and presenting to the Mobility Access Coalition (MAC).

Community input was gathered in three rounds of engagement through a variety of methods:

- **Phase One (Summer 2024):** The purpose of this phase was to identify how people travel in the study area and locations where they feel unsafe. Engagement took place at the Nederland Farmers Market and the Ride for Magnus Event in Boulder, through an online survey with an interactive map, and at a virtual public meeting. Input gathered was used to confirm the High-Injury Network and to support the development of action items.
- **Phase Two (Winter 2025):** In this phase, feedback was gathered on draft safety recommendations through an online survey with informational videos and in-person outreach at the Boulder County Winter Bike to Work Day breakfast station and Nederland TownTalk. Input gathered was used in the HIN scoring methodology.
- **Phase Three (Spring 2025):** Finally, the public reviewed the Action Plan and provided feedback through an online survey. The BOCC also provided feedback on the draft plan. Based on this input, the plan was updated to make the various types of actions proposed easier to understand (e.g., Engineering, Education, Enforcement) and to clarify funding availability and the next steps for implementation.

Project Management Team (PMT)

The Project Management Team met regularly and included members from the consultant team and county staff from Community Planning & Permitting (CP&P)-Transportation Planning and Public Works-Engineering, as well as staff from the City of Lafayette and the Town of Superior.

Steering Committee

The project included staff from Boulder County, Lafayette, Superior, Nederland, and Longmont, as well as CDOT, DRCOG, Colorado State Patrol (CSP) and other emergency responders, non-profits, and residents of the county. The committee met several times throughout the project to provide input on safety concerns and feedback on draft materials.

Municipal Vision Zero Action Plans

The remaining jurisdictions in Boulder County are also committed to Vision Zero, and the county regularly coordinates with them. Below is a summary of the status of municipal VZAPs/transportation safety plans.

- City of Boulder—VZAP - adopted by City Council (May 2023)
- Town of Erie—Transportation and Mobility Plan – adopted by Town Council (December 2024) with safety component
- City of Lafayette—VZAP - adopted by City Council (July 2025) [final version of document to be posted soon]
- City of Longmont—VZAP - in progress
- City of Louisville—Transportation Master Plan - adopted by City Council (October 2019) with safety component
- Town of Lyons—Safe Streets for All Safety Action Plan - adopted by Town Board (March 2025)
- Town of Nederland—Multimodal Transportation Plan - adopted by Town Board (December 2024) with safety component
- Town of Superior—VZAP - adopted by City Council (August 2025)

Key Actions

1. **Focus safety improvements on the High-Injury Network (HIN)** (shown in Attachment B with projects underway highlighted):
   - County roads
   - CDOT highways
   - Facilities identified in the Bike/Pedestrian HIN
2. **Address the top five crash types systemwide**, which collectively represent over 75% of all severe crashes:
   - Single-vehicle
   - Bicycle
   - Head-on
   - Broadside
   - Left-Turn
3. **Implement speed management strategies:**
   - Automated Speed Management (Speed Safety Cameras)
     - CDOT highways
     - County roads
   - Review/update of speed limit setting and signing practices
   - Engineering/design changes to the roadway that encourage slower speeds

4. **Education/training on safe driving and the rules of the road**
5. **Tracking and evaluating progress and effectiveness of actions**
6. **Pursuing additional funding sources**

Next Steps

Next steps to implement this plan include:

- **Refining and prioritizing actions** and incorporating into workplans.
- **Continuing ongoing programs and projects that are already underway and starting on other key items** identified through the refinement above.
- **Pursuing additional funding.** Some of the treatments recommended – such as installing signs – are fairly low-cost and could likely be covered through existing funding through the Transportation Sales Tax line item for Vision Zero (which averages to approximately $50,000 per year). The full set of treatments could cost in the tens of millions and will require additional funding sources.
- **Monitoring and evaluating effectiveness** to evaluate progress towards eliminating traffic-related fatalities, serious injuries, and the top five crash types that result in serious injury and fatalities.
- **Reporting on progress** both related to crash data, as well as progress on the implementation of the plan and the effectiveness of implemented actions.

Acknowledgments

The completion of the VZAP lays the foundation for future safety improvements in Boulder County with the goal of eliminating serious injury and fatal traffic crashes. Boulder County staff would like to thank the members of the Steering Committee and the BOCC. This project would also not have been possible without the input we received from the public, and we would like to thank everyone who took the time to provide their feedback and help shape the outcome. In addition, we would like to thank our consultant team led by Consor Engineers for supporting this project.

Attachment A: Project Budget

Vision Zero Action Plans Project Budget

Source	Amount
USDOT SS4A* Funding	$473,600
Boulder County Local Match	*$54,700*
City of Lafayette Local Match	*$40,900*
Town of Superior Local Match	*$22,800*
Local Match Subtotal	$118,400
Grand Total	**$592,000**

*US Department of Transportation Safe Streets and Roads for All grant program

Attachment B.

HIGH-INJURY NETWORK PROJECTS UNDERWAY

Many HIN segments and intersections have ongoing or upcoming funded projects addressing safety. See the table on the following page for details about ongoing projects on county roads (indicated by numbers) and CDOT highways (indicated by letters). Future projects, such as those identified in **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1**, will be moved forward based on funding availability, coordination with other planned capital and maintenance projects, and further community and agency input.

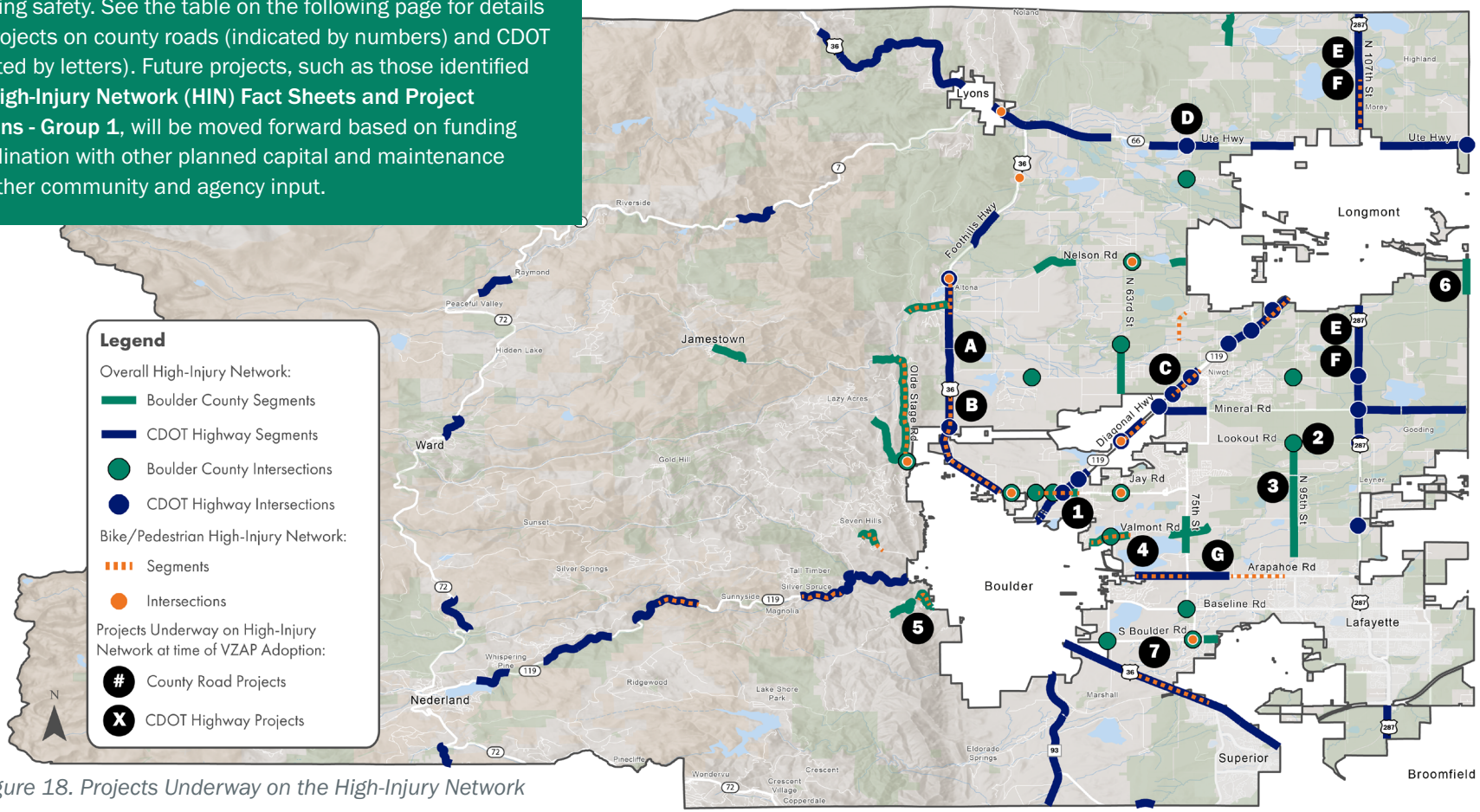


Figure 18. Projects Underway on the High-Injury Network

COUNTY ROAD HIGH-INJURY NETWORK PROJECTS UNDERWAY AS OF VZAP ADOPTION (AUGUST 2025)

	Project	Design Status	Construction Status
1	**Jay Road LOBO Trail:** new multi-use path along Jay Road, redesigned crossing at Jay Road and Spine Road.	*Complete*	*Funded - Transportation Sales Tax (TST)* Timing TBD
2	**95th Street & Lookout Road:** safety improvements designed to reduce broadside and left-turn crashes: new traffic signal with advanced warning beacons, new flashing yellow arrows, and enhanced detection with red light running protection.	*Complete*	*Complete*
3	**95th Street - Lookout Road to just north of Valmont Road:** roadway reconstruction, widen shoulders for bicycles, and flood protection infrastructure.	*Complete*	*Complete*
4	**61st Street & Valmont Road:** new southbound channelized right turn lane with speed table, new northbound bicycle crossing, updated bicycle markings, new Boulder to Erie Trail crossing north of 61st Street.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD
5	**Flagstaff Road - Mile Marker 0.75 to Gross Dam Road:** resurfacing to Gross Dam Road with paved bike pull-off areas, improved guardrail, new concrete barriers, and new drainage and sediment control structures.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD
6	**E County Line Road - Dillon Road to Overlook Drive:** full reconstruction with new bike lanes added and a traffic circle at the intersection with Pike Road.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD
7	**S Boulder Road - Manhattan Drive to Cherryvale Road:** full reconstruction with safety improvements at the Cherryvale Road intersection, improvements for multimodal users, and recoverable shoulders.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD

CDOT HIGHWAY HIGH-INJURY NETWORK PROJECTS UNDERWAY AS OF VZAP ADOPTION (AUGUST 2025)

	Project	Design Status	Construction Status
A	**US 36-N. Foothills Hwy Bikeway:** new off-street bikeway and related intersection improvements.	*In Progress*	*Not Funded* Applied for FY25 SS4A grant
B	**US 36-N. Foothills Hwy Speed Safety Cameras:** unincorporated Boulder County between Boulder (city limits) and CO 66-Ute Hwy.	*In Progress*	*Funded* Anticipated installation 2025
C	**CO 119-Diagonal Hwy Bikeway/Bus Rapid Transit (BRT) Intersection Construction:** new off-street bikeway, BRT lanes and stations, and related intersection improvements; CDOT speed safety cameras deployed summer 2025 for during construction.	*Complete*	*In Progress* Under construction - anticipated completion 2026
D	**CO 66-Ute Hwy & 75th Street:** upgraded signal heads, medians, striping, and turn lane alignment.	*Complete*	*Funded* Recommended FY 27-30 in CDOT's Ten-Year Plan
E	**US 287 Safety Project:** new concrete median barrier and related intersection improvements in unincorporated Boulder County between Lafayette and Longmont (south city limits) and between Longmont (north city limits) and Larimer County line.	*In Progress*	*Funded* Anticipated to begin 2026
F	**US 287 Speed Safety Cameras:** unincorporated Boulder County between Lafayette and Longmont (south city limits) and between Longmont (north city limits) and Larimer County line.	*In Progress*	*Funded* Anticipated installation 2025
G	**CO 7-Arapahoe Road Multimodal Corridor:** multimodal/safety improvements between Boulder and Brighton (e.g., Bus Rapid Transit (BRT) stations, multi-use path improvements, intersection improvements).	*In Progress*	*In Progress - Partially Funded* Timing TBD (some segments under construction)

VISION ZERO ACTION PLAN

Draft: August 2025

ACKNOWLEDGMENTS

Boulder County Board of County Commissioners

Claire Levy
Marta Loachamin
Ashley Stolzmann

Boulder County Staff

Liviana Lewin
Alex Hyde-Wright
Mark Shisler
George Eveleth
Kathleen Bracke

Partner Agencies

City of Lafayette
Town of Superior

Consultant Team

Consor North America, Inc.
Y2K Engineering, LLC.

Steering Committee Members

Boulder County Mobility for All
Boulder County Public Health
Boulder County residents
Boulder County Sheriff's Office
Boulder Valley School District
Center for People With Disabilities
City of Longmont
Colorado Department of Transportation
Colorado State Patrol
Coalition 4 Cyclists
Community Cycles
Denver Regional Council of Governments
Mountain View Fire Rescue
Peak to Peak Housing & Human Services
Town of Nederland

GLOSSARY

Bicycle Crash – this crash type involves a motor vehicle and at least one person who is biking or using a scooter.

Bike/Pedestrian HIN (BP HIN) – a HIN (see right) focused specifically on concentrations of crashes involving bicyclists or pedestrians.

BOCC – Board of (Boulder) County Commissioners

Broadside Crash – also known as a T-bone crash, a broadside crash happens when the front end of one car crashes into the side of another car.

CDOT – Colorado Department of Transportation

Countermeasure – an engineering solution that can be implemented to correct a crash problem or reduce the likelihood of a crash occurring.

Crash Modification Factor – used to compute the expected number of crashes after implementing a countermeasure on a street or at an intersection.

Crash Severity – refers to the extent of injury and/or property damage resulting from a traffic crash. Crash severity is categorized as property damage only, possible injury, minor injury, serious injury, or fatality.

CSP – Colorado State Patrol

DRCOG – Denver Regional Council of Governments

Fatal Crash – a crash resulting in one or more deaths.

FHWA – Federal Highway Administration

Fixed-Object Crash – this crash type involves a motor vehicle and a stationary object such as a utility pole, guardrail, tree, or building.

Injury Crash – a traffic crash that results in one or more individuals sustaining injuries, ranging from minor to serious (a "severe" crash as defined later includes fatalities).

High-Injury Network (HIN) – a data-driven mapping tool which identifies segments and intersections with the highest concentration of crashes resulting in injury, and serves as a tool to prioritize investment in safety projects.

Left-Turn Crash – a crash that occurs when someone turns left in front of oncoming traffic without yielding the right-of-way.

Rear-End Crash – this crash type occurs when the front of one vehicle collides with the back of another vehicle.

Safe Streets and Road for All (SS4A) – a federal, discretionary grant program with $5 billion to be spent nationwide between 2022 and 2026 to prevent roadway deaths and serious injuries.

Serious Injury Crash – a crash that results in an incapacitating (life altering) injury.

Severe Crash – a general term encompassing both fatal and serious injury crashes.

Systemwide Safety – an approach to safety involving widely implementing improvements based on high-risk roadway features correlated with specific severe crash types

Boulder County Transportation Sales Tax (TST) – a dedicated funding source for transportation projects and programs. Established in 2001 and extended indefinitely by voters in 2022, the TST supports roadway improvements, transit and mobility initiatives, and efforts to reduce congestion and pollution.

USDOT – United States Department of Transportation

Vision Zero – a transportation strategy to eliminate all traffic fatalities and serious injuries while increasing safe, healthy, equitable mobility for all. Vision Zero recognizes that humans make mistakes and therefore the transportation system should be designed to minimize the consequences of human error.

Vulnerable Road User – a pedestrian, bicyclist, or motorcyclist.

TABLE OF CONTENTS

EXECUTIVE SUMMARY 6

CHAPTER 1: INTRODUCTION 15

CHAPTER 2: COMMUNITY ENGAGEMENT 21

CHAPTER 3: UNDERSTANDING THE SAFETY ISSUES 25

CHAPTER 4: HOW WE WILL ACHIEVE VISION ZERO 42

CHAPTER 5: ACTION PLAN 49

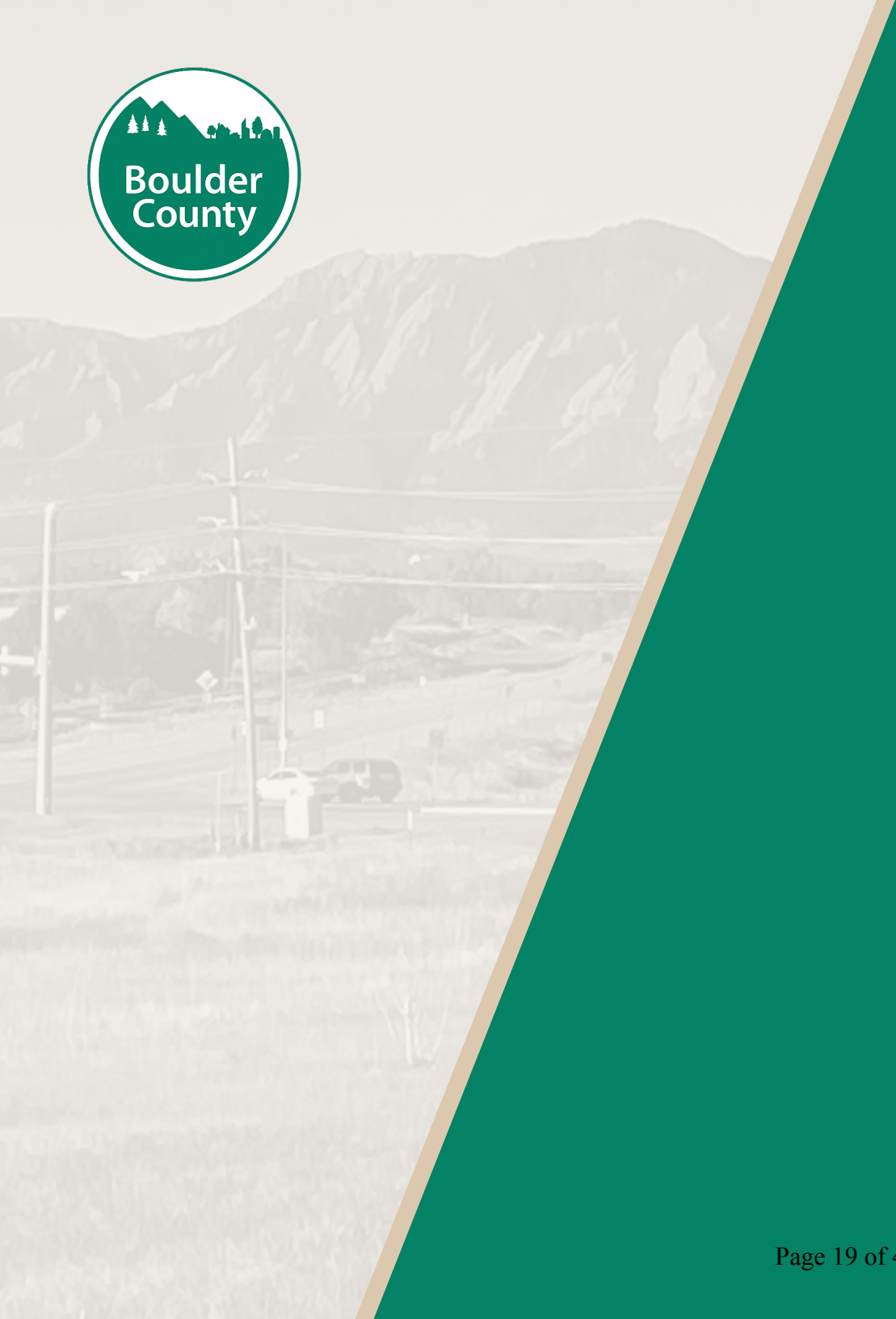
CHAPTER 6: NEXT STEPS 72

APPENDICES 77

- APPENDIX A: COMMUNITY OUTREACH SUMMARIES
- APPENDIX B: SAFETY ANALYSIS TECHNICAL MEMORANDUM
- APPENDIX C: HIGH-INJURY NETWORK (HIN) SCORING MEMORANDUM
- APPENDIX D: HIGH-INJURY NETWORK (HIN) FACT SHEETS AND PROJECT RECOMMENDATIONS - GROUP 1
- APPENDIX E: SYSTEMWIDE SAFETY ANALYSIS MEMORANDUM
- APPENDIX F: COUNTERMEASURE TOOLKIT
- APPENDIX G: FUNDING OPPORTUNITIES SUMMARY

TABLE OF FIGURES

Executive Summary Figure 1. Study Area High-Injury Network 8
Figure 1. Vision Zero Action Plan (VZAP) Study Areas 17
Figure 2. The Safe System Approach to Eliminating Traffic Deaths 18
Figure 3. Traditional Approach vs Vision Zero 18
Figure 4. Screenshot from Steering Committee Listening Session 22
Figure 5. Nederland Farmer's Market 23
Figure 6. Boulder County Winter Bike to Work Day 23
Figure 7. Study Area Crashes by Year and Severity 26
Figure 8. Study Area Roadway Network 27
Figure 9. Study Area Severe Crash Locations 28
Figure 10. Vulnerable User Crash Locations 29
Figure 11. Mountain Town Crash Locations 30
Figure 12. Study Area High-Injury Network 31
Figure 13. Safety Data Overlaid with Public Input 32
Figure 14. Screenshot from Appendix D: HIN Fact Sheets and Project Recommendations - Group 1 33
Figure 15. County Road High-Injury Network Scoring Map 34
Figure 16. CDOT Highway High-Injury Network Scoring Map 37
Figure 17. Safe System Redundancy 43
Figure 18. Projects Underway on the High-Injury Network 44
Figure 19. Screenshot from Appendix F: Countermeasure Toolkit 47
Figure 20. Impact of Vehicle Speed on Pedestrian Safety 48



EXECUTIVE SUMMARY

EXECUTIVE SUMMARY

OVERVIEW

Boulder County's Vision Zero goal identified in the 2020 Transportation Master Plan (TMP) is to eliminate all serious injury and fatal traffic crashes by 2035. This Vision Zero Action Plan identifies and prioritizes strategies and actions for the next ten years to work towards this goal.

The plan process included a comprehensive technical safety analysis to identify overall crash trends and high-crash locations of focus, called a High-Injury Network (HIN), as well as identifying top crash types and speed management-related strategies to address systemwide.

The county completed three rounds of community engagement to support and complement this effort:

- **Summer 2024**: community members' attitudes and concerns related to traffic safety in the study area.
- **Early 2025**: initial feedback on the safety treatments (countermeasures) being considered and input on factors to consider for HIN project scoring.
- **Spring 2025**: review of the draft plan.

The plan's study area covers unincorporated Boulder County, the participating mountain towns of Jamestown, Nederland, and Ward and includes both highways owned and maintained by the Colorado Department of Transportation (CDOT), as well as county-owned roads.

The plan includes a list of implementation strategies and actions. This is not a fiscally constrained plan; the county does not have all of the funding needed to implement this plan. Steps moving forward will include pursuing funding from a variety of sources and refining the prioritization of actions.

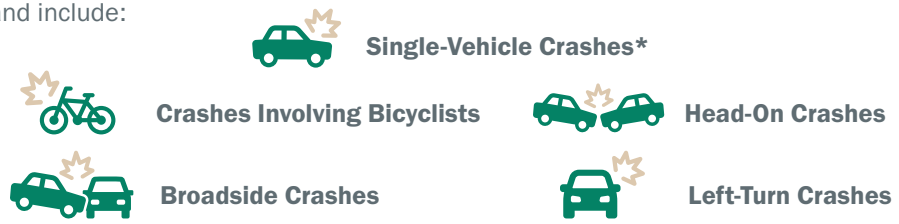
SAFETY ANALYSIS HIGHLIGHTS

Key findings based on ten years of crash data (2013-2022) include:

- **10,642** total crashes were reported, of which **496** were reported as serious injury and fatal ("severe") crashes.
- Severe crashes have fluctuated throughout the ten-year period with no sustained downward trend.
- **123** people were killed and **469** people were seriously injured.
- **174** crashes were reported involving bicyclists, **53** involving pedestrians, and **303** involving motorcyclists.
- **344** severe crashes were on CDOT highways; **152** severe crashes were on county roads.
- **149** severe crashes were at intersections; **347** severe crashes were on roadway segments.
- The highest concentrations of severe crashes were June through October. 32% of severe crashes occurred in dark conditions. 88% of severe crashes occurred in dry conditions.

The high-injury network (HIN) of high-crash locations includes **7% of the roadway miles** in the study area and **66% of the total severe crashes**. A Bike/Pedestrian HIN was also developed to ensure locations with high numbers of crashes with bike people biking and walking would be addressed.

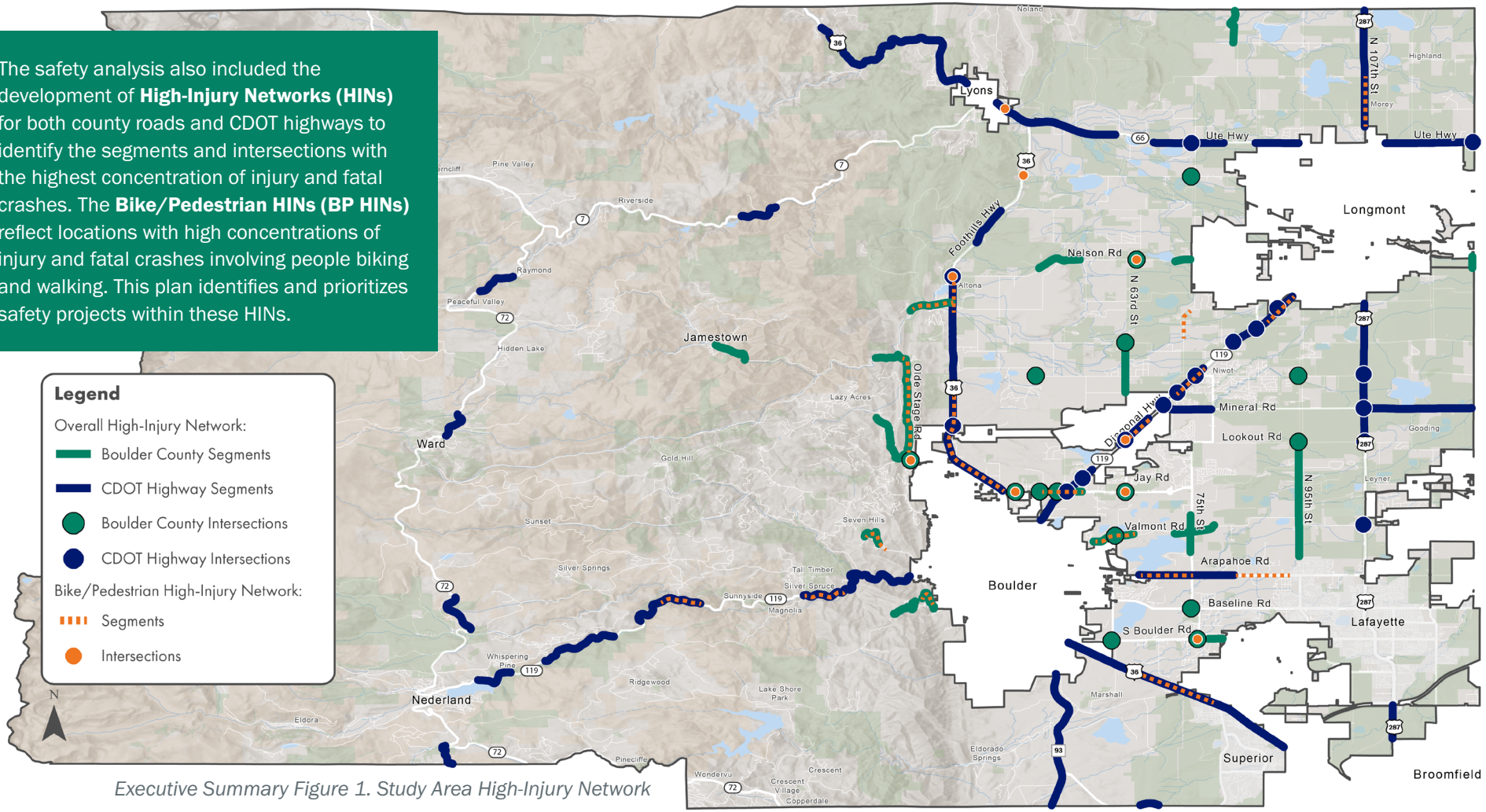
The **top five crash types** systemwide account for **over 75% of all severe crashes** and include:



**Examples of single-vehicle crashes include departing the road, colliding with fixed objects, and overturning vehicles.*

HIGH-INJURY NETWORK

The safety analysis also included the development of **High-Injury Networks (HINs)** for both county roads and CDOT highways to identify the segments and intersections with the highest concentration of injury and fatal crashes. The **Bike/Pedestrian HINs (BP HINs)** reflect locations with high concentrations of injury and fatal crashes involving people biking and walking. This plan identifies and prioritizes safety projects within these HINs.



Executive Summary Figure 1. Study Area High-Injury Network

ACTION PLAN AT-A-GLANCE

To work towards improving safety in all aspects of transportation, a targeted set of strategies and actions were developed. The Strategies and Actions focus on addressing the HINs, the most common severe crash types across the county, and improving safety for people walking and biking. The full Action Plan is presented in **Chapter 5: Action Plan** with the Strategies and Actions organized by categories aligned with the Safe System Approach. The tables below highlight Actions most relevant to specific themes, such as enforcement or speed management, and can be used to navigate to areas of interest. **Some Strategies and Actions address broader topics and may be included in more than one table. Note that this is not a comprehensive list**; for the full set of Strategies and Actions — along with next steps, lead and partner agencies, timeframe, and cost estimates — please refer to **Chapter 5: Action Plan**.

Engineering (Guidance / Analysis) Actions
Safer Roads 1-b. Analyze and develop recommendations for remaining HIN segments and intersections.
Safer Roads 3-a. Complete safety analysis, identify recommendations, and implement improvements at county locations that are on the Bike/Pedestrian HIN.
Safer Roads 4-a. Develop signal operation guidelines addressing left-turn operations, Leading Pedestrian/Bike Intervals, No Right Turn on Reds at signalized intersections.
Safer Roads 4-b. Develop pedestrian crossing treatment installation guidelines to guide where to install marked crossings and pedestrian signals.

Engineering (Guidance / Analysis) Actions
Safer Roads 4-c. Develop bicycle facility signing and striping guidelines that can be incorporated into the county's Multimodal Transportation Standards (MMTS).
Safer Roads 4-d. Review, update, if warranted, and implement the county's speed limit setting and signing practices.
Safer Roads 4-e. Incorporate speed management road design strategies into the county's update to the Multimodal Transportation Standards (MMTS).
Safer Roads 5-c. Evaluate intersection controls, identify recommendations, and implement improvements (including potential conversion to roundabouts).
Safer Roads 5-e. Identify intersections and pedestrian/bicycle crossings with no roadway lighting and install intersection lighting.
Safer Roads 5-g. Partner with municipalities and neighboring counties on cross-jurisdictional planning and design for multimodal access to trails/ trailheads.
Safer Roads 5-h. Analyze, develop recommendations, and implement improvements that address the top crash types, using **Appendix F: Countermeasure Toolkit**.
Safer Speeds 1-b. Analyze, develop recommendations, and implement speed safety cameras on county roads.
Safer Speeds 2-a. Identify county roadways where implementing speed management strategies has the greatest impact to eliminating serious injury and fatal crashes.

Engineering (Guidance / Analysis) Actions Continued on Next Page

ACTION PLAN AT-A-GLANCE

Engineering (Guidance / Analysis) Actions

Safer People 2-a. Evaluate and implement recommendations for county intersections, including but not limited to red-light cameras.

Safer People 2-b. Evaluate and implement recommendations for CDOT intersections, including but not limited to red-light cameras.

Safety Data & Reporting 1-b. Monitor and analyze ongoing crashes.

Safety Data & Reporting 2-d. Evaluate vehicle telematics data from other Boulder County departments related to safety (e.g., speeds, hard stops).

Other Actions 1-a. Analyze, develop recommendations, and implement improvements (as warranted/feasible) to the county's road sweeping practices.

Other Actions 1-b. Analyze, develop recommendations, and implement improvements (as warranted/feasible) to the county's snow removal practices.

Other Actions 2-a. Develop a Safe Routes to School Vision Zero Action Plan (SRTS VZAP).

Engineering (Implementation) Actions

Safer Roads 1-a. Implement improvements from HIN Fact Sheet Recommendations (see **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1**).

Safer Roads 1-c. Implement recommendations for remaining HIN segments and intersections.

Engineering (Implementation) Actions

Safer Roads 1-d. Implement already planned, ongoing, or upcoming county safety projects.

Safer Roads 3-a. Complete safety analysis, identify recommendations, and implement improvements at county locations that are on the Bike/Pedestrian HIN.

Safer Roads 4-d. Review, update, if warranted, and implement the county's speed limit setting and signing practices.

Safer Roads 5-a. Add reflective traffic signal backplates at signalized intersections.

Safer Roads 5-b. Add tubular reflectors to sign posts and stop signs.

Safer Roads 5-c. Evaluate intersection controls, identify recommendations, and implement improvements (including potential conversion to roundabouts).

Safer Roads 5-d. Implement the signal operation guidelines addressing left-turn operations, Leading Pedestrian/Bike Intervals, No Right Turn on Reds at signalized intersections.

Safer Roads 5-e. Identify intersections and pedestrian/bicycle crossings with no roadway lighting and install intersection lighting.

Safer Roads 5-f. Implement safety improvements for culverts that don't meet clear zone requirements.

Safer Roads 5-h. Analyze, develop recommendations, and implement improvements that address the top crash types, using **Appendix F: Countermeasure Toolkit**.

Engineering (Implementation) Actions Continued on Next Page

ACTION PLAN AT-A-GLANCE

Engineering (Implementation) Actions

Safer Speeds 1-a. Work with the BOCC and CDOT to implement speed safety cameras on CDOT roads.

Safer Speeds 1-b. Analyze, develop recommendations, and implement speed safety cameras on county roads.

Safer Speeds 2-b. Implement speed management strategies on county roadways identified in SS2-a.

Safer Speeds 2-d. Work with CDOT to implement speed management strategies on CDOT roadways identified in SS2-c.

Safer People 2-a. Evaluate and implement recommendations for county intersections, including but not limited to red-light cameras.

Safer People 2-b. Evaluate and implement recommendations for CDOT intersections, including but not limited to red-light cameras.

Other Actions 1-a. Analyze, develop recommendations, and implement improvements (as warranted/feasible) to the county's road sweeping practices.

Other Actions 1-b. Analyze, develop recommendations, and implement improvements (as warranted/feasible) to the county's snow removal practices.

Other Actions 2-b. Implement recommendations from the SRTS VZAP short- and mid-term recommendations.

Enforcement Actions

Safer Speeds 1-a. Work with the BOCC and CDOT to implement speed safety cameras on CDOT roads.

Safer Speeds 1-b. Analyze, develop recommendations, and implement speed safety cameras on county roads.

Safer People 2-a. Evaluate and implement recommendations for county intersections, including but not limited to red-light cameras.

Safer People 2-b. Evaluate and implement recommendations for CDOT intersections, including but not limited to red-light cameras.

Other Actions 4-b. Conduct additional collaboration with Colorado State Patrol (CSP) on enforcement, including driving under the influence and distracted driving.

Education / Communication Actions

Safer People 1-a. Expand and distribute roadway safety messaging and campaigns, building off messaging developed by partners such as CDOT, CSP, DRCOG, National Highway Traffic Safety Administration (NHTSA).

Safer People 1-b. Explore the creation of an ambassador program to promote roadway safety.

Safer People 1-d. Create consistent countywide Vision Zero branding and messaging.

Safer People 1-e. Implement additional training for Boulder County staff related to vehicle operations.

Education / Communications Actions Continued on Next Page

ACTION PLAN AT-A-GLANCE

Education / Communication Actions

Safer People 1-f. Offer roadway safety training to the community through Mobility for All.

Safety Data & Reporting 1-a. Report on Vision Zero progress annually.

Safety Data & Reporting 1-c. Develop a public-facing Vision Zero Dashboard.

Other Actions 3-a. Develop a memorial sign program for victims of traffic crashes (at the request of the victim's family).

Other Actions 3-b. Participate in World Day of Remembrance for Road Traffic Victims.

Other Actions 5-b. Share clear messaging with the community about relevant transportation safety legislation, particularly new laws (e.g., Hands-Free Law, Bicycle Safety Stop, Automated Traffic Enforcement, etc.).

Evaluation Actions

Safety Data & Reporting 1-a. Report on Vision Zero progress annually.

Safety Data & Reporting 1-b. Monitor and analyze ongoing crashes.

Safety Data & Reporting 1-c. Develop a public-facing Vision Zero Dashboard.

Safety Data & Reporting 2-a. Implement a safety data tool to improve data quality and facilitate analysis of crash data.

Speed Management Actions

Safer Roads 4-d. Review, update, if warranted, and implement the county's speed limit setting and signing practices.

Safer Roads 4-e. Incorporate speed management road design strategies into the county's update to the Multimodal Transportation Standards (MMTS).

Safer Speeds 1-a. Work with the BOCC and CDOT to implement speed safety cameras on CDOT roads.

Safer Speeds 1-b. Analyze, develop recommendations, and implement speed safety cameras on county roads.

Safer Speeds 2-a. Identify county roadways where implementing speed management strategies has the greatest impact to eliminating serious injury and fatal crashes.

Safer Speeds 2-b. Implement speed management strategies on county roadways identified in SS2-a.

Safer Speeds 2-c. Identify CDOT highways with a high number of speed-related crashes, and work with CDOT to implement solutions.

Safer Speeds 2-d. Work with CDOT to implement speed management strategies on CDOT roadways identified in SS2-c.

ACTION PLAN AT-A-GLANCE

Actions Underway as of VZAP Adoption (August 2025)
Safer Roads 1-d. Implement already planned, ongoing, or upcoming county safety projects.
Safer Roads 1-e. Proactively identify additional funding sources for implementation.
Safer Roads 2-c. Coordinate and collaborate with CDOT and DRCOG on relevant grant applications for CDOT HIN roadways.
Safer Roads 2-d. Continue working with CDOT, DRCOG, and municipalities on key regional safety corridors to develop and implement recommendations from current and future studies.
Safer Roads 4-a. Develop signal operation guidelines addressing left-turn operations, Leading Pedestrian/Bike Intervals, No Right Turn on Reds at signalized intersections.
Safer Speeds 1-a. Work with the BOCC and CDOT to implement speed safety cameras on CDOT roads.
Safer People 1-a. Expand and distribute roadway safety messaging and campaigns, building off messaging developed by partners such as CDOT, CSP, DRCOG, National Highway Traffic Safety Administration (NHTSA).
Safer People 1-c. Continue convening the Vision Zero Community Partnership (VZCP).
Safer People 1-d. Create consistent countywide Vision Zero branding and messaging.
Safety Data & Reporting 1-b. Monitor and analyze ongoing crashes.

Actions Underway as of VZAP Adoption (August 2025)
Safety Data & Reporting 2-a. Implement a safety data tool to improve data quality and facilitate analysis of crash data.
Other Actions 2-a. Develop a Safe Routes to School Vision Zero Action Plan (SRTS VZAP).
Other Actions 3-b. Participate in World Day of Remembrance for Road Traffic Victims.
Other Actions 4-a. Continue the interdisciplinary crash analysis team (CAT) with Boulder County, CDOT, and first responders that analyzes ongoing fatal and serious injury crashes.
Other Actions 5-a. Continue advocating/participating in the development of relevant transportation safety legislation.
Other Actions 5-b. Share clear messaging with the community about relevant transportation safety legislation, particularly new laws (e.g., Hands-Free Law, Bicycle Safety Stop, Automated Traffic Enforcement, etc.).

NEXT STEPS

Next steps to implement this plan include:

- Refining and prioritizing actions and incorporating into workplans
- Continuing ongoing programs and projects that are already underway, starting on other key items identified through the refinement above
- Pursuing additional funding
- Monitoring and evaluating effectiveness
- Reporting on progress

Refinement of actions will consider the costs and predicted effectiveness of actions, as well as staff and funding availability and ease of implementation (e.g., coordinating with other projects or programs).

Programs that are ongoing or already underway laid out by the BOCC include:

- ✔ Automated Speed Enforcement (Speed Safety Cameras) on CDOT highways (in accordance with BOCC Resolution 2024-060)
- ✔ Regional Corridor Planning and Construction (e.g., CO 119 Bikeway, US 287 Safety Project, US 36-N. Foothills Bikeway, CO 7 Corridor, Boulder-Erie Regional Trail (BERT))
- ✔ Other Transportation Sales Tax-Funded County Projects (e.g., 61st/Valmont, LoBo Trail connection to Jay Road, 120th Street reconstruction)
- ✔ Safe Routes to School Vision Zero Action Plan

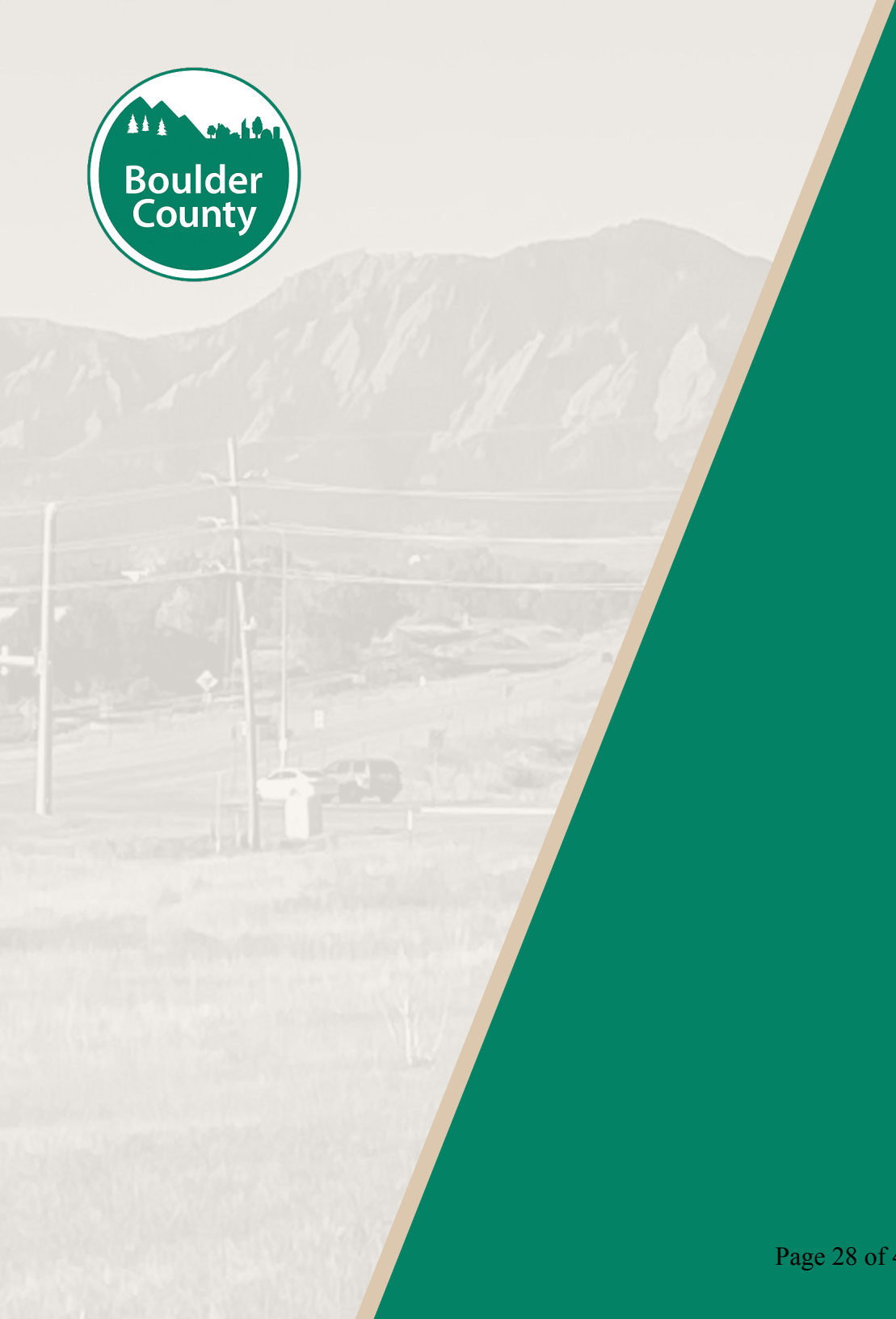
Pursuing **additional funding** will also be needed. Some of the treatments recommended in **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1** — such as installing signs — are fairly low-cost and could likely be covered through existing funding through the Transportation Sales Tax line item for Vision Zero (which averages to approximately $50,000 per year). The full set of treatments in the Fact Sheets, combined with others to be determined through the actions identified in the plan, could cost in the tens of millions and will require additional funding sources.

The county will also continue to pursue additional funding sources (see **Chapter 6: Next Steps** and **Appendix G: Funding Opportunities Summary**) to support implementation. Having this completed plan is an important first step in this process, particularly for grant requirements.

Monitoring and evaluating the effectiveness of the Boulder County VZAP is essential to ensuring progress toward a safer transportation system. The county will track the following metrics to evaluate progress towards eliminating traffic-related fatalities, serious injuries, and the top five crash types that result in serious injury and fatalities. These metrics focus on the people impacted, not just the number of crashes.

- Fatalities
- Serious injuries
- Bicyclist and pedestrian fatalities
- Fatalities and serious injuries in intersection-related crashes
- Fatalities and serious injuries in non-intersection-related crashes

In addition, the county will **track and report** on the total number of crashes, as well as progress on the implementation of the plan and the effectiveness of implemented Actions. This evaluation will support the county in continuing to make data-driven decisions and adjust strategies as needed to achieve Vision Zero goals.



CHAPTER 1

INTRODUCTION

OVERVIEW

Boulder County's Vision Zero goal is to eliminate serious injuries and fatal traffic crashes in unincorporated Boulder County by 2035, as identified in the 2020 Transportation Master Plan. The county is not currently on track to meet that goal. The Boulder County Vision Zero Action Plan (VZAP) lays out steps for Boulder County to take in collaboration with partners to achieve that goal for unincorporated areas and the mountain communities of Jamestown, Nederland, and Ward. This is not a fiscally constrained plan; the county does not have all of the funding needed to implement this plan. Steps moving forward will include pursuing funding from a variety of sources and refining the prioritization of actions.

Recognizing the importance of implementing a regional approach to roadway safety, Boulder County, in collaboration with the City of Lafayette and the Town of Superior, applied and received funding from a Safe Streets and Roads for All (SS4A) grant to develop a VZAP. This initiative includes the creation of three standalone VZAPs for Boulder County, Lafayette, and Superior to improve the transportation network and ensure a cohesive regional strategy to enhance roadway safety. By fostering inter-agency collaboration and aligning safety priorities across jurisdictions, each plan will maximize its effectiveness and implementation potential.

WHAT IS VISION ZERO?

Vision Zero is an international initiative based on the principle that no loss of life on our streets is acceptable. It aims to create a transportation system that prioritizes safety, equity, and mobility for all road users with zero traffic deaths or serious injuries.

WHAT IS A VISION ZERO ACTION PLAN?

A **Vision Zero Action Plan** is a strategic document that evaluates historic crash data and system challenges and identifies Strategies and Actions to reduce the potential for significant injuries and fatalities in the future and to ensure a safe, equitable, and effective transportation system for all users.

SAFE STREETS AND ROADS FOR ALL (SS4A) GRANT PROGRAM

In 2021, the Bipartisan Infrastructure Law established the **SS4A program** with $5 billion to be spent nationwide between 2022 and 2026. The program provides financial support for the planning and infrastructure initiatives to prevent death and serious injuries on roads and streets involving all roadway users.

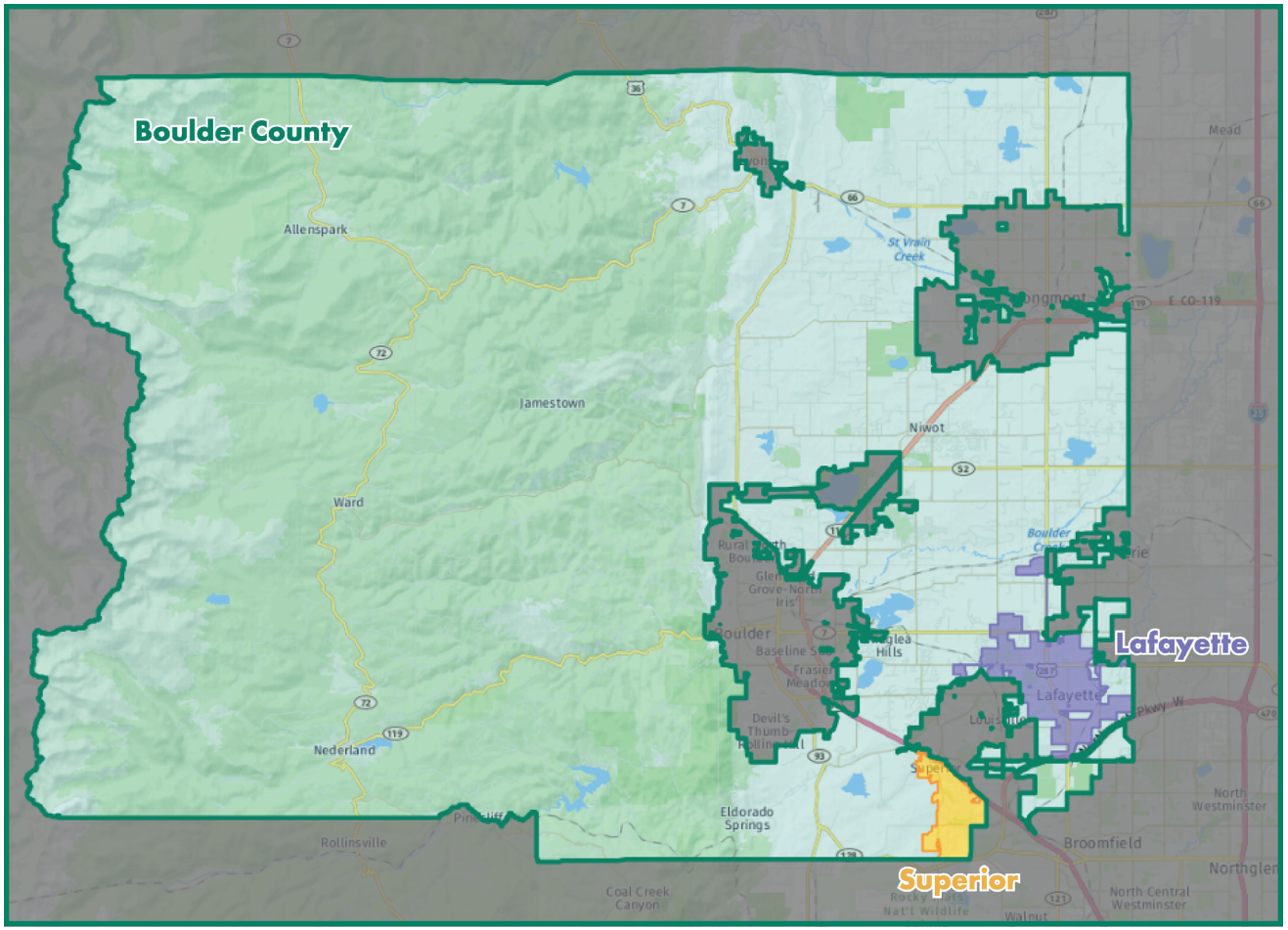


Figure 1. Vision Zero Action Plan (VZAP) Study Areas

VISION ZERO ACTION PLAN (VZAP) STUDY AREAS

The **Boulder County VZAP** provides a data-driven, community-informed strategy to address roadway safety concerns and implement targeted solutions. The Boulder County VZAP study area encompasses unincorporated Boulder County including the mountain towns of Jamestown, Nederland, and Ward. Unincorporated Boulder County's road network includes a mix of county-owned roads and highways owned by the Colorado Department of Transportation (CDOT), with a focus on improving safety for all road users, particularly vulnerable populations such as pedestrians, bicyclists, and motorcyclists. As part of the joint grant, the City of Lafayette and the Town of Superior have also developed separate Action Plans tailored to their local needs. **The remaining jurisdictions in Boulder County, including the cities of Boulder, Longmont, Louisville and the towns of Erie and Lyons are also committed to Vision Zero and have local VZAPs either completed or planned.**

WHAT IS VISION ZERO AND THE SAFE SYSTEM APPROACH?

Vision Zero is an international movement focused on **eliminating all traffic-related deaths and serious injuries.** It recognizes that human error is inevitable and that the transportation system should be designed to minimize the consequences of these mistakes. Vision Zero prioritizes safety above all else, using data-driven analysis to identify the root causes of traffic crashes and addressing them with comprehensive strategies rooted in a Safe System Approach.

The Safe System Approach focuses on five key elements:

- **Safer Roads -** emphasizing the need for transportation infrastructure that safely accommodates multiple transportation modes.
- **Safer Speeds -** identifying measures to reduce excessive speeds, a key contributor to the severity of traffic crashes.
- **Safer People -** setting the framework for education and awareness, fostering a community of shared responsibility among all road users.
- **Safer Vehicles -** expanding the accessibility of vehicle features and support systems that help prevent crashes and minimize the impact on persons involved in crashes.
- **Post-Crash Care -** enhancing the survivability of crashes and preventing secondary crashes through robust traffic incident management practices.

The Boulder County VZAP focuses primarily on Safer Roads, Safer Speeds, and Safer People.

Figure 2. The Safe System Approach to Eliminating Traffic Deaths

Traditional Approach	VS	Vision Zero
Traffic deaths are ***inevitable***		Traffic deaths are ***preventable***
Perfect human behavior		Integrate ***human failing*** in approach
Prevent ***crashes***		Prevent ***fatal and severe crashes***
Individual responsibility		***Systems*** approach
Saving lives is ***expensive***		Saving lives is ***not expensive***

Figure 3. Traditional Approach vs Vision Zero

GOALS OF THE VISION ZERO ACTION PLAN

The VZAP is built around key goals to ensure a safe, equitable, and effective transportation system. These goals include:

- ✔ Develop a comprehensive plan to support the Transportation Master Plan Vision Zero goal of eliminating traffic-related fatalities and serious injuries in unincorporated Boulder County by 2035.
- ✔ Address both county roads and highways (owned by CDOT).
- ✔ Ensure the plan is actionable, fundable, and phased and that it meets FHWA VZAP requirements.
- ✔ Develop specific recommendations for top priority crash locations and identify and prioritize additional locations of focus for further analysis and recommendations.
- ✔ Prioritize equity in transportation safety investments, ensuring that historically underserved communities receive necessary improvements.

SCHEDULE

The Boulder County VZAP process began in **Spring of 2024.** Throughout the process, community members and stakeholders were consulted to ensure that recommended strategies are coordinated, feasible, and aligned with regional safety goals. Key milestones include:

- **Phase One Outreach (Summer 2024):** Initial engagement through the Nederland Farmers Market, Ride for Magnus event, virtual public meeting, and an online survey.
- **Phase Two Outreach (Winter 2025):** Further engagement through gathering feedback on proposed safety solutions at the Boulder County Winter Bike to Work Day Event, the Nederland TownTalk, and with an online video and survey.
- **Phase Three Outreach (Spring 2025):** Community feedback on the draft plan.
- **Final Action Plan (Summer 2025):** Adoption by the Board of County Commissioners.

SUMMER 2024

Data Analysis:
Documenting major crash trends and developing the high-injury network (corridors where the most crashes are occurring).

FALL 2024

Countywide Recommendations:
Developing systemwide recommendations designed to eliminate the most prevalent crash types resulting in serious injuries or fatalities.

WINTER 2025

Project Identification:
Selecting specific project locations for detailed analysis and identifying proactive measures to address crash trends.

SPRING 2025

Action Plans:
Creating to-do lists of Strategies and Actions (both infrastructure, such as roadway improvements, and non-infrastructure, such as educational campaigns), noting responsibility and potential funding sources for implementation.

RELATED STUDIES AND PROGRAMS

The **Boulder County VZAP** builds upon the county's previous and ongoing efforts to enhance roadway safety and multimodal connectivity. It also complements Vision Zero Action Plans completed by the jurisdictions in Boulder County, including Boulder, Lafayette, Lyons, and Superior to ensure a regional approach to transportation safety.

- **Boulder County Transportation Master Plan (TMP) –** The TMP serves as the county's long-term vision for transportation and mobility. It prioritizes multimodal safety improvements, integrates Vision Zero principles, and emphasizes investments in infrastructure to protect vulnerable road users.
- **Boulder County Vision Zero Draft –** A precursor to the current VZAP, this document laid the groundwork for the county's safety strategies by assessing crash data from 2009-2018 and identifying trends by corridor, mode, and crash type.
- **US 287 Safety & Mobility Study –** This study identified critical safety issues along the US 287 corridor, a high-crash corridor with a significant number of vehicle, pedestrian, and bicycle conflicts. Recommended safety enhancements include speed management strategies (speed safety cameras), a center median barrier along rural extents, and multimodal improvements.
- **CO 119-Diagonal Hwy Safety and Mobility Improvements –** Aimed at improving safety along the Diagonal Highway, this initiative integrates road safety measures with expanded transit, pedestrian, and bicycle infrastructure. The study focuses on reducing high-speed crashes and improving connectivity for non-motorized users.
- **US 36-N. Foothills Bikeway Study –** This study examined the feasibility of multimodal safety improvements along US 36-N. Foothills Hwy to enhance bike and pedestrian safety. It provides recommendations for separated bike facilities and improved crossings at major intersections.
- **Taking Action on Regional Vision Zero –** This Denver Regional Council of Governments (DRCOG) plan was guided by local, regional, and state stakeholders, including Boulder County. The plan sets out action initiatives, an implementation timeline, and measures to help track progress toward a shared goal of zero traffic-related deaths and serious injuries.

Key Partners

Ongoing coordination with agency partners is central to Boulder County's traffic safety work. These partners contribute enforcement, data, and infrastructure support critical to implementing this Vision Zero Action Plan.

- **Colorado Department of Transportation (CDOT):** CDOT owns and maintains state highway corridors in the county. They share crash data, collaborate on grants, and lead projects such as the US 287 Safety Project, the CO 119 bikeway, and speed safety cameras in the CO 119 construction zone. CDOT is a key partner in implementing this plan.
- **Colorado State Patrol (CSP):** CSP responds to and investigates crashes on state highways. Their state-mandated enforcement program focuses on driving under the influence and other unsafe roadway behaviors. While there is limited budget for expanding enforcement, CSP continues to coordinate closely to support countywide safety efforts.
- **Boulder County Sheriff's Office:** The Sheriff's Office assists with crash response, traffic control, and general enforcement. With broad public safety responsibilities across the county, their traffic enforcement capacity is limited, but they continue to support Vision Zero efforts through coordination and information-sharing.

CHAPTER 2

COMMUNITY ENGAGEMENT

OVERVIEW

Community outreach was integrated throughout the planning process with both in-person and online opportunities for input. The VZAP reflects the input and collaboration of a diverse group of community members.

Four key groups were engaged throughout the planning process:

I. Community

Community members played a central role in shaping the VZAP. The project team facilitated public engagement through a mix of in-person pop-up events, virtual public meetings, in-person and virtual organizational/committee meetings, and online tools.

II. Steering Committee

The Steering Committee was composed of representatives from Boulder County, CDOT, DRCOG, staff and residents from the towns of Lafayette, Superior, and Nederland, emergency responders in the study area, as well as local and regional advocacy organizations. This group provided strategic guidance, technical expertise, and regional coordination throughout the planning process. The committee met throughout the planning process to review crash data findings, discuss community feedback, provide feedback on draft recommended actions, and shape the overall direction of the Action Plan.

III. Vision Zero Community Partnership

The Vision Zero Community Partnership (VZCP) is a group of local, regional, and statewide agency partners, Transportation Advisory Boards, bicycle advocacy groups, local school districts, and law enforcement officials to collaborate on our Vision Zero safety goals, policies, and projects. The project team provided regular updates at the quarterly VZCP meetings.

IV. Elected Officials

The planning process was also informed by engagement with the Board of County Commissioners. These leaders were briefed on the goals of the VZAP, shared insights from their constituents, and provided policy-level input to ensure that the plan aligns with local priorities and can be successfully adopted. Their participation helped secure broad support for the Action Plan's vision and built momentum toward implementation.

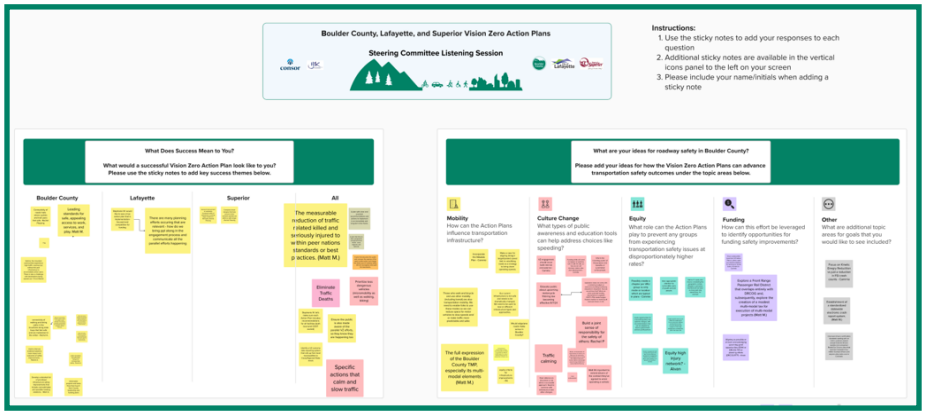


Figure 4. Screenshot from Steering Committee Listening Session

WHEN AND HOW WE ENGAGED

- **Phase One (Summer 2024):** The purpose of this phase was to identify how people travel in the study area and locations where they feel unsafe. Engagement took place at the Nederland Farmers Market and Ride for Magnus Event, through an online survey with an interactive map, and at a virtual public meeting.
- **Phase Two (Winter 2025):** In this phase, feedback was gathered on draft safety recommendations through an online survey with informational videos and in-person outreach at the Boulder County Winter Bike to Work Day and Nederland TownTalk.
- **Phase Three (Spring 2025):** Finally, the public reviewed the Action Plan and provided feedback through an online survey.

Appendix A: Community Outreach Summaries provides detail for each phase of engagement.

Figure 5. Nederland Farmer's Market

Figure 6. Boulder County Winter Bike to Work Day

Vision Zero Action Plan Engagement Events:

Phase One:

- **6/26/24** | Steering Committee Meeting
- **6/26/24 – 8/31/24** | Online Survey & Map
- **7/21/24** | Nederland Farmer's Market Community Pop-Up
- **8/8/24** | Virtual Public Meeting
- **8/11/24** | Ride for Magnus Community Pop-Up

Phase Two:

- **2/11/25 – 3/2/25** | Informational Videos & Online Survey
- **2/14/25** | Winter Bike to Work Day Community Pop-Up
- **2/20/25** | Nederland TownTalk
- **4/23/25** | Steering Committee Meeting

Phase Three:

- **5/29/25 – 6/16/25** | Public Review of Draft Plan

WHAT WE HEARD

PHASE ONE

During ***Phase One,*** community members shared input about roadway safety in the study area, particularly locations and roadway characteristics that feel unsafe. The key themes from community and stakeholder input were integrated into development of the HIN and Strategies and Actions, and included:

- **Speeding is a Major Concern.** High-speed corridors like US 287, CO 119, and South Boulder Road were frequently cited as feeling unsafe for all road users.
- **Intersections Need Safety Improvements.** Locations like US 287 & Oxford Road and CO 119-Diagonal Hwy & Niwot Road were highlighted for crash risks and poor pedestrian crossings.
- **Bicycle and Pedestrian Infrastructure is Lacking.** Many respondents called for protected bike lanes, safer crossings, and better walking conditions on key roads.
- **Traffic Law Enforcement is Inadequate.** Residents reported issues with red-light running, distracted driving, and failure to yield to pedestrians.
- **More Speed Management and Traffic Calming are Needed.** Requests for lower speed limits, roundabouts, and speed humps were common to improve road safety.

PHASE TWO

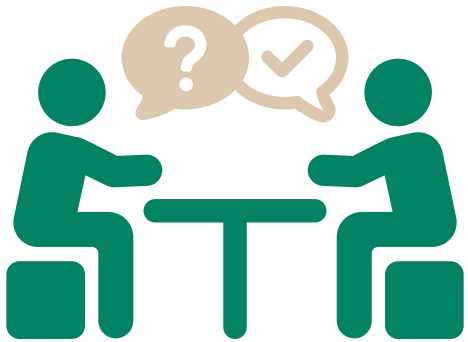
During ***Phase Two,*** community members reacted to proposed safety solutions and shared feedback about prioritizing implementation of countermeasures. The key themes from community and stakeholder input were integrated into HIN scoring and Strategies and Actions, and included:

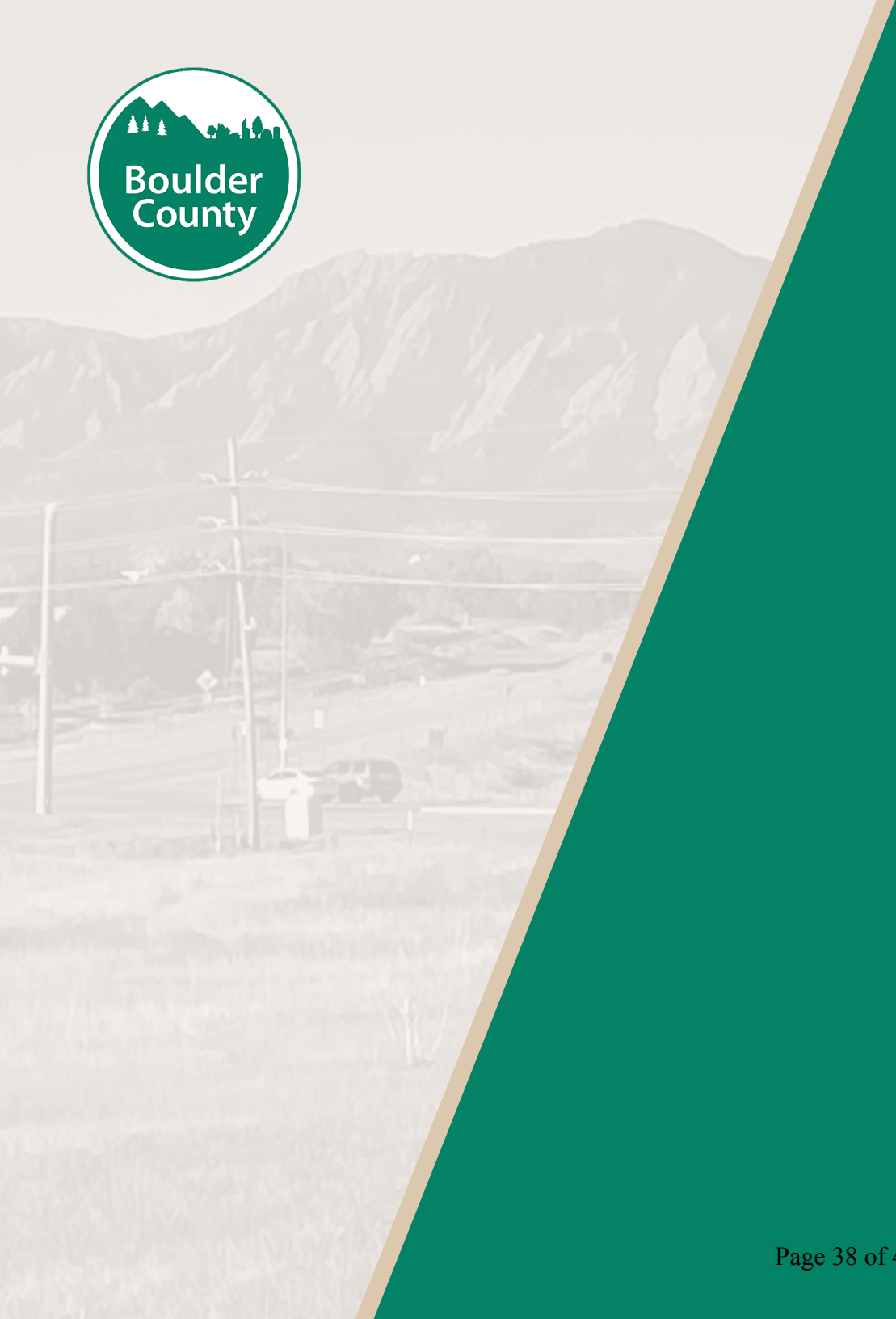
- **Red-Light Cameras Needed.** Residents strongly support adding red-light cameras at intersections that feel unsafe to improve safety.
- **Mixed Views on Rumble Strips.** Some residents find them effective for crash prevention, while others worry they make cycling less comfortable.
- **Protected Bike Lanes a Priority.** Cyclists want separated bike paths for safety and stress the need for better intersection design to prevent conflicts with vehicles.
- **Debris and Maintenance Concerns.** Many avoid biking on roads due to debris, snow buildup, and cars encroaching on bike lanes, favoring off-street paths.

PHASE THREE

During ***Phase Three,*** community members reviewed and provided feedback on the Draft Plan. The key themes from community and stakeholder input will be integrated into the Final VZAP.

- **Desire for Stronger Enforcement and Education Measures.** Several community members emphasized the importance of enhancing enforcement and community education, particularly related to speeding, distracted driving, and unsafe cycling behaviors.
- **Request for More Specific and Actionable Strategies.** Some respondents expressed concern that some proposed actions were too vague and encouraged inclusion of more detailed, tangible steps to ensure implementation results in real change.





CHAPTER 3

UNDERSTANDING THE SAFETY ISSUES

OVERVIEW

The Federal Highway Administration (FHWA) recommends that municipalities take a holistic view of Vision Zero to create a safe system that anticipates human mistakes and reduces the impact of crashes so they are less likely to cause serious injuries or fatalities. The safety analysis for the Boulder County VZAP is based on ten years of crash data (2013-2022) provided by CDOT. This analysis aims to identify key crash trends, high-injury locations, and factors that contribute to serious and fatal crashes in the study area. The VZAP relies on a thorough understanding of motor vehicle, bicycle, pedestrian, and motorcycle crash trends to inform strategic investments in safety improvements aimed at eliminating severe crashes on roads throughout the county. **Appendix B: Safety Analysis Technical Memorandum** provides more detailed information and analysis about the crash history.

The findings from this analysis serve as the foundation for developing the **High-Injury Network (HIN)** – a tool used to identify locations with the highest concentration of injury crashes to prioritize safety improvements. The safety analysis identifies trends common amongst all crashes, but focuses more specifically on crashes resulting in minor injury, serious injury, or fatality. Reviewing these more severe crash trends is critical and aligns with the Vision Zero model of aiming to reduce fatalities and serious injuries. Additionally, community feedback from public outreach was integrated to ensure alignment between the data analysis and lived experiences of Boulder County residents. Understanding this data will allow the county to direct resources where they are needed the most for improving safety and best address the root causes of crashes.

SAFETY ANALYSIS OVERVIEW

Key findings based on ten years of crash data (2013-2022) include:

10,642 total crashes were reported, of which **496** were reported as serious injury and fatal ("severe") crashes.

Severe crashes have fluctuated throughout the ten-year period with no sustained downward trend.

123 people were killed and **469** people were seriously injured.

174 crashes were reported involving bicyclists, **53** involving pedestrians, and **303** involving motorcyclists.

344 severe crashes were on CDOT highways; **152** severe crashes were on county roads.

149 severe crashes were at intersections; **347** severe crashes were on roadway segments.

The highest concentrations of severe crashes were June through October. 32% of severe crashes occurred in dark conditions. 88% of severe crashes occurred in dry conditions.

Study Area Severe Crashes by Year and Severity

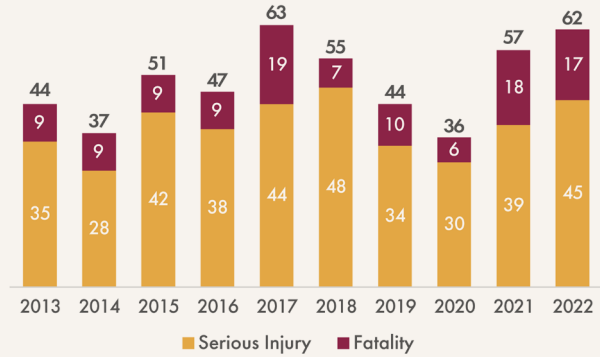


Figure 7. Study Area Crashes by Year and Severity

STUDY AREA ROADWAY NETWORK

Boulder County's roadway network includes both county-owned roads and highways that are owned, managed, and maintained by the Colorado Department of Transportation (CDOT). The CDOT highways are generally multi-lane, higher speed roadways (e.g., US 287, US 36-N. Foothills Hwy, CO 119-Diagonal Hwy). Seventy percent of the severe crashes analyzed in this plan occurred on CDOT highways.

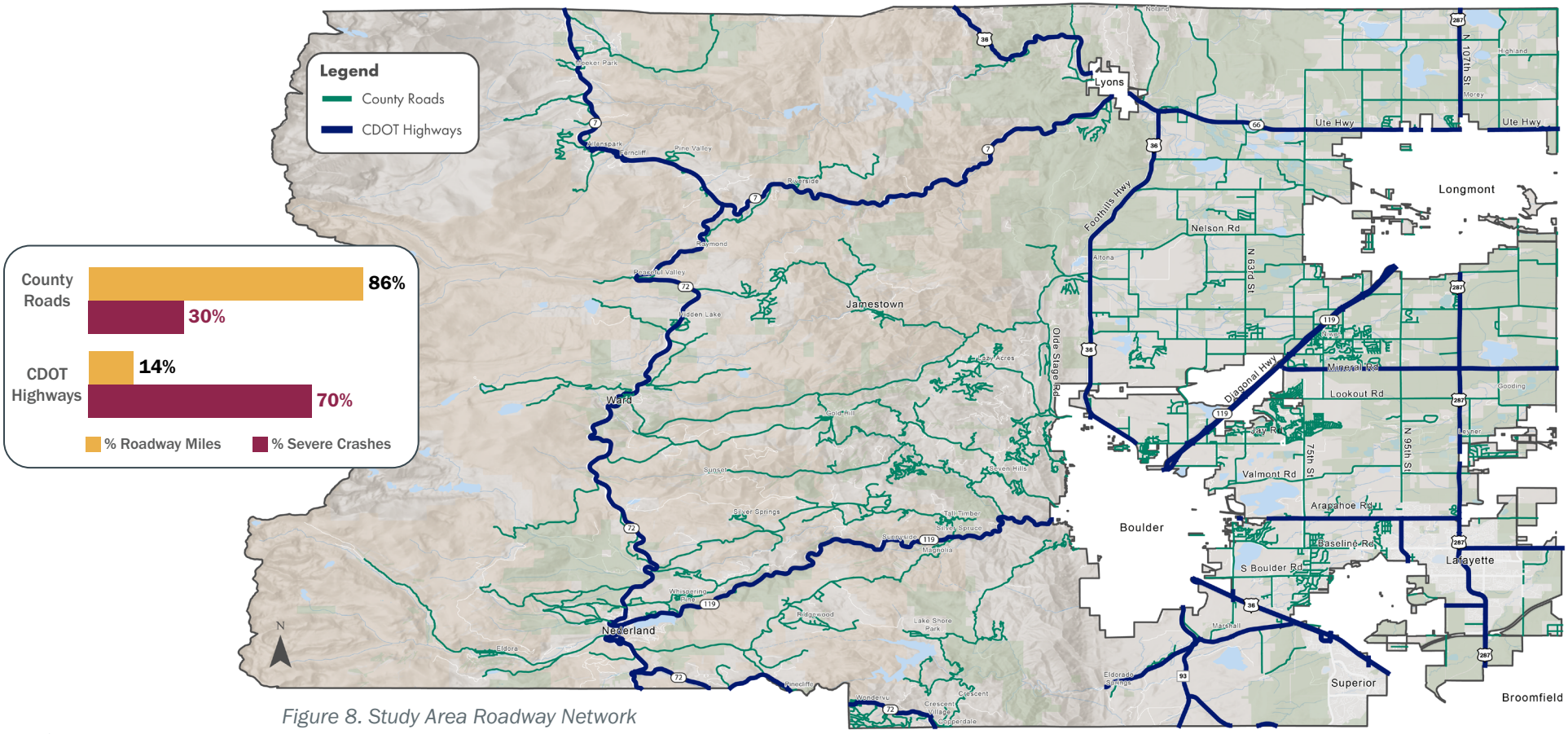


Figure 8. Study Area Roadway Network

WHERE ARE SEVERE CRASHES OCCURRING IN THE STUDY AREA?

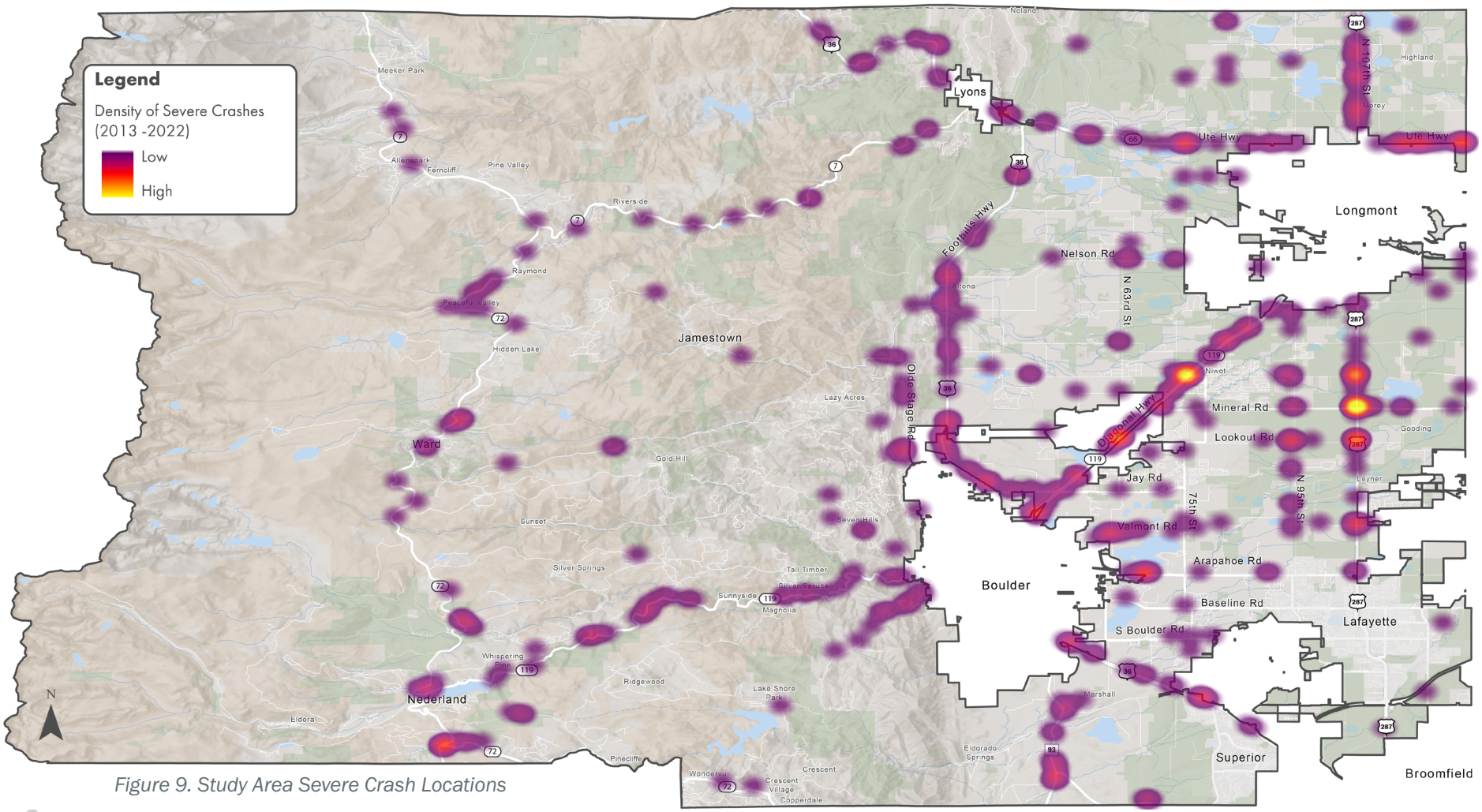


Figure 9. Study Area Severe Crash Locations

WHERE ARE VULNERABLE ROAD USER CRASHES OCCURRING IN THE STUDY AREA?

A vulnerable road user crash is a crash that involves a pedestrian, bicyclist, or motorcyclist. When people walking, bicyclists, or motorcyclists are involved in a traffic crash, they are more likely to be seriously injured or killed. Crashes involving bicyclists were one of the most common severe crash types on county roads in the study area.

Of all crashes involving bicyclists in the study area **29% resulted in a serious injury or fatality**. The roads with the majority of the bicycle crashes include US 36-N. Foothills Hwy and CO 119-Diagonal Hwy.

Of all pedestrian crashes in the study area, **38% resulted in a serious injury or fatality**. The locations with pedestrian crashes were dispersed throughout the county.

Of all motorcyclist crashes in the study area, **29% resulted in a serious injury or fatality**. The roads with the most motorcycle crashes include CO 72, CO 119-Boulder Canyon, and US 36-N. Foothills Hwy.

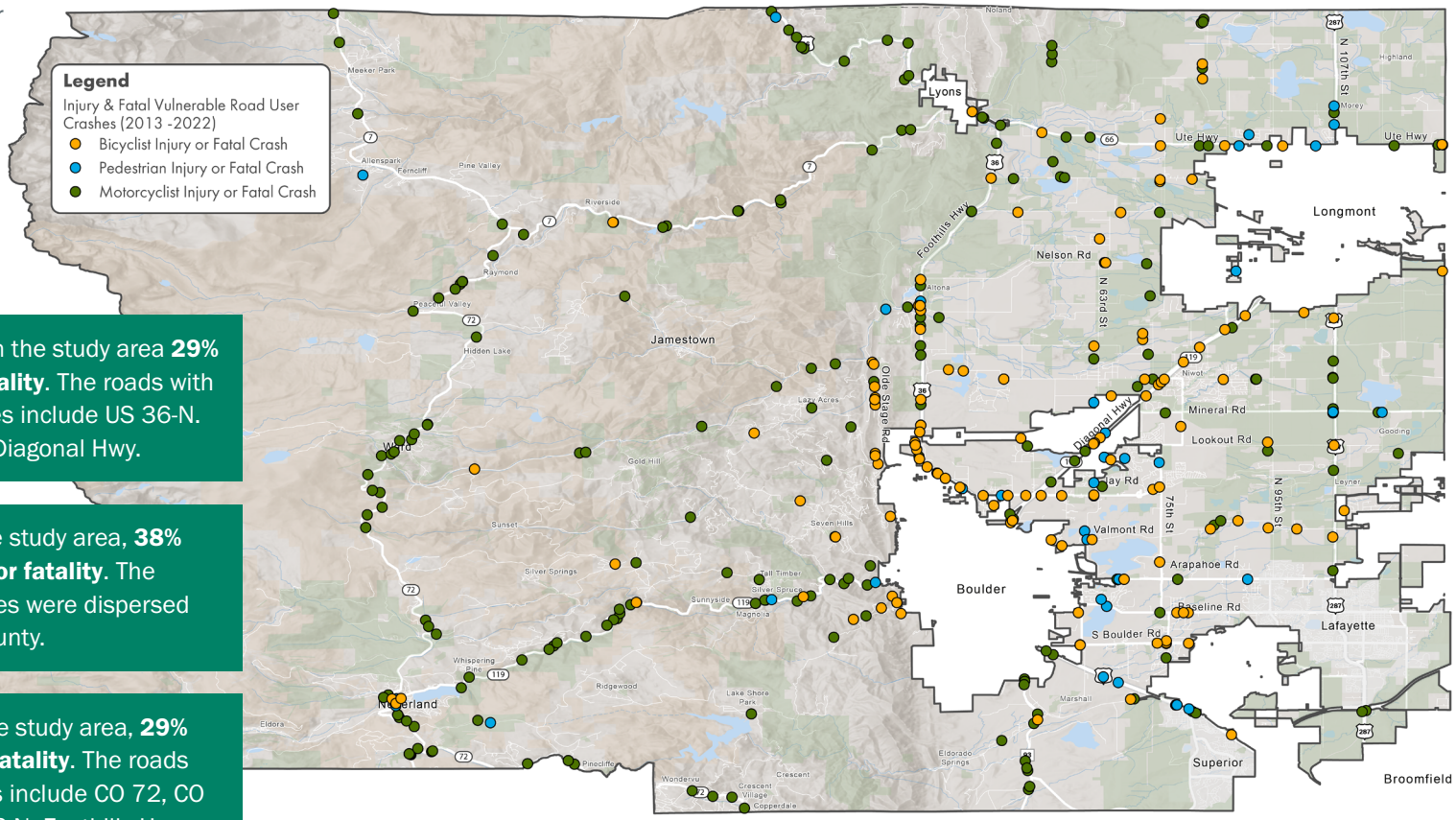


Figure 10. Vulnerable User Crash Locations

MOUNTAIN TOWN FOCUS AREAS

Across the participating mountain towns, 209 crashes occurred during the study period (2013 –2022). Of these, two serious injury crashes occurred in Ward, four serious injury crashes occurred in Nederland, and one fatal crash involving a motorcycle occurred in Nederland. Additionally, two fatal overturning crashes and three serious injury crashes occurred just north of Ward on CO 72.

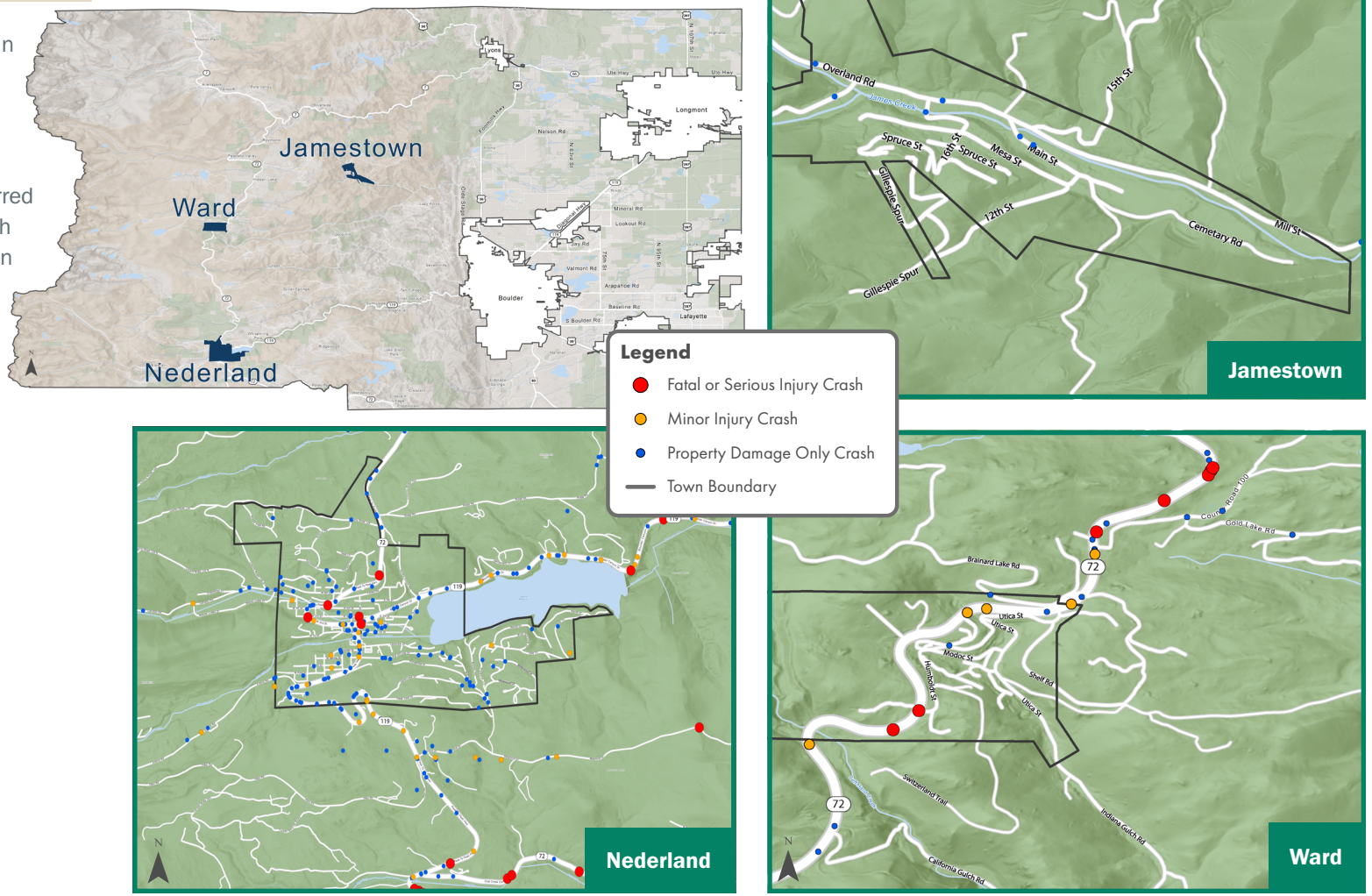


Figure 11. Mountain Town Crash Locations

HIGH-INJURY NETWORK (HIN)

The **High-Injury Network (HIN)** is a mapping tool that identifies where the highest number of people are being killed or injured on the transportation system within the study area. This data-driven approach provides a foundation for county staff to focus resources in areas where safety improvements are most critical. The most recently available ten years of crash data (2013-2022) were used to create the HIN. Minor injury crashes were included in the analysis to improve statistical reliability and provide a more complete picture of where people are getting injured. Given that bicycle and pedestrian crashes made up 15% of severe crashes in the study area, a HIN focused specifically on these modes was developed as well.

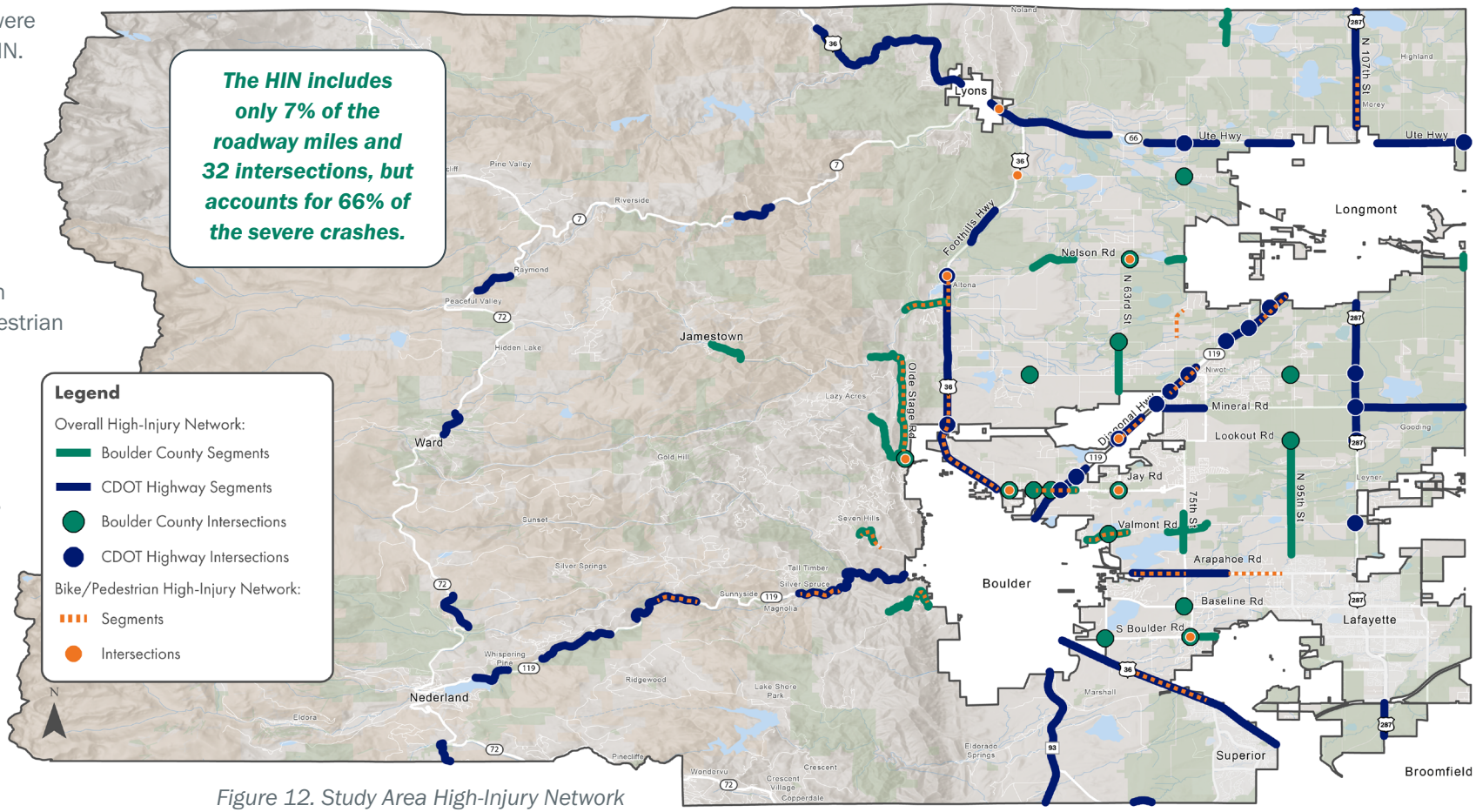


Figure 12. Study Area High-Injury Network

OVERLAYING SAFETY DATA WITH COMMUNITY INPUT

To ensure alignment between quantitative crash data and community concerns, the HIN was compared to community input from the Phase One outreach survey and interactive map. The feedback from the community about locations feeling unsafe shares significant overlap with locations identified as having historic crash trend, and can identify locations that may be at high risk for future severe crashes, even if there have not historically been concentrations.

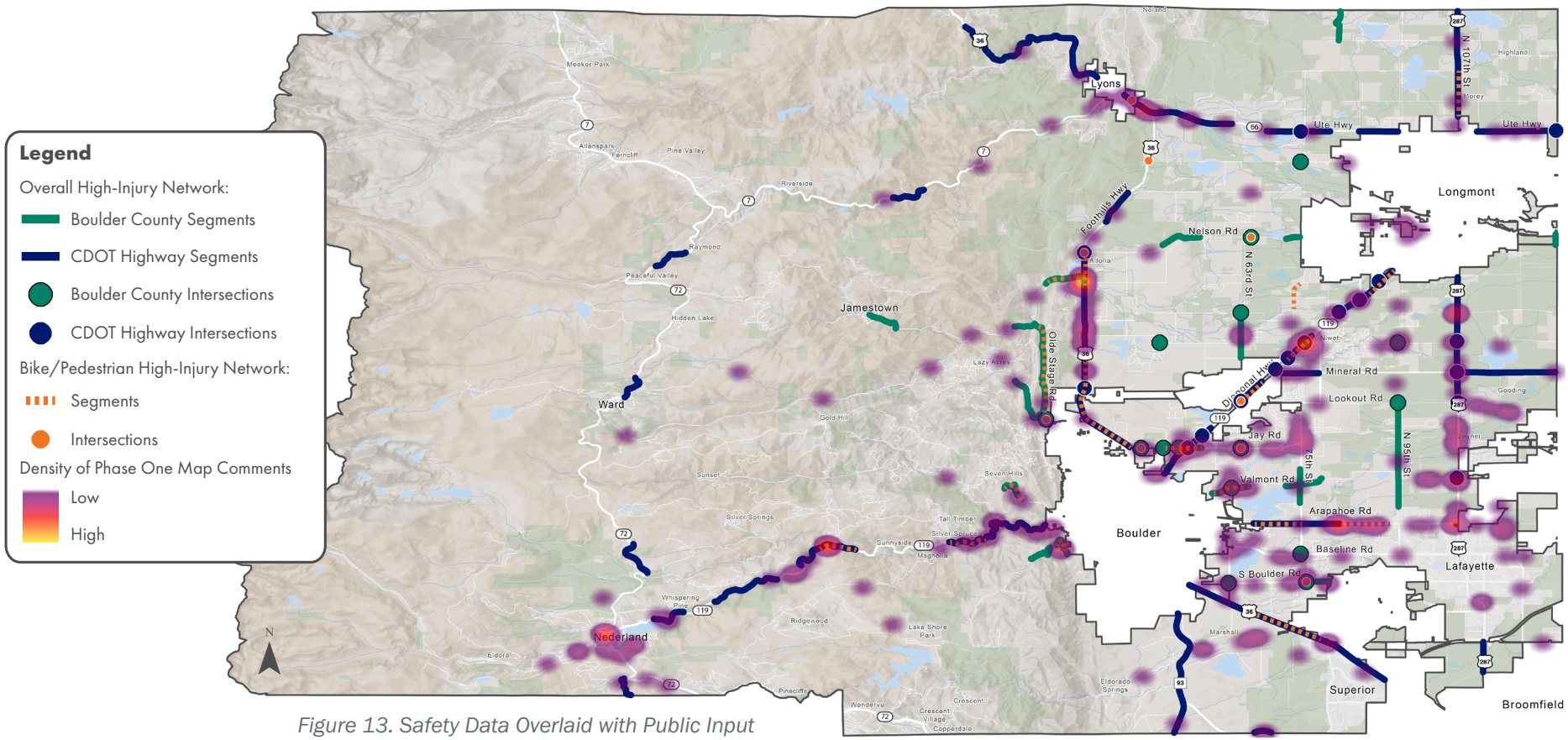


Figure 13. Safety Data Overlaid with Public Input

HIGH-INJURY NETWORK SCORING

Methodology

As part of the High-Injury Network development, the project team applied a data-driven scoring methodology to all segments and intersections within the Boulder County and CDOT HINs. Each location was scored based on a set of weighted criteria that reflect community values and safety needs.

The criteria used to score the HINs included:

- **Crash History –** Locations with the highest concentrations of severe crashes.
- **Equity –** Locations identified as providing the highest benefit to historically disadvantaged populations based on the segment-level equity index. This index was developed county-wide based on available federal and state census block-level tools, as well as high concentrations of low-wage jobs and locations in close proximity to schools and transit.
- **Vulnerable Road Users –** Locations identified as part of the Bicycle and Pedestrian HIN with a lack of bicycle facilities.
- **Community-Identified Need –** Locations with concentrations of people reporting feeling unsafe during Phase One of engagement.

The weighting for each criterion was informed by feedback gathered during Phase Two of community engagement, where participants were asked to identify the most important factors for prioritizing roadway safety investments. These results were combined with staff expertise to ensure the scoring framework aligned with both public input and practical implementation considerations. Further information on the equity index development and scoring process can be found in **Appendix C: High Injury Network (HIN) Scoring Memorandum**.

Locations on the HIN were categorized based on their scores as either High, Medium, or Low. The following pages display segments and intersections by score. The project team selected six high-scoring locations (three segments and three intersections) for further analysis and recommendation development. These are detailed in **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1**; each location includes:

- Existing Conditions
- Key Safety Concerns
- Recommendations for Improvements

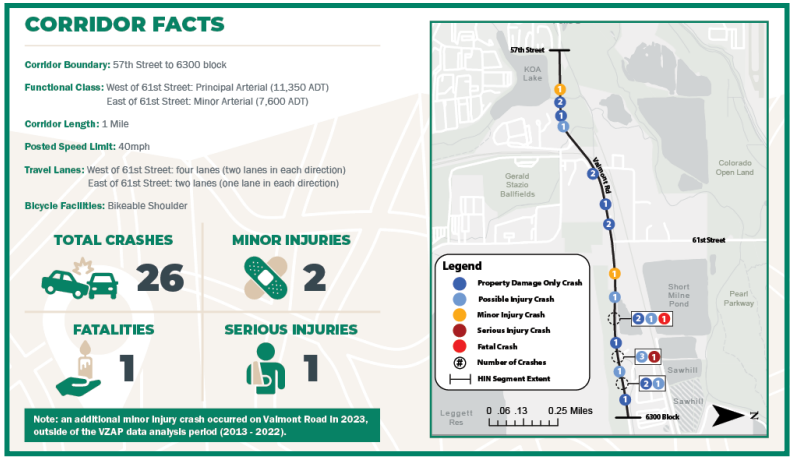


Figure 14. Screenshot from Appendix D: HIN Fact Sheets and Project Recommendations - Group 1

The score categories are a tool that will be used to inform the development of future projects in conjunction with funding availability, coordination with other planned capital and maintenance projects, and further community and agency input.

COUNTY ROAD HIGH-INJURY NETWORK (HIN) SCORING MAP

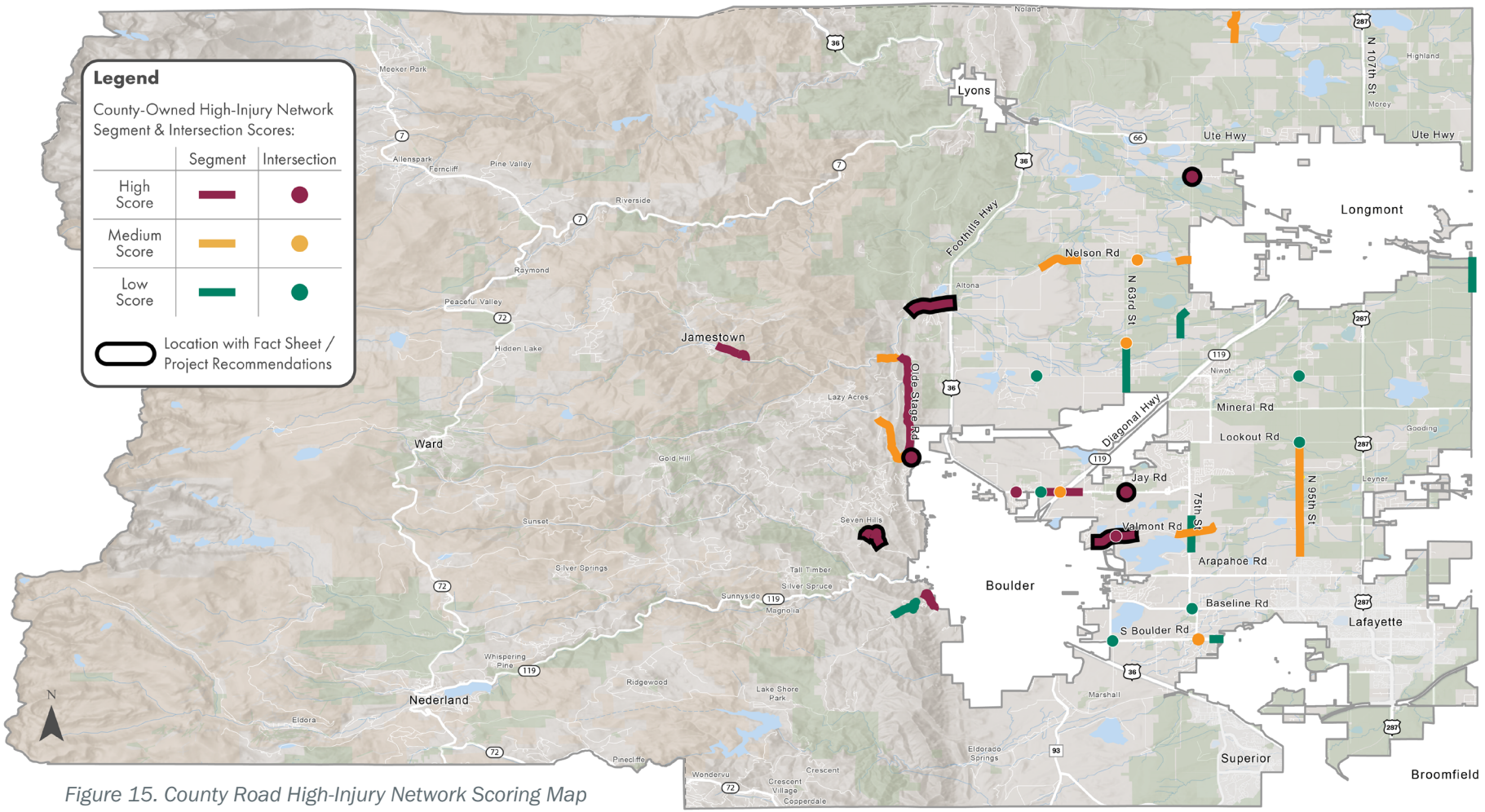


Figure 15. County Road High-Injury Network Scoring Map

COUNTY ROAD HIN SEGMENT SCORES

Segment Name	From	To
High Score Segments		
Flagstaff Road 🚲	Gregory Lane	Mile Marker 1
James Canyon Drive	Main Street	Mile Marker 2
Jay Road 🚲	47th Street	55th Street
Lefthand Canyon Drive * 🚲	US 36-N. Foothills Hwy	W of Geer Canyon Drive
Olde Stage Road 🚲	Lefthand Canyon Drive	Lee Hill Drive
Sunshine Canyon Drive * 🚲	Timber Trail	Eagles Drive
Valmont Road *	57th Street	6300 Block
Medium Score Segments		
83rd Street	County Line Road	Yellowstone Road
95th Street	Lookout Road	Boulder County Boundary
Lee Hill Drive	Olde Stage Rd	E of Reed Ranch Road
Lefthand Canyon Drive	Olde Stage Road	Crossing over Left Hand Creek
Nelson Road	Centennial Ranch	55th Street
Nelson Road	Clover Basin Reservoir	75th Street
Valmont Road 🚲	Approx. 0.4mi W of 75th Street	Approx. 0.6mi E of 7th Street (end of curves)
Low Score Segments		
63rd Street	Oxford Road	Monarch Road
73rd Street 🚲**	W of Plateau Road	N of Nimbus Road
75th Street	UP Railroad	Red Deer Drive
E County Line Road	N of Quicksilver Road	Pike Road
Flagstaff Road	Mile Marker 2	Flagstaff Drive
S Boulder Road	McCaslin Blvd	Ponderosa Drive

*** Fact Sheet Location**

🚲 On the Bike & Pedestrian High-Injury Network (BP HIN) as well as the overall HIN

🚲** Only on the BP HIN, not the overall HIN

COUNTY ROAD HIN INTERSECTION SCORES

Intersection Name
High Score Intersections
30th Street & Jay Road 🚲
61st Street & Valmont Road (Intersection Improvement Project construction anticipated Spring 2026)
63rd Street & Jay Road * 🚲
75th Street & Hygiene Road *
Lee Hill Drive & Wagonwheel Gap Road * 🚲
Medium Score Intersections
51st Street & Jay Road
63rd Street & Oxford Road
65th Street & Nelson Road 🚲
76th Street & S Boulder Road 🚲

Intersection Name
Low Score Intersections
47th Street & Jay Road
75th Street & Baseline Road
95th Street & Lookout Road
95th Street & Niwot Road
Cherryvale Road & S Boulder Road
Golf Club Drive & Niwot Road

*** Fact Sheet Location**

🚲 On the Bike & Pedestrian High-Injury Network (BP HIN) as well as the overall HIN

🚲 ** Only on the BP HIN, not the overall HIN

CDOT HIGHWAY HIGH-INJURY NETWORK (HIN) SCORING MAP

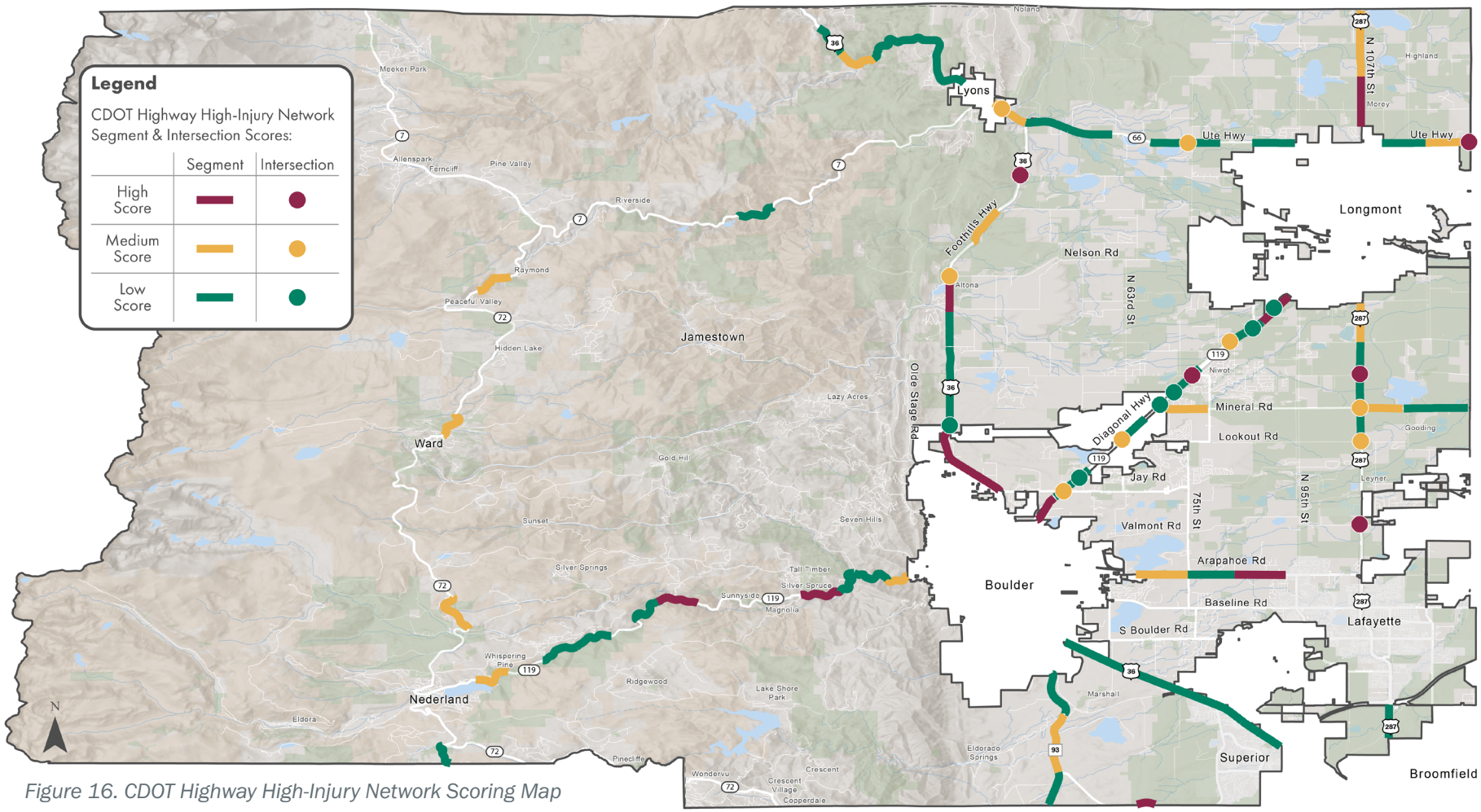


Figure 16. CDOT Highway High-Injury Network Scoring Map

CDOT HIGHWAY HIN SEGMENT SCORES

Segment Name	From	To
High Score Segments		
CO 7-Arapahoe Road 🚲 **	West of Mile Marker 58	Boulder County Boundary
CO 119-Boulder Canyon 🚲	Mile Marker 33	Mile Marker 34
CO 119-Boulder Canyon 🚲	Mile Marker 37	Mile Marker 38
CO 119-Diagonal Hwy	Mile Marker 45	South of Mile Marker 46
CO 119-Diagonal Hwy 🚲	Mile Marker 53	Mile Marker 54
CO 128	Boulder County Boundary (East of MP 2)	Boulder County Boundary (W of MP3)
US 36-N. Foothills Hwy 🚲	Longhorn Road	Hwy 7/Broadway
US 36-N. Foothills Hwy 🚲	Hwy 7/Broadway	Jay Road
US 36-N. Foothills Hwy 🚲	Nelson Road	Middle Fork Road
US 287 🚲	County Road 4	South of Mile Marker 319
Medium Score Segments		
CO 7-Arapahoe Road 🚲	Arapahoe Ridge High School	75th Street
CO 7-Peak to Peak Hwy	Mile Marker 37	Sugarloaf Road
CO 7-Peak to Peak Hwy	Mile Marker 44	Mile Marker 45
CO 7-Peak to Peak Hwy	Mile Marker 51	Mile Marker 52
CO 52-Mineral Road	North 115th Street	County Line Road
CO 52-Mineral Road	US 287	115th Street
CO 66-Ute Hwy	Boulder County Boundary	US 36
CO 66-Ute Hwy	Pace Street	County Line Road

Segment Name	From	To
Medium Score Segments (cont.)		
CO 119-Boulder Canyon	Mile Marker 27	Mile Marker 28
CO 119-Boulder Canyon	Mile Marker 40	Boulder County Boundary
Saint Vrain Road	Mile Marker 15	Mile Marker 16
US 36-Boulder Turnpike	South Vrain Road	North of Mile Marker 26
US 36-N. Foothills Hwy	Hwy 128	Eldorado Springs Drive
US 287	Boulder County Boundary	Yellowstone Road
US 287	Yellowstone Road	County Road 4
US 287	Plateau Road	Oxford Road
Low Score Segments		
112th Street	Boulder County Boundary/144th Avenue	Boulder County Boundary
CO 7-Arapahoe Road	75th Street	East of Mile Marker 58
CO 7-Peak to Peak Hwy	Boulder County Boundary	Coal Creek Canyon Road
CO 52-Mineral Road	North 115th Street	County Line Road
CO 66-Ute Hwy	US 36	53rd Street
CO 66-Ute Hwy	53rd Street	61st Street
CO 66-Ute Hwy	C & S Railroad	Pace Street
CO 66-Ute Hwy	McCall Drive	75th Street
CO 66-Ute Hwy	75th Street	Table Mountain Road
CO 66-Ute Hwy	North 87th Street	North 95th Street
CO 119-Boulder Canyon	Mile Marker 29	Mile Marker 30

🚲 On the CDOT Highway Bike & Pedestrian High-Injury Network (BP HIN) as well as the overall CDOT HIN

🚲 ** Only on the CDOT BP HIN, not the overall CDOT HIN

CDOT HIGHWAY HIN SEGMENT SCORES

Segment Name	From	To
Low Score Segments (cont.)		
CO 119-Boulder Canyon	Mile Marker 30	Mile Marker 31
CO 119-Boulder Canyon	Mile Marker 32	Mile Marker 33
CO 119-Boulder Canyon	Mile Marker 38	Mile Marker 39
CO 119-Boulder Canyon	Mile Marker 39	Mile Marker 40
CO 119-Diagonal Hwy	South of Mile Marker 46	Mile Marker 47
CO 119-Diagonal Hwy	Mile Marker 48	Mile Marker 49
CO 119-Diagonal Hwy	Mile Marker 50	Mile Marker 51
CO 119-Diagonal Hwy	Mile Marker 52	Mile Marker 53
Saint Vrain Road	Mile Marker 14	Mile Marker 15
Saint Vrain Road	Mile Marker 16	Mile Marker 17
Saint Vrain Road	Mile Marker 17	Mile Marker 18
Saint Vrain Road	Mile Marker 18	Mile Marker 19
Saint Vrain Road	Mile Marker 19	Boulder County Boundary
Saint Vrain Road	Mile Marker 25	Mile Marker 26
US 36-Boulder Turnpike	Boulder County Boundary	Mile Marker 40
US 36-Boulder Turnpike	Mile Marker 40	Mile Marker 41
US 36-Boulder Turnpike	Mile Marker 41	Mile Marker 42
US 36-Boulder Turnpike	Mile Marker 42	Mile Marker 43
US 36-Boulder Turnpike	Mile Marker 43	Mile Marker 44

Segment Name	From	To
Low Score Segments (cont.)		
US 36-Boulder Turnpike	Mile Marker 44	County Boundary
US 36-N. Foothills Hwy	County Boundary	Hwy 128
US 36-N. Foothills Hwy	Mile Marker 15	Eldorado Springs Drive
US 36-N. Foothills Hwy	Mile Marker 28	Mile Marker 29
US 36-N. Foothills Hwy	Mile Marker 29	South of Mile Marker 30
US 36-N. Foothills Hwy	South of Mile Marker 30	Longhorn Road
US 287	Oxford Road	Niwot Road
US 287	Niwot Road	CO 52-Mineral Road
US 287	CO 52-Mineral Road	Lookout Road

On the CDOT Bike & Pedestrian High-Injury Network (BP HIN) as well as the overall CDOT HIN

** Only on the BP HIN, not the overall HIN

CDOT HIGHWAY HIN INTERSECTION SCORES

Intersection Name
High Score Intersections
CO 66-Ute Hwy, 66th Street, & East County Line Road
CO 119-Diagonal Hwy & Niwot Road
US 36-N. Foothills Hwy & Hygiene Road 🚲**
US 287 & Isabelle Road
US 287 & Niwot Road
Medium Score Intersections
CO 66-Ute Hwy & 75th Street
CO 66-Ute Hwy, McConnell Drive, & Stone Canyon Drive 🚲*
CO 119-Diagonal Hwy & 63rd Street 🚲
CO 119-Diagonal Hwy & 83rd Street
CO 119-Diagonal Hwy & Jay Road
US 36-N. Foothills Hwy & Nelson Road 🚲

Intersection Name
Medium Score Intersections
US 287 & CO 52-Mineral Road
US 287 & Lookout Road
Low Score Intersections
CO 119-Diagonal Hwy & 55th Street
CO 119-Diagonal Hwy, Airport Road, & Ogallala Road
CO 119-Diagonal Hwy & Fordham Street
CO 119-Diagonal Hwy, IBM Drive, & CO 52-Mineral Road
US 36-N. Foothills Hwy & Longhorn Road
CO 119-Diagonal Hwy & Monarch Road

🚲 On the CDOT Bike & Pedestrian High-Injury Network (BP HIN) as well as the overall CDOT HIN

🚲** Only on the CDOT BP HIN, not the overall CDOT HIN

TOP SEVERE CRASH TYPES

The Boulder County VZAP focuses its systemwide recommendations on the five crash types that consistently appeared as top contributors to injury crashes across both CDOT highways and county-owned roads within the study area. By targeting these five crash types, the Plan aims to maximize safety benefits through a strategic and efficient application of countermeasures and infrastructure improvements along corridors of injury crashes.

The top five serious injury and fatal crash types account for 77% of the serious injury and fatal crashes.

SINGLE-VEHICLE CRASHES*

36%

CRASHES INVOLVING BICYCLISTS

12%

HEAD-ON CRASHES

11%

BROADSIDE CRASHES

9%

LEFT-TURN CRASHES

9%

**Examples of single-vehicle crashes include departing the road, colliding with fixed objects, and overturning vehicles.*

CHAPTER 4

HOW WE WILL ACHIEVE VISION ZERO

OVERVIEW

Vision Zero seeks to eliminate traffic-related fatalities and serious injuries through the **Safe System Approach**, which addresses the multiple elements of the environment and conditions that are part of a transportation system. The intent is to prioritize safety in a variety of ways at a variety of levels (e.g., roads, vehicles, and road users) which creates layers of protection so that if a human does make a mistake while traveling, the consequences are less severe.

To achieve Vision Zero, strategies are focused on a combination of engineering, enforcement, education, and evaluation countermeasures that complement each other to improve safety outcomes:

- **Engineering** tools focus on designing and improving infrastructure to reduce risks and protect road users, particularly those most vulnerable, such as pedestrians, bicyclists, and motorcyclists. This includes designing roads that separate different modes of travel and using safer materials and technologies to prevent crashes or minimize their severity.
- **Enforcement** tools ensure that traffic laws are obeyed through effective law enforcement practices, targeting risky behaviors like speeding, impaired driving, and failure to yield. This helps promote responsible driving and deters behaviors that contribute to crashes.
- **Education** tools involve raising awareness about road safety, teaching safe driving behaviors, and engaging the community in building a culture of safety through outreach, campaigns, and public engagement programs.
- **Evaluation** is essential to monitor progress, assess the effectiveness of safety interventions, and continually refine strategies to meet Vision Zero goals.

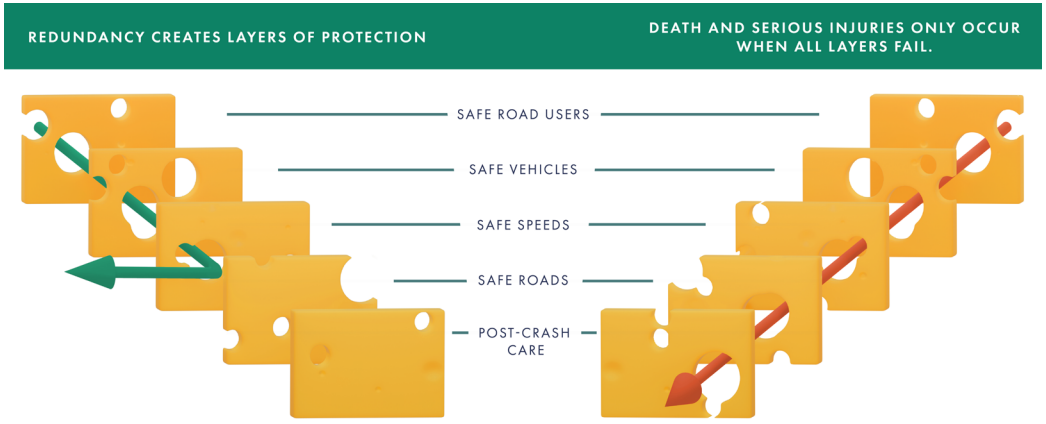


Figure 17. Safe System Redundancy

The majority of the actions identified in this plan are Engineering approaches related to Safe People, Safe Speeds, and Safe Roads, because these are elements that the County has the most direct control over.

The key elements involved in the overall approach include:

- Prioritizing improvements on the HIN and Bike/Pedestrian HIN for county roads.
- Working with CDOT to address improvements on the CDOT highways HIN and Bike/Pedestrian HIN.
- Systemwide improvements, particularly addressing the Top Severe Crash Types.
- Speed management-related measures, including speed safety cameras.

HIGH-INJURY NETWORK PROJECTS UNDERWAY

Many HIN segments and intersections have ongoing or upcoming funded projects addressing safety. See the table on the following page for details about ongoing projects on county roads (indicated by numbers) and CDOT highways (indicated by letters). Future projects, such as those identified in **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1**, will be moved forward based on funding availability, coordination with other planned capital and maintenance projects, and further community and agency input.

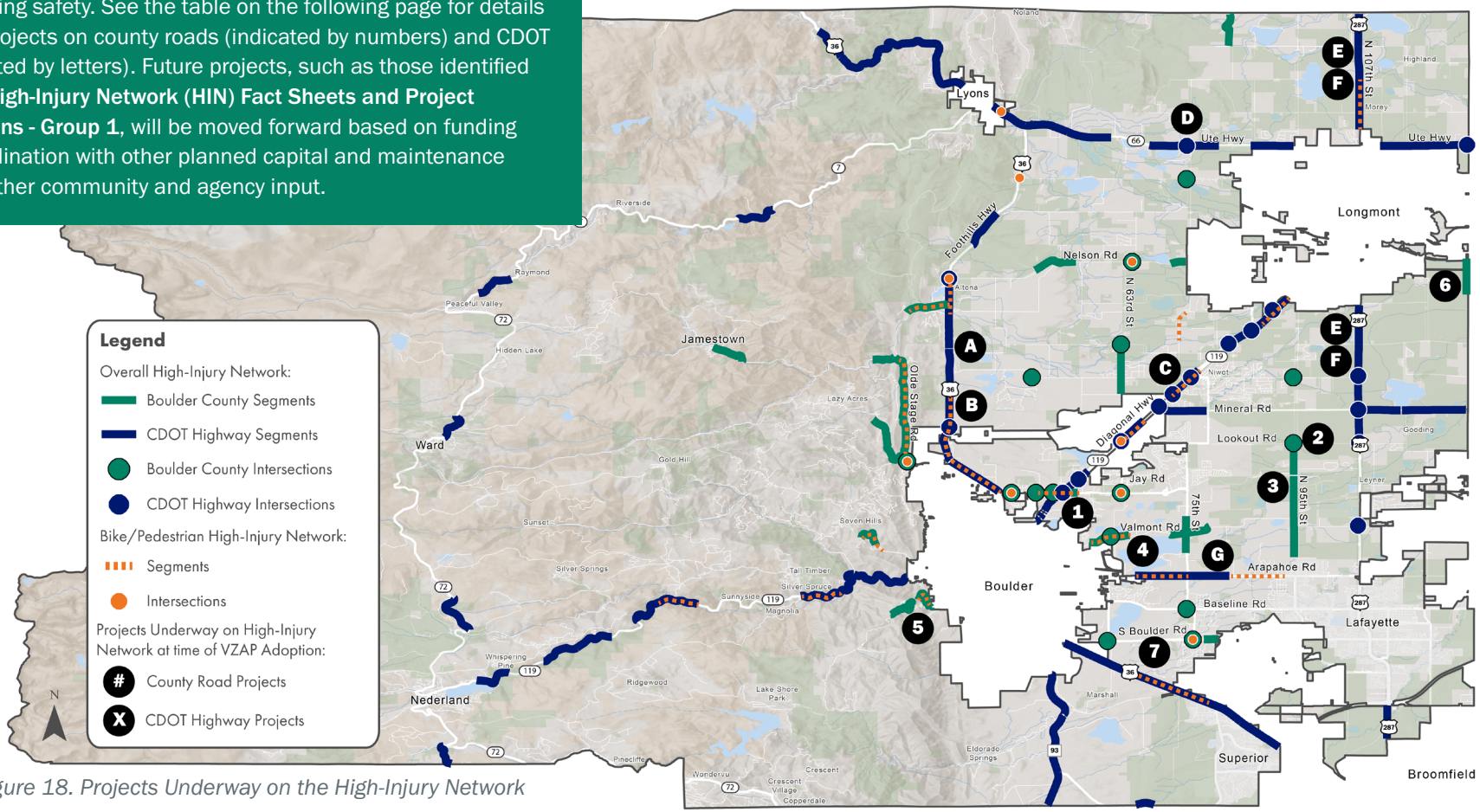


Figure 18. Projects Underway on the High-Injury Network

COUNTY ROAD HIGH-INJURY NETWORK PROJECTS UNDERWAY AS OF VZAP ADOPTION (AUGUST 2025)

	Project	Design Status	Construction Status
1	**Jay Road LOBO Trail:** new multi-use path along Jay Road, redesigned crossing at Jay Road and Spine Road.	*Complete*	*Funded - Transportation Sales Tax (TST)* Timing TBD
2	**95th Street & Lookout Road:** safety improvements designed to reduce broadside and left-turn crashes: new traffic signal with advanced warning beacons, new flashing yellow arrows, and enhanced detection with red light running protection.	*Complete*	*Complete*
3	**95th Street - Lookout Road to just north of Valmont Road:** roadway reconstruction, widen shoulders for bicycles, and flood protection infrastructure.	*Complete*	*Complete*
4	**61st Street & Valmont Road:** new southbound channelized right turn lane with speed table, new northbound bicycle crossing, updated bicycle markings, new Boulder to Erie Trail crossing north of 61st Street.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD
5	**Flagstaff Road - Mile Marker 0.75 to Gross Dam Road:** resurfacing to Gross Dam Road with paved bike pull-off areas, improved guardrail, new concrete barriers, and new drainage and sediment control structures.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD
6	**E County Line Road - Dillon Road to Overlook Drive:** full reconstruction with new bike lanes added and a traffic circle at the intersection with Pike Road.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD
7	**S Boulder Road - Manhattan Drive to Cherryvale Road:** full reconstruction with safety improvements at the Cherryvale Road intersection, improvements for multimodal users, and recoverable shoulders.	*In Progress*	*Funded - Transportation Sales Tax (TST)* Timing TBD

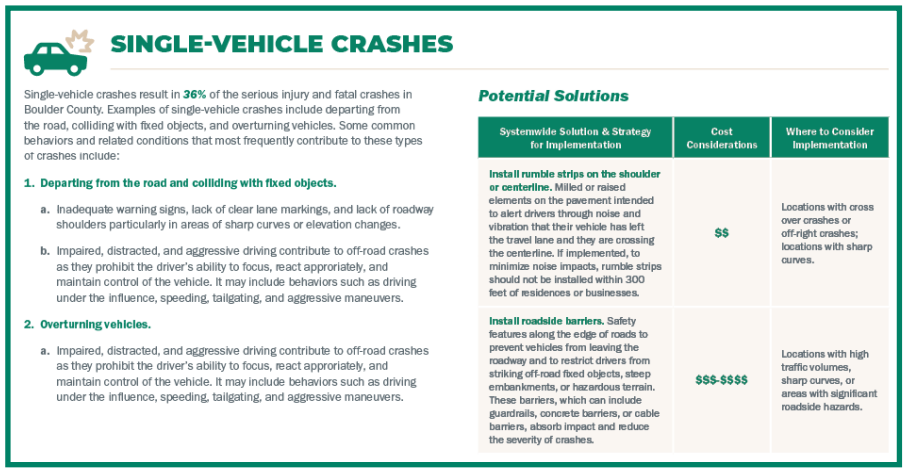
CDOT HIGHWAY HIGH-INJURY NETWORK PROJECTS UNDERWAY AS OF VZAP ADOPTION (AUGUST 2025)

	Project	Design Status	Construction Status
A	**US 36-N. Foothills Hwy Bikeway:** new off-street bikeway and related intersection improvements.	*In Progress*	*Not Funded* Applied for FY25 SS4A grant
B	**US 36-N. Foothills Hwy Speed Safety Cameras:** unincorporated Boulder County between Boulder (city limits) and CO 66-Ute Hwy.	*In Progress*	*Funded* Anticipated installation 2025
C	**CO 119-Diagonal Hwy Bikeway/Bus Rapid Transit (BRT) Intersection Construction:** new off-street bikeway, BRT lanes and stations, and related intersection improvements; CDOT speed safety cameras deployed summer 2025 for during construction.	*Complete*	*In Progress* Under construction - anticipated completion 2026
D	**CO 66-Ute Hwy & 75th Street:** upgraded signal heads, medians, striping, and turn lane alignment.	*Complete*	*Funded* Recommended FY 27-30 in CDOT's Ten-Year Plan
E	**US 287 Safety Project:** new concrete median barrier and related intersection improvements in unincorporated Boulder County between Lafayette and Longmont (south city limits) and between Longmont (north city limits) and Larimer County line.	*In Progress*	*Funded* Anticipated to begin 2026
F	**US 287 Speed Safety Cameras:** unincorporated Boulder County between Lafayette and Longmont (south city limits) and between Longmont (north city limits) and Larimer County line.	*In Progress*	*Funded* Anticipated installation 2025
G	**CO 7-Arapahoe Road Multimodal Corridor:** multimodal/safety improvements between Boulder and Brighton (e.g., Bus Rapid Transit (BRT) stations, multi-use path improvements, intersection improvements).	*In Progress*	*In Progress - Partially Funded* Timing TBD (some segments under construction)

SYSTEMWIDE APPROACH TO CRASH REDUCTION

In addition to focusing on specific locations that already have high numbers of serious injury and fatal crashes (defined here in the HIN and Bike/Pedestrian HIN), the FHWA recommends applying measures systemwide that address crash types both reactively and proactively. The reactive approach focuses on addressing safety concerns after crashes have occurred. In contrast, a proactive approach aims to prevent safety issues before they lead to crashes.

The county's systemwide approach to crash reduction will focus on evaluating and applying countermeasures to address the top five crash types that result in serious injuries and fatalities (see **Appendix E: Systemwide Safety Analysis Memorandum**). The countermeasures to be considered in this evaluation are included in **Appendix F: Countermeasure Toolkit**.



SINGLE-VEHICLE CRASHES

Single-vehicle crashes result in **36%** of the serious injury and fatal crashes in Boulder County. Examples of single-vehicle crashes include departing from the road, colliding with fixed objects, and overturning vehicles. Some common behaviors and related conditions that most frequently contribute to these types or crashes include:

1. **Departing from the road and colliding with fixed objects.**
   a. Inadequate warning signs, lack of clear lane markings, and lack of roadway shoulders particularly in areas of sharp curves or elevation changes.
   b. Impaired, distracted, and aggressive driving contribute to off-road crashes as they prohibit the driver's ability to focus, react approriately, and maintain control of the vehicle. It may include behaviors such as driving under the influence, speeding, tailgating, and aggressive maneuvers.
2. **Overturning vehicles.**
   a. Impaired, distracted, and aggressive driving contribute to off-road crashes as they prohibit the driver's ability to focus, react approriately, and maintain control of the vehicle. It may include behaviors such as driving under the influence, speeding, tailgating, and aggressive maneuvers.

Potential Solutions

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Install rumble strips on the shoulder or centerline. Milled or raised elements on the pavement intended to alert drivers through noise and vibration that their vehicle has left the travel lane and they are crossing the centerline. If implemented, to minimize noise impacts, rumble strips should not be installed within 300 feet of residences or businesses.	$$	Locations with cross over crashes or off-right crashes; locations with sharp curves.
Install roadside barriers. Safety features along the edge of roads to prevent vehicles from leaving the roadway and to restrict drivers from striking off-road fixed objects, steep embankments, or hazardous terrain. These barriers, which can include guardrails, concrete barriers, or cable barriers, absorb impact and reduce the severity of crashes.	$$$-$$$$	Locations with high traffic volumes, sharp curves, or areas with significant roadside hazards.

Figure 19. Screenshot from Appendix F: Countermeasure Toolkit

SPEED MANAGEMENT

Vehicle speeds have a substantial influence on traffic crashes. For example, at higher speeds a driver is more likely to lose control of their vehicle and/or take longer to stop. In addition, a crash at a higher speed can make the impact more severe, posing a greater risk of injury to all road users. Speeding (i.e., traveling faster than the posted speed limit) is a common contributing factor in the occurrence of traffic crashes.

There are two main ways to address speeding:

- ✔ Enforcement
- ✔ Making engineering/design changes to the roadway that encourage slower speeds

This plan is focused on addressing the most severe crashes, which typically occur more often on higher speed, higher volume roadways (such as highways and arterials), so action items will concentrate on these roads.

The county is already starting to implement automated speed enforcement through speed safety cameras (supported by BOCC Resolution 2024-060). This is particularly important, because funding and staff hours are not available for additional enforcement by officers of the CSP or Sheriff's Office. Implementation will focus on CDOT highways first and then potentially expand to other county-owned roadways that have higher speeds/volumes.

The county will complement these enforcement efforts by continuing to coordinate with CSP and the Sheriff's Office on traditional enforcement to share information and lessons learned.

Another set of actions identified in this plan includes the development of guidelines for:

- Speed limit setting (and related signage) on county roads to ensure that speed limits reflect the desired speed from a policy perspective, considering safety and context
- Engineering treatments that encourage slower speeds

Building off the new guidelines, staff will then update speed limits (as needed) and identify and implement engineering treatments to encourage travel at or below the posted speed limit. It is important to combine any change in speed limit with related engineering treatments, since simply lowering speed limits has been shown to have little to no effect in reducing vehicle speeds.

Appendix F: Countermeasure Toolkit includes some example speed management-related approaches that will be explored (see the "Speed-related Countermeasures" section on page 17 of the toolkit).

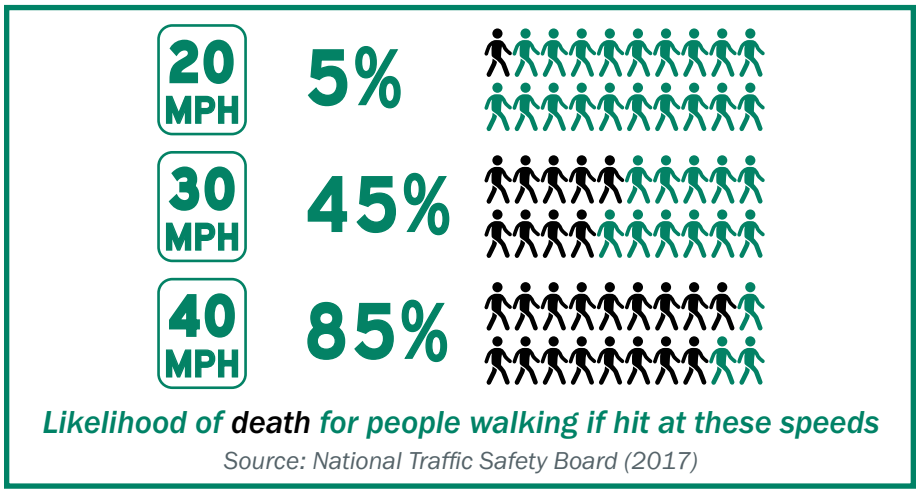
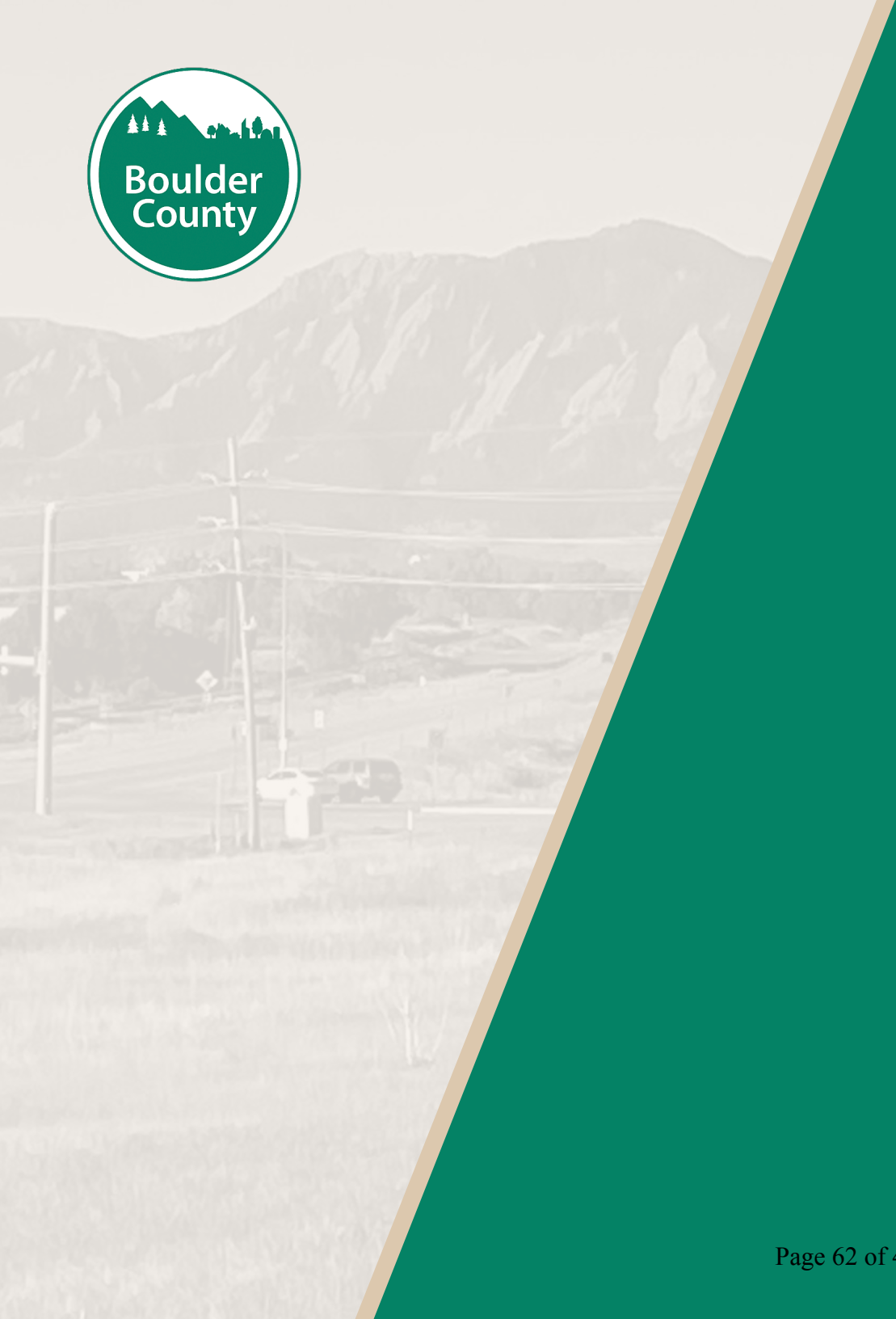


Figure 20. Impact of Vehicle Speed on Pedestrian Safety



CHAPTER 5

ACTION PLAN

OVERVIEW

To work towards improving safety in all aspects of transportation, a targeted set of strategies and actions were developed. The Strategies and Actions focus on recommendations to address the HINs and the top crash types countywide and improve safety when walking and biking. Strategies and Actions build off categories of the Safe System Approach that the county has the most control over, as well safety data and reporting and other complementary actions:

- **Safer Roads -** emphasizing the need for transportation infrastructure that safely accommodates multiple transportation modes.
- **Safer Speeds -** identifying measures to reduce excessive speeds, a key contributor to the severity of traffic crashes.
- **Safer People -** setting the framework for education and awareness, fostering a community of shared responsibility among all road users.
- **Safety Data and Reporting -** tracking and reporting on Vision Zero progress and improving data quality.
- **Other Actions -** addressing road safety concerns through partnership with other Boulder County programs.

Each overarching Strategy identifies tangible Actions which are accompanied by next steps, team or organization responsible for leading or partnering in implementation, timeframe for implementation, and planning level cost estimates. Actions are also summarized by broader topic areas, such as enforcement, engineering, and education in the "Action Plan At-A-Glance" on page 71.

Timeframe to Completion	
Ongoing	Continuous
Short-Term	1-3 years
Mid-Term	3-5 years
Long-Term	5-10 years

Pending funding availability

Funding available for Action as of VZAP Adoption

Planning-Level Cost Estimates to Completion	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

Boulder County Departments and Offices that are noted as Partner or Lead responsible parties include:	
Community Planning & Permitting	Communications
	Transportation Planning
Public Works	Engineering
	Fleet Services
	Road Maintenance
Parks & Open Space	Recreation & Facilities
County Attorney's Office	
Sheriff's Office	

SAFER ROADS

Strategy 1: Implement priority safety improvements on the County High-Injury Network.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR1-a. Implement improvements from HIN Fact Sheet Recommendations (see **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1**).	• Valmont Rd (57th St to 6300 Block) • Lefthand Canyon Dr (US 36-N. Foothills Hwy to W of Geer Canyon Dr) • Sunshine Canyon Dr (Timber Tr to Eagles Dr) • 63rd & Jay Rd Intersection • Lee Hill Dr & Wagonwheel Gap Rd Intersection • 75th St & Hygiene Rd Intersection	Public Works – Engineering *CP&P – Transportation Planning*	**Varies**	**Varies – See Fact Sheets**
SR1-b. Analyze and develop recommendations for remaining HIN segments and intersections.	• Analyze crash data for remaining HIN segments and intersections to identify trends. • Develop recommendations to correct crash trends.	Public Works – Engineering *CP&P – Transportation Planning*	**Short- to Mid-Term**	**$$ (per location)**
SR1-c. Implement recommendations for remaining HIN segments and intersections.	• Implement improvements (as standalone projects or through other county projects or maintenance tasks).	Public Works – Engineering *CP&P – Transportation Planning*	**Mid- to Long-Term**	**Varies (dependent upon recommendations)**

SAFER ROADS

Strategy 1 (cont.): Implement priority safety improvements on the County High-Injury Network.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR1-d. Implement already planned, ongoing, or upcoming county safety projects. ***Underway***	• 61st Street & Valmont Road Intersection Improvement Project • 95th Street & Lookout Road Intersection Improvements Project • LoBo Trail - Jay Road Connections Project	Public Works – Engineering *CP&P – Transportation Planning*	**Varies**	**Varies (dependent upon project)**
SR1-e. Proactively identify additional funding sources for implementation. ***Underway***	• Develop request for next Transportation Sales Tax (TST) budget. • Monitor grants (see **Appendix G: Funding Opportunities Summary**).	CP&P - Transportation Planning *Public Works - Engineering*	**Ongoing**	**$**

SAFER ROADS

Strategy 2: Work with regional partners and municipalities to implement priority safety improvements.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR2-a. Provide CDOT HIN intersection data and priorities to CDOT for the next Intersection Prioritization Study.	• Assemble crash data and rankings/ priorities for CDOT HIN intersections. • Send data to CDOT.	CP&P – Transportation Planning *CDOT*	**Short-Term**	**$**
SR2-b. Provide CDOT HIN segment data and priorities to CDOT for consideration for future projects.	• Assemble crash data and rankings/ priorities for CDOT HIN segments. • Send data to CDOT.	CP&P – Transportation Planning *CDOT*	**Short-Term**	**$**
SR2-c. Coordinate and collaborate with CDOT and DRCOG on relevant grant applications for CDOT HIN roadways. ***Underway***	• Monitor grants (see **Appendix G: Funding Opportunities Summary**).	CP&P – Transportation Planning *CDOT* *DRCOG* *Public Works – Engineering*	**Ongoing**	**Varies (dependent upon project application / local match)**
SR2-d. Continue working with CDOT, DRCOG, and municipalities on key regional safety corridors to develop and implement recommendations from current and future studies. ***Underway***	• US 287 • CO 119 • US 36-N. Foothills Hwy • CO 7 • South Boulder Road • CO 42 • Boulder-Erie Regional Trail (BERT)	CP&P – Transportation Planning *Public Works – Engineering* *CDOT* *DRCOG* *Municipalities within Boulder County*	**Ongoing**	**Varies (dependent upon project)**

SAFER ROADS

Strategy 3: Implement priority safety improvements on the Bicycle/Pedestrian High-Injury Network.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR3-a. Complete safety analysis, identify recommendations, and implement improvements at county locations that are on the Bike/ Pedestrian HIN.	• Complete at the following locations: • Olde Stage Rd (Lefthand Canyon Rd to Lee Hill Dr) • 65th Street & Nelson Road • Sunshine Canyon Rd (Timber Trail to Eagles Dr) • Valmont Rd (57th St to 6300 block) • Flagstaff Rd (Gregory Ln to Mile Marker 1) • Lefthand Canyon Rd (US 36-N. Foothills Hwy to W of Geer Canyon Dr) • 73rd St (E of Plateau Rd to N of Nimbus Rd) • S Boulder Rd & 76th St • Jay Rd (30th St to 63rd St)	Public Works – Engineering *CP&P – Transportation Planning*	**Varies**	**$$$ – $$$$$**
SR3-b. Provide Bike/Pedestrian HIN data and priorities to CDOT for the next Bike and Pedestrian Safety Study.	• Locations include: • CO 119-Boulder Canyon (Mile Marker 33-34 and Mile Marker 37-38) • US 36-N. Foothills Hwy (Broadway to 26th St) • Arapahoe Rd (Arapahoe Ridge High School to Boulder County Boundary) • US 36-N. Foothills Hwy (Longhorn Rd to Nelson Rd) • US 36-N. Foothills Hwy and Hygiene Rd • US 36-N. Foothills Hwy (Jay Rd to Longhorn Rd) • US 287 (County Rd 4 to S of Mile Marker 319) • US 66 & Stone Canyon Dr	CP&P – Transportation Planning *CDOT*	**Short-Term**	**$**

SAFER ROADS

Strategy 4: Develop roadway guidelines based on safety best practices.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR4-a. Develop signal operation guidelines addressing left-turn operations, Leading Pedestrian/ Bike Intervals, No Right Turn on Reds at signalized intersections. ***Underway***	• Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering	**Short-Term**	**$ – $$**
SR4-b. Develop pedestrian crossing treatment installation guidelines to guide where to install marked crossings and pedestrian signals.	• Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering *CP&P – Transportation Planning*	**Mid-Term**	**$ – $$**
SR4-c. Develop bicycle facility signing and striping guidelines that can be incorporated into the county's Multimodal Transportation Standards (MMTS).	• Work with County Engineer to identify scope and integration into the MMTS.	Public Works – Engineering *CP&P – Transportation Planning*	**Short-Term**	**$ – $$**
SR4-d. Review, update, if warranted, and implement the county's speed limit setting and signing practices.	• Coordinate a project team to outline areas in existing practices that require further review and research. • Prioritize actions and roadways for implementing changes and secure funding.	Public Works – Engineering	**Mid- to Long-Term**	**$$ – $$$**
SR4-e. Incorporate speed management road design strategies into the county's update to the Multimodal Transportation Standards (MMTS).	• Work with County Engineer to identify scope and integration into the MMTS.	Public Works – Engineering *CP&P – Transportation Planning*	**Short-Term**	**$$**

SAFER ROADS

Strategy 5: Proactively implement systemwide priority safety improvements.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR5-a. Add reflective traffic signal backplates at signalized intersections.	• Identify signalized intersections in the county that do not have reflective traffic signal backplates and identify funding for implementation.	Public Works – Engineering	**Short-Term**	**$ (per location)**
SR5-b. Add tubular reflectors to sign posts and stop signs.	• Identify number of sign posts/stop signs and identify funding for implementation.	Public Works – Engineering *CP&P – Transportation Planning*	**Short-Term**	**$ (per location)**
SR5-c. Evaluate intersection controls, identify recommendations, and implement improvements (including potential conversion to roundabouts).	• Utilize the CDOT Intersection Control Assessment Tool (ICAT) tool.	Public Works – Engineering *CP&P – Transportation Planning*	**Varies**	**Varies**
SR5-d. Implement the signal operation guidelines addressing left-turn operations, Leading Pedestrian/Bike Intervals, No Right Turn on Reds at signalized intersections.	• Complete SR4-a signal operation guidance and assess recommendations.	Public Works – Engineering	**Mid-Term**	**$ – $$$$ (per location)**

SAFER ROADS

Strategy 5 (cont.): Proactively implement systemwide priority safety improvements.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR5-e. Identify intersections and pedestrian/bicycle crossings with no roadway lighting and install intersection lighting.	• Identify intersections that do not have intersection lighting and pedestrian/bicycle crossings that do not have lighting within 100 feet of the crossing. • Identify funding opportunities for installation of new lighting and prioritize locations that are on the HIN.	Public Works – Engineering	**Mid-Term**	**$$ – $$$ (per location)**
SR5-f. Implement safety improvements for culverts that don't meet clear zone requirements.	• Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering *CP&P – Transportation Planning*	**Mid- to Long-Term**	**$$$ – $$$$ (per location)**
SR5-g. Partner with municipalities and neighboring counties on cross-jurisdictional planning and design for multimodal access to trails/ trailheads.	• Identify trailheads. • Prioritize. • Develop plans.	CP&P – Transportation Planning *Parks & Open Space – Recreation & Facilities* *Municipalities*	**Short-Term**	**$ – $$ (per location)**
SR5-h. Analyze, develop recommendations, and implement improvements that address the top crash types, using **Appendix F: Countermeasure Toolkit**.	• Prioritize crash types. • Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering *CP&P – Transportation Planning*	**Varies**	**Analysis/ Recommendations: $ (per crash type)** **Implementation: Varies (dependent upon recommendations)**

SAFER SPEEDS

Strategy 1: Implement speed safety cameras to reduce speeding.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SS1-a. Work with the BOCC and CDOT to implement speed safety cameras on CDOT roads. ***Underway***	• Implementation Locations: • US 36-N. Foothills Hwy (Boulder's northern city limits to CO 66-Ute Hwy) • US 287 (Lafayette's northern city limits to the southern city limits of Longmont) • US 287 (Longmont's northern city limits to Boulder County's northern limits)	Public Works – Engineering *CDOT*	**Short-Term**	**$$**
SS1-b. Analyze, develop recommendations, and implement speed safety cameras on county roads.	• Propose roads to the BOCC for consideration.	Public Works – Engineering	**Mid- to Long-Term**	**$$$**

SAFER SPEEDS

Strategy 2: Implement engineering solutions to reduce speeding.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SS2-a. Identify county roadways where implementing speed management strategies has the greatest impact to eliminating serious injury and fatal crashes.	• Develop a process to automate the identification of high-speed crashes with the Sheriff's Office and CSP and prioritize roadways based on analysis results.	Public Works – Engineering *Sheriff's Office* *Colorado State Patrol (CSP)*	**Mid- to Long-Term**	**$ – $$**
SS2-b. Implement speed management strategies on county roadways identified in SS2-b.	• Conduct analysis in SS2-b.	Public Works – Engineering *Sheriff's Office* *Colorado State Patrol (CSP)*	**Mid- to Long-Term**	**$ – $$$$$**
SS2-c. Identify CDOT highways with a high number of speed-related crashes, and work with CDOT to implement solutions.	• Develop a process to automate the identification of high-speed crashes with Sheriff's Office,CSP, and CDOT and prioritize roadways based on analysis results.	Public Works – Engineering *CDOT*	**Mid-Term**	**$ – $$**
SS2-d. Work with CDOT to implement speed management strategies on CDOT roadways identified in SS2-d.	• Conduct analysis in SS2-d.	Public Works – Engineering *Sheriff's Office* *Colorado State Patrol (CSP)*	**Mid- to Long-Term**	**$ – $$$$$**

SAFER PEOPLE

Strategy 1: Empower Boulder County community members to be Vision Zero stewards.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SP1-a. Expand and distribute roadway safety messaging and campaigns, building off messaging developed by partners such as CDOT, CSP, DRCOG, National Highway Traffic Safety Administration (NHTSA). ***Underway***	• Review existing programs and identify opportunities to collaborate. • Example themes to explore include impaired driving, distracted driving, fatigued driving, and speeding.	CP&P – Transportation Planning *CP&P – Communications* *CDOT* *CSP* *DRCOG* *NHTSA*	**Ongoing**	**$**
SP1-b. Explore the creation of an ambassador program to promote roadway safety.	• Work with Commuting Solutions to create, implement, and evaluate a pilot program.	CP&P – Transportation Planning *Commuting Solutions*	**Mid-Term**	**$$**
SP1-c. Continue convening the Vision Zero Community Partnership (VZCP). ***Underway***	• Continue developing content for and facilitating quarterly meetings.	CP&P – Transportation Planning	**Ongoing**	**$**

SAFER PEOPLE

Strategy 1 (cont.): Empower Boulder County community members to be Vision Zero stewards.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SP1-d. Create consistent countywide Vision Zero branding and messaging. ***Underway***	• Develop Vision Zero graphics that can be used by agencies countywide.	CP&P – Transportation Planning *CP&P – Communications*	**Ongoing**	**$**
SP1-e. Implement additional training for Boulder County staff related to vehicle operations.	• Research peer agency programs.	CP&P – Transportation Planning *Public Works – Fleet Services* *County Attorney's Office*	**Mid-Term**	**$$**
SP1-f. Offer roadway safety training to the community through Mobility for All.	• Review existing training and develop scope.	CP&P – Transportation Planning	**Short-Term**	**$**

SAFER PEOPLE

Strategy 2: Address red-light running crashes.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SP2-a. Evaluate and implement recommendations for county intersections, including but not limited to red-light cameras.	• Initial priorities: • South Boulder Road & Cherryvale Road • 75th Street & Valmont Road	Public Works – Engineering	**Short-Term**	**$ – $$$ (per location)**
SP2-b. Evaluate and implement recommendations for CDOT intersections, including but not limited to red-light cameras.	• Initial priorities: • US 287: CO 52-Mineral Road, Isabelle Road • Secondary priorities (a few years after construction is complete): • CO 119-Diagonal Hwy: Niwot Road, 63rd Street, CO 52-Mineral Road, and 55th Street	Public Works – Engineering *CDOT*	**Short- to Mid-Term**	**$ – $$$ (per location)**

SAFETY DATA AND REPORTING

Strategy 1: Track and report Vision Zero progress.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SD1-a. Report on Vision Zero progress annually.	• Develop a report template for the VZAP action items and metrics and create report annually.	CP&P – Transportation Planning *CP&P – Communications*	**Ongoing**	**$**
SD1-b. Monitor and analyze ongoing crashes. ***Underway***	• Update VZAP key charts and maps and analyze changes in trends.	CP&P – Transportation Planning	**Ongoing**	**$**
SD1-c. Develop a public-facing Vision Zero Dashboard.	• Determine scope and system requirements.	CP&P – Transportation Planning *CP&P – Communications* *CSP*	**Mid-Term**	**$$**

SAFETY DATA AND REPORTING

Strategy 2: Improve the quality and completeness of safety data.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SD2-a. Implement a safety data tool to improve data quality and facilitate analysis of crash data. ***Underway***	• Research programs used by peer agencies (e.g., CDOT) and implement solution that best meets county needs and budget.	Public Works – Engineering *CP&P – Transportation Planning*	**Short-Term**	**$**
SD2-b. Research ways to obtain supplemental data for bicycle and pedestrian crashes/close calls.	• Review peer agency programs such as FHWA's Pedestrian and Bicycle Crash Analysis Tool (PBCAT). • Coordinate with hospitals and urgent care facilities to share data about vulnerable user injuries resulting from traffic crashes.	CP&P – Transportation Planning *Public Works – Engineering*	**Mid-Term**	**$**
SD2-c. Research ways to obtain more complete and accurate multimodal counts.	• Review count programs and related budgets of peer agencies.	CP&P – Transportation Planning *Public Works – Engineering*	**Short-Term**	**$**
SD2-d. Evaluate vehicle telematics data from other Boulder County departments related to safety (e.g., speeds, hard stops).	• Coordinate with Parks & Open Space about ongoing implementation and Fleet Services' upcoming implementation (2025).	CP&P – Transportation Planning *Parks and Open Space* *Fleet Services* *Public Works – Engineering*	**Short-Term**	**$**

OTHER ACTIONS

Strategy 1: Evaluate Boulder County road maintenance practices to enhance safety.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA1-a. Analyze, develop recommendations, and implement improvements (as warranted/feasible) to the county's road sweeping practices.	• Research peer agency best practices and determine if adjustments to current practices are warranted.	Public Works – Road Maintenance *CP&P – Transportation Planning*	**Mid-Term**	**$ – $$$**
OA1-b. Analyze, develop recommendations, and implement improvements (as warranted/ feasible) to the county's snow removal practices.	• Research peer agency best practices and determine if adjustments to current practices are warranted.	Public Works – Road Maintenance *CP&P – Transportation Planning*	**Mid-Term**	**$ – $$$**

OTHER ACTIONS

Strategy 2: Collaborate with County school districts on Vision Zero.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA2-a. Develop a Safe Routes to School Vision Zero Action Plan (SRTS VZAP). ***Underway***	• Kick off project, including compiling project management team members, steering committee, and community outreach plan.	CP&P – Transportation Planning *Public Works – Engineering* *Boulder Valley and Saint Vrain School Districts (BVSD & SVVSD)* *Other Boulder County Municipalities*	**Short-Term**	**$$$**
OA2-b. Implement recommendations from the SRTS VZAP short- and mid-term recommendations.	• Assign lead agencies/staff to short-term actions and secure funding.	CP&P – Transportation Planning *Public Works – Engineering* *Boulder Valley and Saint Vrain School Districts (BVSD & SVVSD)* *Other Boulder County Municipalities*	**Varies**	**$ – $$$**

OTHER ACTIONS

Strategy 3: Honor the victims and families of those involved in traffic crashes.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA3-a. Develop a memorial sign program for victims of traffic crashes (at the request of the victim's family).	• Research peer city programs and review findings with families of past victims.	CP&P – Transportation Planning	**Short-Term**	**$**
OA3-b. Participate in World Day of Remembrance for Road Traffic Victims. ***Underway***	• Coordinate with VZCP and other partners to prepare for the upcoming commemoration on November 16, 2025. • Continue participation annually.	CP&P – Transportation Planning	**Ongoing**	**$**

OTHER ACTIONS

Strategy 4: Collaborate with first responders.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA4-a. Continue the interdisciplinary crash analysis team (CAT) with Boulder County, CDOT, and first responders that analyzes ongoing fatal and serious injury crashes. ***Underway***	• Review current process and implement improvements if warranted.	CP&P – Transportation Planning *Public Works – Engineering* *CDOT* *CSP* *Sheriff's Office*	**Ongoing**	**$**
OA4-b. Conduct additional collaboration with CSP on enforcement, including driving under the influence and distracted driving.	• Reach out to CSP to set up meeting.	CP&P – Transportation Planning *Public Works – Engineering*	**Ongoing**	**$**
OA4-c. Explore collaboration with hospitals to learn more about post-crash care and injuries from unreported crashes.	• Review ongoing efforts by regional partners (e.g., DRCOG). • Coordinate with hospitals and urgent care facilities to share data about vulnerable user injuries resulting from traffic crashes.	CP&P – Transportation Planning	**Short-Term**	**$**

OTHER ACTIONS

Strategy 5: Be active in Colorado transportation safety legislation.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA5-a. Continue advocating/ participating in the development of relevant transportation safety legislation. ***Underway***	• Coordinate with the BOCC department on relevant state transportation safety legislation.	CP&P – Transportation Planning *BOCC*	**Ongoing**	**$**
OA5-b. Share clear messaging with the community about relevant transportation safety legislation, particularly new laws (e.g., Hands-Free Law, Bicycle Safety Stop, Automated Traffic Enforcement, etc.). ***Underway***	• Identify and distribute information through county channels.	CP&P – Transportation Planning *BOCC* *CP&P – Communications*	**Ongoing**	**$**

ACTION PLAN AT-A-GLANCE

The Action Plan is organized into categories of the Safe System Approach, but Strategies and Actions addressing broader topic areas may be found under more than one category. The tables below list the Actions most relevant to certain topics, and can be used to reference and navigate to specific areas of interest.

Engineering (Guidance / Analysis) Actions	
Safer Roads 1-b	Safer Roads 5-h
Safer Roads 3-a	Safer Speeds 1-b
Safer Roads 4-a	Safer Speeds 2-a
Safer Roads 4-b	Safer People 2-a
Safer Roads 4-c	Safer People 2-b
Safer Roads 4-d	Safety Data & Reporting 1-b
Safer Roads 4-e	Safety Data & Reporting 2-d
Safer Roads 5-c	Other Actions 1-a
Safer Roads 5-e	Other Actions 1-b
Safer Roads 5-g	Other Actions 2-a

Engineering (Implementation) Actions	
Safer Roads 1-a	Safer Roads 5-h
Safer Roads 1-c	Safer Speeds 1-a
Safer Roads 1-d	Safer Speeds 1-b
Safer Roads 3-a	Safer Speeds 2-b
Safer Roads 4-d	Safer Speeds 2-d
Safer Roads 5-a	Safer People 2-a
Safer Roads 5-b	Safer People 2-b
Safer Roads 5-c	Other Actions 1-a
Safer Roads 5-d	Other Actions 1-b
Safer Roads 5-e	Other Actions 2-b
Safer Roads 5-f	

Enforcement Actions	
Safer Speeds 1-a	Safer People 2-b
Safer Speeds 1-b	Other Actions 4-b
Safer People 2-a	

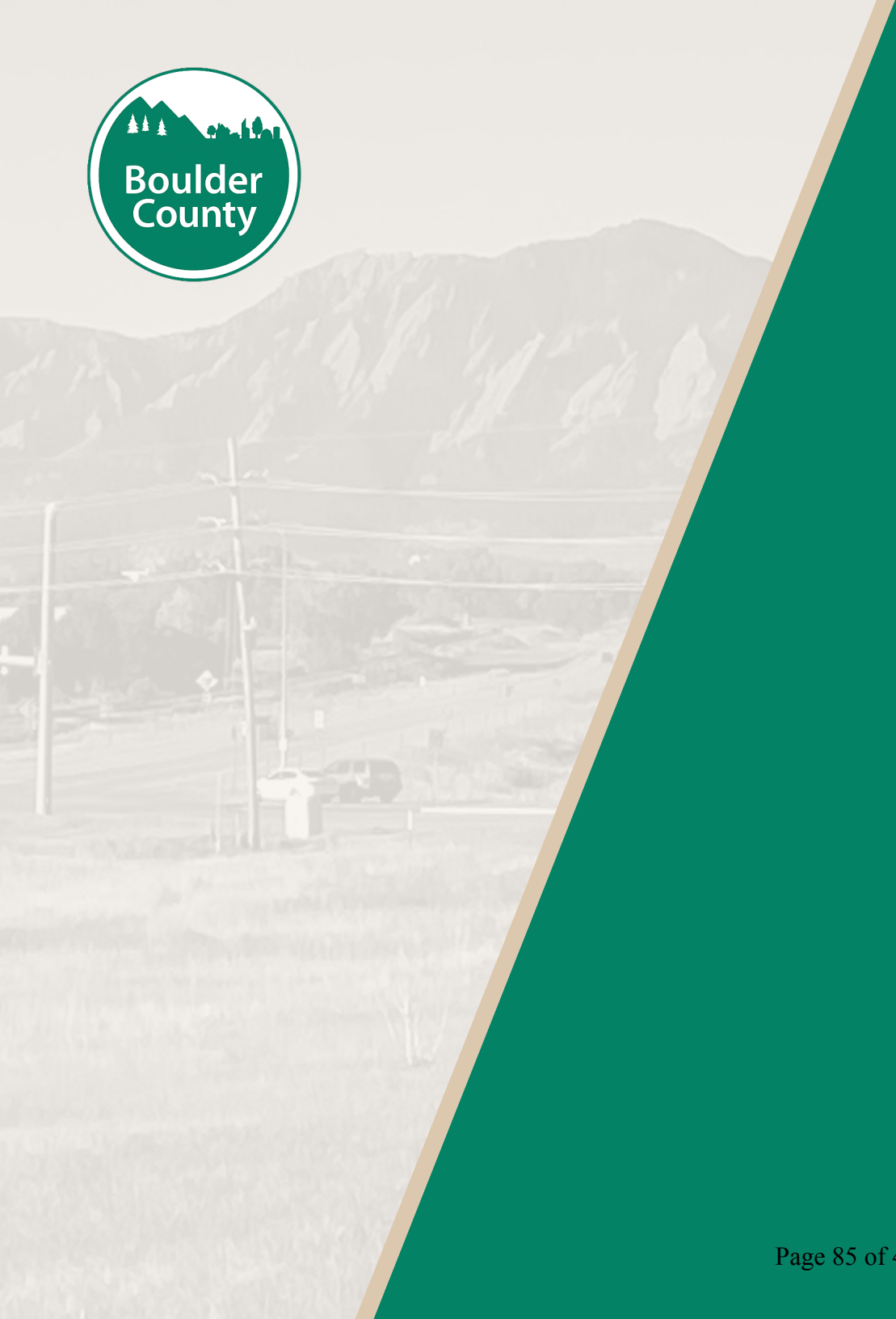
ACTION PLAN AT-A-GLANCE

Education / Communication Actions	
Safer People 1-a	Safety Data & Reporting 1-a
Safer People 1-b	Safety Data & Reporting 1-c
Safer People 1-d	Other Actions 3-a
Safer People 1-e	Other Actions 3-b
Safer People 1-f	Other Actions 5-b

Evaluation Actions	
Safety Data & Reporting 1-a	Safety Data & Reporting 1-c
Safety Data & Reporting 1-b	Safety Data & Reporting 2-a

Speed Management Actions	
Safer Roads 4-d	Safer Speeds 2-a
Safer Roads 4-e	Safer Speeds 2-b
Safer Speeds 1-a	Safer Speeds 2-c
Safer Speeds 1-b	Safer Speeds 2-d

Actions Underway as of VZAP Adoption (August 2025)	
Safer Roads 1-d	Safer People 1-d
Safer Roads 1-e	Safety Data & Reporting 1-b
Safer Roads 2-c	Safety Data & Reporting 2-a
Safer Roads 2-d	Other Actions 2-a
Safer Roads 4-a	Other Actions 3-b
Safer Speeds 1-a	Other Actions 4-a
Safer People 1-a	Other Actions 5-a
Safer People 1-c	Other Actions 5-b



CHAPTER 6

NEXT STEPS

NEXT STEPS

Next steps to implement this plan include:

- Refining and prioritizing actions and incorporating into workplans
- Continuing ongoing programs and projects that are already underway, starting on other key items identified through the refinement above
- Pursuing additional funding
- Monitoring and evaluating effectiveness
- Reporting on progress

Refining and prioritizing actions and incorporating into workplans

Refinement of actions will consider the costs and predicted effectiveness of actions, as well as staff and funding availability and ease of implementation (e.g., coordinating with other projects or programs).

Continuing ongoing programs and projects that are already underway, starting on other key items identified through the refinement above

Programs that are ongoing or already underway laid out by the BOCC include:

- ✔ Automated Speed Enforcement (Speed Safety Cameras) on CDOT highways (in accordance with BOCC Resolution 2024-060)
- ✔ Regional Corridor Planning and Construction (e.g., CO 119 Bikeway, US 287 Safety Project, US 36-N. Foothills Bikeway, CO 7 Corridor, Boulder-Erie Regional Trail (BERT))
- ✔ Other Transportation Sales Tax-Funded County Projects (e.g., 61st/Valmont, LoBo Trail connection to Jay Road, 120th Street reconstruction)
- ✔ Safe Routes to School Vision Zero Action Plan

NEXT STEPS

Pursuing additional funding

Pursuing **additional funding** will also be needed. Some of the treatments recommended in **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1** — such as installing signs — are fairly low-cost and could likely be covered through existing funding through the Transportation Sales Tax line item for Vision Zero (which averages to approximately $50,000 per year). The full set of treatments in the Fact Sheets, combined with others to be determined through the actions identified in the plan, could cost in the tens of millions and will require additional funding sources.

The county will also continue to pursue additional funding sources (see **Chapter 6: Next Steps** and **Appendix G: Funding Opportunities Summary**) to support implementation. Having this completed plan is an important first step in this process, particularly for grant requirements. A few of the potential funding sources are highlighted in this section, and the county may also explore the use of fees, additional sales taxes, and/or public-private partnerships.

Federal

The Infrastructure Investment and Jobs Act (IIJA) established the Safe Streets and Roads for All (SS4A) discretionary program with $5 billion to be spent nationwide between 2022 and 2026. The SS4A program funds initiatives through grants to prevent roadway deaths and serious injuries. Completion of this VZAP qualifies Boulder County to apply for SS4A Implementation Grants to implement Projects and Strategies identified in the VZAP. The IIJA also created the Rural and Tribal Assistance Pilot Program, which provides funding to help rural communities advance infrastructure projects that enhance the safety, efficiency, and quality of the transportation system.

Example Action(s) that may be funded through SS4A or the Rural and Tribal Assistance Pilot Program:

- **SR1-a.** Implement improvements from HIN Fact Sheet Recommendations (see **Appendix D: High-Injury Network (HIN) Fact Sheets and Project Recommendations - Group 1**).
- **SR1-b.** Analyze and develop recommendations for remaining HIN segments and intersections.
- **SR1-f.** Implement already planned, ongoing, or upcoming county safety projects – particularly those in rural areas.
- **SR2-d.** Continue working with CDOT, DRCOG, and municipalities on key regional safety corridors to develop and implement recommendations from current and future studies.
- **SR3-a.** Complete safety analysis, identify recommendations, and implement improvements at county locations that are on the Bike/Pedestrian HIN.
- **SR5-f.** Implement safety improvements for culverts that don't meet clear zone requirements.

State

The Colorado Highway Safety Improvement Program (HSIP) is a federal initiative administered by CDOT aimed at reducing traffic fatalities and serious injuries on public roads. It provides funding to states for safety improvement projects that are data-driven and focus on reducing crashes. The program emphasizes identifying high-risk locations and implementing cost-effective measures to enhance roadway safety for all users.

Example Action(s) that may be funded through the HSIP:

- **SR5-a.** Add reflective traffic signal backplates at signalized intersections.
- **SR5-e.** Identify intersections and pedestrian/bicycle crossings with no roadway lighting and install intersection lighting.

Regional

DRCOG, Denver region's Metropolitan Planning Organization (MPO), distributes federal transportation funding through a Transportation Improvement Program (TIP), which identifies all current federally funded transportation projects to be completed in the Denver region over a four-year period. The local governments that comprise DRCOG decide on a process and criteria for including projects in the TIP and awarding DRCOG-controlled federal funds, which allows the region to set and agree upon its transportation priorities. The CO 119 Bikeway is partially funded through the TIP. DRCOG also has specific "Set-Aside" Programs for the TIP; the Regional Transportation Operations and Technology Program could be a good source of funding for Action Items from this plan

Example Action(s) that may be funded through the DRCOG TIP:

- **SR4-a.** Develop signal operation guidelines addressing left-turn operations, Leading Pedestrian/Bike Intervals, No Right Turn on Reds at signalized intersections.
- **SR4-b.** Develop pedestrian crossing treatment installation guidelines to guide where to install marked crossings and pedestrian signals.
- **SR5-h.** Analyze, develop recommendations, and implement improvements that address the top crash types, using **Appendix F: Countermeasure Toolkit**.

Example Action(s) that may be funded through the DRCOG TIP (cont.):

- **SS1-a.** Work with the BOCC and CDOT to implement speed safety cameras on CDOT roads.
- **SS1-b.** Analyze, develop recommendations, and implement speed safety cameras on county roads.

Local

The **Countywide Transportation Sales Tax,** passed by voters in 2001, extended by voters in 2007, and extended in perpetuity in 2022, is a countywide 0.1 percent tax (one cent on a $10 purchase) on all sales in Boulder County. Revenues fund transportation projects including transit service and programs, roadway safety and resilience, regional corridors, regional trails and commuter bikeways, and community mobility programs.

Example Action(s) that may be funded through the Sales Tax:

- **SP2-a.** Evaluate and implement recommendations for county intersections, including but not limited to red-light cameras.

A comprehensive list of potential funding sources detailing an overview of eligible programs, application timelines, and funding scopes to guide future investment in roadway safety is included in **Appendix G: Funding Opportunities Summary**. By proactively seeking funding and aligning projects with available financial resources, the county can accelerate the implementation of high-impact safety improvements that move Boulder County toward its Vision Zero goals.

Monitoring and evaluating effectiveness

Monitoring and evaluating the effectiveness of the Boulder County VZAP is essential to ensuring progress toward a safer transportation system. The county will track the following metrics to evaluate progress towards eliminating traffic-related fatalities, serious injuries, and the top five crash types that result in serious injury and fatalities. These metrics focus on the people impacted, not just the number of crashes.

- Fatalities
- Serious injuries
- Bicyclist and pedestrian fatalities
- Fatalities and serious injuries in intersection-related crashes
- Fatalities and serious injuries in non-intersection-related crashes

Reporting on progress

In addition, the county will **track and report** on the total number of crashes, as well as progress on the implementation of the plan and the effectiveness of Actions. This evaluation will support the county in continuing to make data-driven decisions and adjust strategies as needed to achieve Vision Zero goals.

Collaboration is key to achieving Vision Zero.

Boulder County will continue to work alongside regional partners, including CDOT, DRCOG, and the municipalities within Boulder County to coordinate safety efforts across jurisdictions.

APPENDICES

APPENDIX A: COMMUNITY OUTREACH SUMMARIES

APPENDIX B: SAFETY ANALYSIS TECHNICAL MEMORANDUM

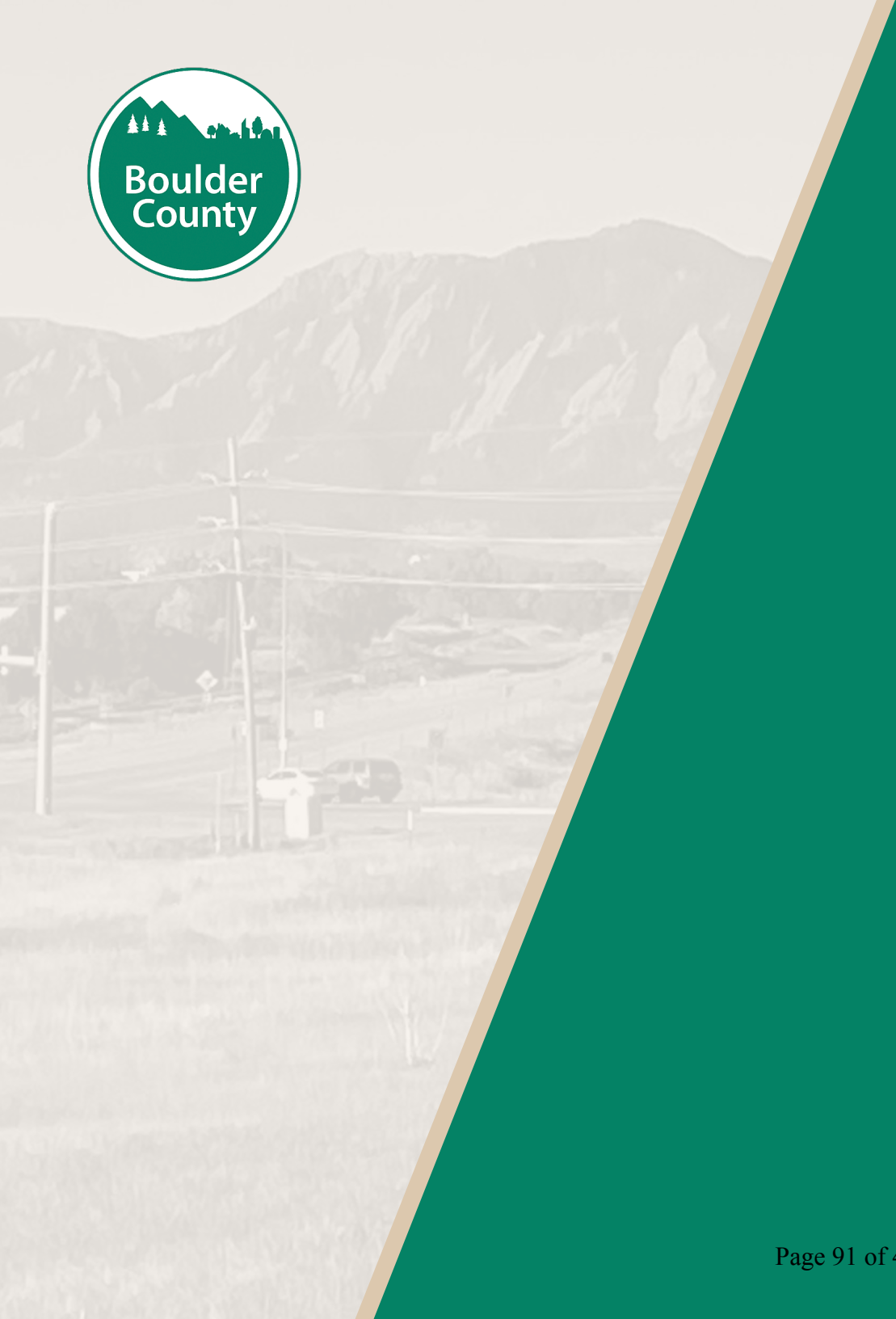
APPENDIX C: HIGH-INJURY NETWORK (HIN) SCORING MEMORANDUM

APPENDIX D: HIGH-INJURY NETWORK (HIN) FACT SHEETS AND PROJECT RECOMMENDATIONS - GROUP 1

APPENDIX E: SYSTEMWIDE SAFETY ANALYSIS MEMORANDUM

APPENDIX F: COUNTERMEASURE TOOLKIT

APPENDIX G: FUNDING OPPORTUNITIES SUMMARY



APPENDIX A

COMMUNITY OUTREACH SUMMARIES

Vision Zero Action Plan
Phase 1 Engagement Summary

September 27, 2024

Contents

Introduction 2
Project Outreach Set-up & Promotion Information 2
Website 2
Flyer 3
Business Cards 3
Boulder County Press Release 3
Social Media 3
Newsletter 3
Partners in Promotion 3
Stakeholder Engagement 4
Steering Committee Meeting #1 4
Targeted Community Engagement 4
Boulder County Targeted Events 4
Online Survey & Map 6
Survey Results 6
Unincorporated Boulder County and Participating Mountain Towns 6
Map 11
Unincorporated Boulder County and Participating Mountain Towns 11
Next Steps 14
Appendices 15

Introduction

Recognizing the importance of implementing a regional approach to road safety, Boulder County, Lafayette, and Superior (the Partners) joined forces to apply for 2023 Safe Streets and Roads for All (SS4A) grant funding. The Partners were awarded SS4A grant funding, which enables each Partner to develop a Vision Zero Action Plan (VZAP), which will be a detailed analysis of traffic crashes and risk factors in the county and specific recommendations to comprehensively improve transportation safety in the coming years. The Vision Zero Action Plans will be developed using community engagement to supplement the data driven safety analysis completed for the project. Two phases of community outreach are planned each Action Plan in the form of public meetings and pop-up events: Phase 1 serves as a listening session to learn from the public about traffic safety attitudes and location-specific feedback; and Phase 2 informs the public by presenting draft content from the Vision Zero Action Plan, including high-priority recommendations and ask for feedback on the draft report.

In summer 2024, the project team implemented Phase 1 of outreach. During this phase, the community was asked to share their traffic safety concerns when traveling in unincorporated Boulder County, Lafayette, and Superior. The community and stakeholder engagement efforts included a blend in-person, virtual, and digital engagement strategies which leveraged region-wide events, as well as events targeted specifically to each Partner. It also included an online survey and map which allowed the community to provide both general and location-specific feedback. The community feedback collected in Phase 1, in addition to the safety data analysis, will be used to prioritize Vision Zero projects and specific actions the Partners can implement to improve traffic safety in the region.

Project Outreach Set-up & Promotion Information

Understanding that outreach and communication with the community is a top priority for the Partners, the project team created a variety of content to promote and encourage participation in the engagement efforts for this project. Diversifying the outreach platforms allows the Partners to reach a wider array of community members for more comprehensive engagement. Promotional materials can be found in Appendix A.

Website

The project team worked closely with the Partners to develop a Vision Zero Action Plan project website hosted on Boulder County's webpage. The website contains static information including project overview, project schedule, safety progress to-date in each of the jurisdictions, an opportunity to sign up for project updates, FAQs, and program contact information. It also includes information that is updated regularly including public engagement opportunities, upcoming public meetings, and past public meeting recordings and presentations. The Partners promoted the project website with their constituents, and the project team included the website address and QR code on all promotional and engagement materials.

The website can be accessed by QR code, by the abbreviated weblink, or by the full weblink:

QR Code:

Abbreviated weblink: https://boco.org/visionzeroactionplan

Full weblink: https://bouldercounty.gov/transportation/multimodal/vision-zero-action-plan/

Flyer

The project team created a call-to-action flyer in both English and Spanish to promote public involvement in Phase 1 of outreach for the Vision Zero Action Plan. The flyer included information about project background, promoted the transportation survey, and provided both a QR code and abbreviated weblink to access the project website. The flyer was distributed to stakeholders to post in public locations around their jurisdictions.

Business Cards

The project team created business cards in both English and Spanish to promote public involvement in Phase 1 of outreach for the Vision Zero Action Plan. The business card encouraged community members to take the transportation survey and provided both a QR code and abbreviated weblink to access the project website. The business cards were distributed at project pop-up events to encourage community members to provide more detailed feedback.

Boulder County Press Release

Boulder County launched a Press Release on July 18, 2024 to provide project information and schedule and promote opportunities for in-person, virtual, and digital engagement. The link to the press release can be found here.

Social Media

The project team assembled a social media calendar for each of the Partners to promote attendance at Phase 1 outreach events and encourage online survey completion. The project team worked with the communications teams at Boulder County, Lafayette, and Superior to push content out through their social media channels. Each social media calendar included text content, images, and platforms for distribution (Twitter [X], Facebook, Instagram, Nextdoor, LinkedIn) for each post.

Newsletter

The project team drafted a newsletter to be distributed to residents explaining the Vision Zero Action Plan project and how residents can get involved and provide feedback. The newsletter content was distributed in Lafayette through their August water bill and through Superiors monthly Town newsletters. Additionally, the team also created e-mail distribution sign-ups for project updates that were available on the project website. Newsletter updates were pushed out to Boulder County, Lafayette, and Superior e-mail distribution lists.

Partners in Promotion

The team supplemented the promotion strategies described above by partnering with several agencies in the region. Promotional content was provided to the following partners who pushed out content through their social media and e-mail distribution channels: Boulder Chamber, Commuting Solutions, and Community Cycles.

Stakeholder Engagement

A Steering Committee was formed to help foster and shape the development of the Vision Zero Action Plan. The Steering Committee consists of members from Boulder County, Lafayette, Superior, Nederland, Colorado Department of Transportation (CDOT), and advocacy agencies. Throughout the project duration, the team will facilitate four meetings with the Steering Committee and smaller group, targeted meetings as needed.

Steering Committee Meeting #1

On June 26, 2024, the project team hosted a virtual meeting with members of the Steering Committee including representatives from Boulder County, Lafayette, Superior, Nederland, Colorado Department of Transportation (CDOT), and advocacy agencies. The team shared information about the project scope, background, and schedule, then facilitated an interactive activity including a discussion around "What would a successful Vision Zero Action Plan look like to you?" and "What are your ideas for roadway safety in Boulder County?". Input from the Steering Committee will be used in development of the Vision Zero Action Plans and will help shape the vision and goals that will be outlined in the Plans. The Steering Committee Meeting presentation and meeting notes are displayed in Appendix B.

Targeted Community Engagement

Community engagement events was facilitated to target each Partner agency and strategies included in-person events, virtual events, and digital opportunities to achieve equitable participation. Community engagement materials can be found in Appendix C.

Boulder County Targeted Events

Pop-Up Event – Nederland Farmers Market

The Boulder County pop-up event occurred on July 21st, 2024 from 9am-1pm at the Nederland Farmers Market. Figure 1 displays photos from the pop-up event. The event was advertised via social media posts from stakeholders and Partners. At the event, the project team set up English and Spanish boards with project background information, project timeline, and a summary of crash analysis statistics in unincorporated Boulder County. The project team also set up several large maps in English and Spanish that prompted the public to place stickers where they feel unsafe walking, biking, driving, or using a mobility device, or where they have other transportation-related concerns in unincorporated Boulder County. There were five total maps: one for unincorporated Boulder County; and one blown-up map each of Nederland, Niwot and Gunbarrel, Jamestown, and Ward. Post-it notes and pens were also provided for the public to leave more detailed comments on the maps. Comments that were collected on the map were digitized onto the online Social Pinpoint map.

Figure 1. Nederland Farmers Market Pop-up Event

Pop-Up Event – Ride for Magnus

The Ride of Magnus event was held on August 11, 2024. Representatives from Boulder County staff attended the events to discuss and promote the project with the public and learn more about traffic safety concerns in Boulder County from community members. Key themes from this event included the following:

1. Dillon/US 287/NW Pkwy near Medtronic—debris in road/shoulder
2. Access to Morgul-Bismark Trail—CO 170 to CO 93—gravel debris in shoulder/bike lane
3. CO 170 between Cherryvale and 66th
    - Bike access to trailhead (Marshall Valley trail access) for high school biking teams
    - Speeds are too high and need crosswalk where trail intersects with CO 170
4. CO 66 between US 36 and ¼ mi west—missing bike lane = gap going into Lyons
5. Nelson Road between US 36 and 75th—narrow shoulders makes it worrisome to ride in this area

Public Meeting

A virtual public meeting for unincorporated Boulder County occurred on August 8th from 6-7:30PM. The meeting was hosted via Zoom. The first section of the meeting was in a presentation format which included a summary of the project background and schedule, crash history in Unincorporated Boulder County, and promoted an online transportation safety survey. In the second section of the meeting, the public was encouraged to participate in a transportation safety discussion, prompted by a slide of discussion questions. Participants then had the opportunity to voice additional questions and comments not previously covered. The public meeting wrapped up with next steps, opportunities to visit the project website and take the survey and project contact information. The presentation and recorded meeting were uploaded onto the project website for public access. Spanish language translation was offered via transcript on the recording posted to the project website.

Online Survey & Map

An online survey and map were shared with the public on a combined platform. It was hosted by Consor on the public engagement tool, Social Pinpoint. The online survey and map were open from June 26, 2024 through August 31st, 2024. **Figure 4** displays a screenshot from the survey and map hosted on Social Pinpoint.

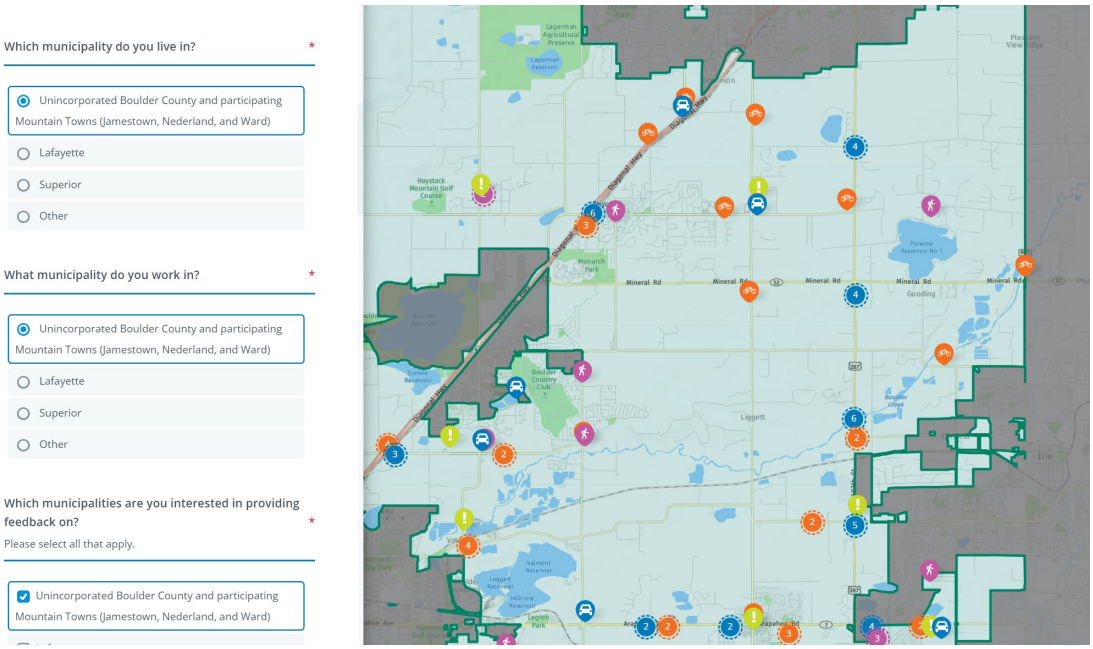


Figure 2. Example of the Survey and Map Hosted on Social Pinpoint

Survey Results

The survey asked respondents which municipalities they live in, work in, and for which they wanted to provide feedback. Depending on which municipalities the respondents chose to provide feedback on, they were led through a series of questions for each municipality indicating their primary mode of transportation, their secondary modes of transportation, and how safe they felt traveling in that municipality using each mode. Respondents were able to take the survey for multiple municipalities. The survey then asked respondents whether they or someone they knew had been involved in a traffic crash within the past five years; if so, in which municipality; and if they would be willing to share details about the crash with project staff. The survey then offered an opportunity for open-ended responses regarding transportation safety concerns. Lastly, there were two demographics questions regarding the gender identity and race/ethnicity of respondents.

Upon the survey closing on August 31st, there were 564 total survey responses. Responses have been broken out and analyzed by jurisdiction below.

Unincorporated Boulder County and Participating Mountain Towns

There were 196 survey responses for Unincorporated Boulder County and the participating mountain towns (referred to as Boulder County).

Figure 5 summarizes the responses for the question "Where do you live?" for the Boulder County survey. The majority of respondents (62%) live in Unincorporated Boulder County, while 11% live in Lafayette and 11% live in the City of Boulder.

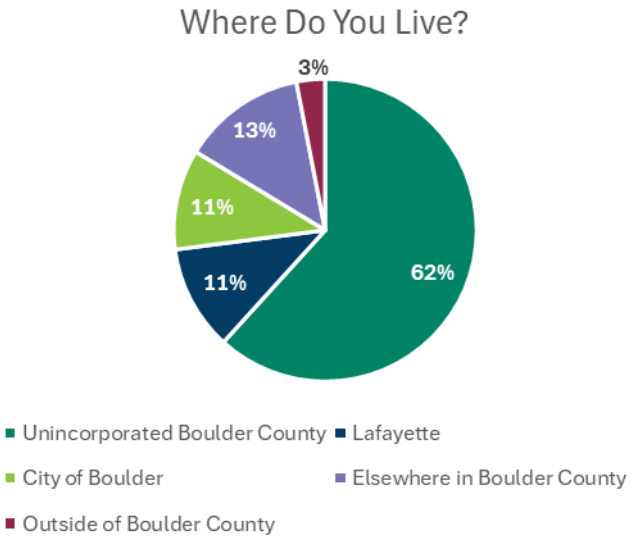


Figure 3. "Where Do You Live?" Results from Boulder County Survey

Of the 13% of respondents living elsewhere in Boulder County, the locational breakdown is as follows:

- 5% live in Longmont
- 3% live in Erie
- 3% live in Lyons
- 2% live in Louisville
- 1% live in Superior

Of the 3% of respondents living outside of Boulder County, the locational breakdown is as follows:

- 1% live in Broomfield County
- 0.5% live in Westminster
- 0.5% live in Weld County
- 0.5% live in Mead
- 0.5% live "Outside of the County"

Figure 6 summarizes the responses for the question "Where do you work?" for the Boulder County survey. The results reveal that 44% of respondents work in Unincorporated Boulder County. Additionally, 19% of respondents work in the City of Boulder, while 14% work elsewhere in Boulder County and 11% work in other counties. Notably, 10% of respondents are retired or do not work. 3% of respondents reported working remotely.

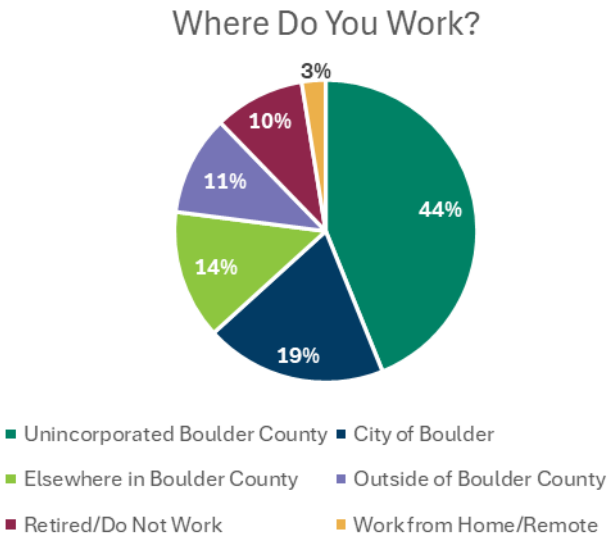


Figure 4. "Where Do You Work?" Results from Boulder County Survey

Of the 14% of respondents who work elsewhere in Boulder County, the locational breakdown is as follows:

- 4.5% work in Lafayette
- 4% work in Longmont
- 1.5% work in Lyons
- 1.5% work in Superior
- 1.5% work in Louisville
- 1% work in Niwot

Of the 11% of respondents who work in other counties, the locational breakdown is as follows:

- 4% work in Broomfield
- 2% work in Denver
- 1.5% work in Thornton
- 1% work in Golden
- 1% work in Westminster
- 0.5% work in Aurora
- 0.5% work in Wheat Ridge
- 0.5% work in Weld County

Figure 7 summarizes all the travel modes respondents use in Boulder County. Driving is the most common mode of transportation in Boulder County, with almost all respondents (183) reporting that they drive either as their primary or secondary mode of travel.

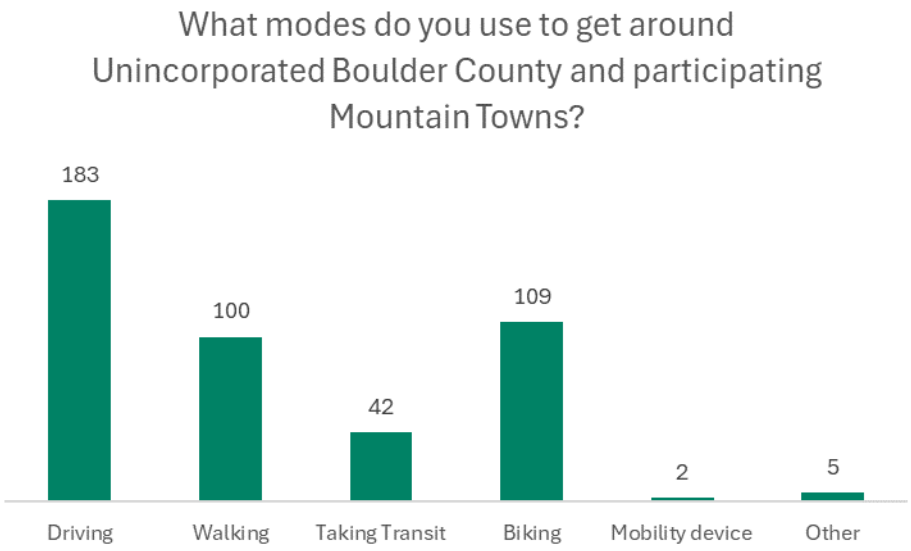


Figure 5. Travel Modes Used to Get Around Boulder County

Respondents were asked to rate their comfort level using each travel mode in Boulder County. They were prompted using a five-point scale of Very Unsafe, Somewhat Unsafe, Neutral, Somewhat Safe, Very Safe, with a sixth option to respond with "I Don't Use This Mode". For reporting purposes, the project team grouped together the two unsafe response options as "Unsafe" and the two safe response options as "Safe." Figure 8 illustrates the respondents' comfort levels across each mode, not including those who do not use the mode. The responses reveal that 99% of drive; 86% walk; 74% bike; 45% use transit; and 8% use a mobility device as either a primary or secondary travel mode. Of the travel modes, respondents feel safest driving (43%) and feel the least safe biking (56%).

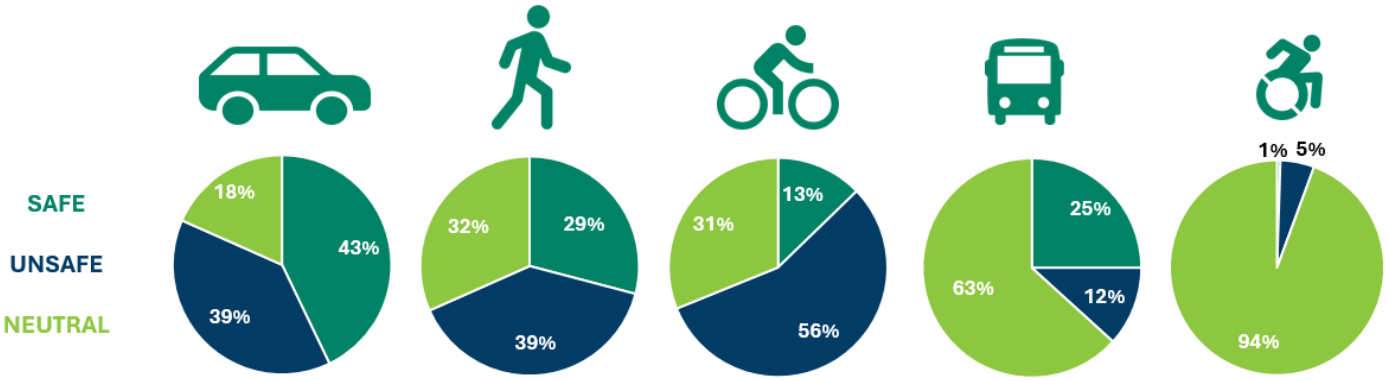


Figure 6. "How safe do you feel traveling in Unincorporated Boulder County and participating mountain towns using the following modes to get around?" Results from Boulder County Survey

Respondents were then asked about their personal experiences with traffic crashes. 59% of respondents reported that they or someone they know have been involved in a traffic crash within the past 5 years. The breakdown of this percentage by jurisdiction is as follows:

- 31% in Unincorporated Boulder County
- 21% in a different municipality
- 6% in Lafayette
- 2% in Superior

Lastly, respondents were given the opportunity to share any additional safety-related traffic concerns through an open-ended survey question. There were 114 unique survey responses. The responses were sorted by major theme: Driving Concern, Biking Concern, Walking Concern, and Other Safety-Related Concern. The breakdown is as follows:

- 88 Driving Concern comments
- 13 Biking Concern comments
- 7 Walking Concern comments
- 3 Other Safety-Related comments
- 3 Not Safety-Related comments

A few locations were cited numerous times for safety concerns:

- US-287 corridor, specifically the intersections of Oxford Road and Isabelle Road
- CO-119 corridor, specifically the Niwot Road intersection
- US-36 corridor

The main themes discussed in the open-ended survey responses are:

Lack of Infrastructure for Cyclists and Pedestrians:

- Many respondents mention the lack of separated spaces for biking on major county roads, such as Highway 170 and US-287 making it feel unsafe to use these modes. Some note the need for wider shoulders on highways and county roads to support safer biking.
- Specific intersections, like SH-66 and US-36, are noted as dangerous for bikers, with shared lanes that feel unsafe due to high-speed traffic.

Speeding and Reckless Driving:

- Excessive speeding and aggressive driving on highways like US-287 and US-36 are major concerns. People mention these roads feel like "speedways" with little traffic enforcement.
- Some respondents describe fatal crashes they've witnessed or heard about, particularly on US-287 and CO-119.
- Suggestions include lower speed limits, increased traffic enforcement, and speed cameras to address these behaviors.

Dangerous Intersections:

- Many intersections are mentioned as unsafe, such as the Oxford Street and US-287 intersection, which respondents feel lacks proper traffic controls.
- Other intersections, like US-287 and Arapahoe Road or CO-119 and Niwot Road, are noted for high crash rates, with request for better traffic signal timing and longer intervals between red and green lights.

E-Bike and Motorcycle Regulation:

- There are concerns about the safety of e-bikes, with respondents suggesting that they be regulated or even prohibited from bike paths due to the inexperience of riders and their high speeds.
- Motorcycles are also mentioned as being unsafe, particularly because of speeding and loud noise.

Traffic Law Enforcement:

- Many respondents expressed frustration with the lack of enforcement of traffic laws, especially concerning red light running, speeding, and distracted driving.
- There are repeated requests for more law enforcement presence on major roads and highways to curb dangerous driving behaviors.

Specific Roadway Hazards:

- Roads like Dillon Road and Boulder Canyon are noted as feeling increasingly unsafe due to higher speeds and road conditions.
- Several respondents mention that the improvements made to certain roads, like the Dillon Road expansion, have actually made them feel more unsafe.

Vision Zero and Safety Measures:

- Some respondents support initiatives like Vision Zero but feel that more focus is needed on practical safety measures, such as keeping bike lanes clear and enforcing speed limits.
- Several suggestions for safety improvements include the installation of red-light cameras, better traffic signal timing, and educational campaigns to improve road user behavior.

Overall, the feedback reflects widespread concerns about speeding, perceived unsafe intersections, and the lack of infrastructure for safe walking and biking, with many respondents calling for increased traffic enforcement and road safety improvements.

Map

The map survey tool allowed participants to leave location-specific input indicating where within the study area they felt unsafe walking, driving, biking, or using a mobility device, or share any other transportation-related concern. Participants left a total of 828 map comments. Comments were broken out by jurisdiction; major themes and locations are discussed below.

Unincorporated Boulder County and Participating Mountain Towns

Participants left 309 comments in the Boulder County study area. The breakdown of comments by type of concern is as follows:

- 134 Unsafe Driving
- 34 Unsafe Walking
- 109 Unsafe Biking
- 1 Unsafe Using Mobility Device
- 31 Other Concern

Figure 19 shows respondents' comments by location, color-coded by type of concern.

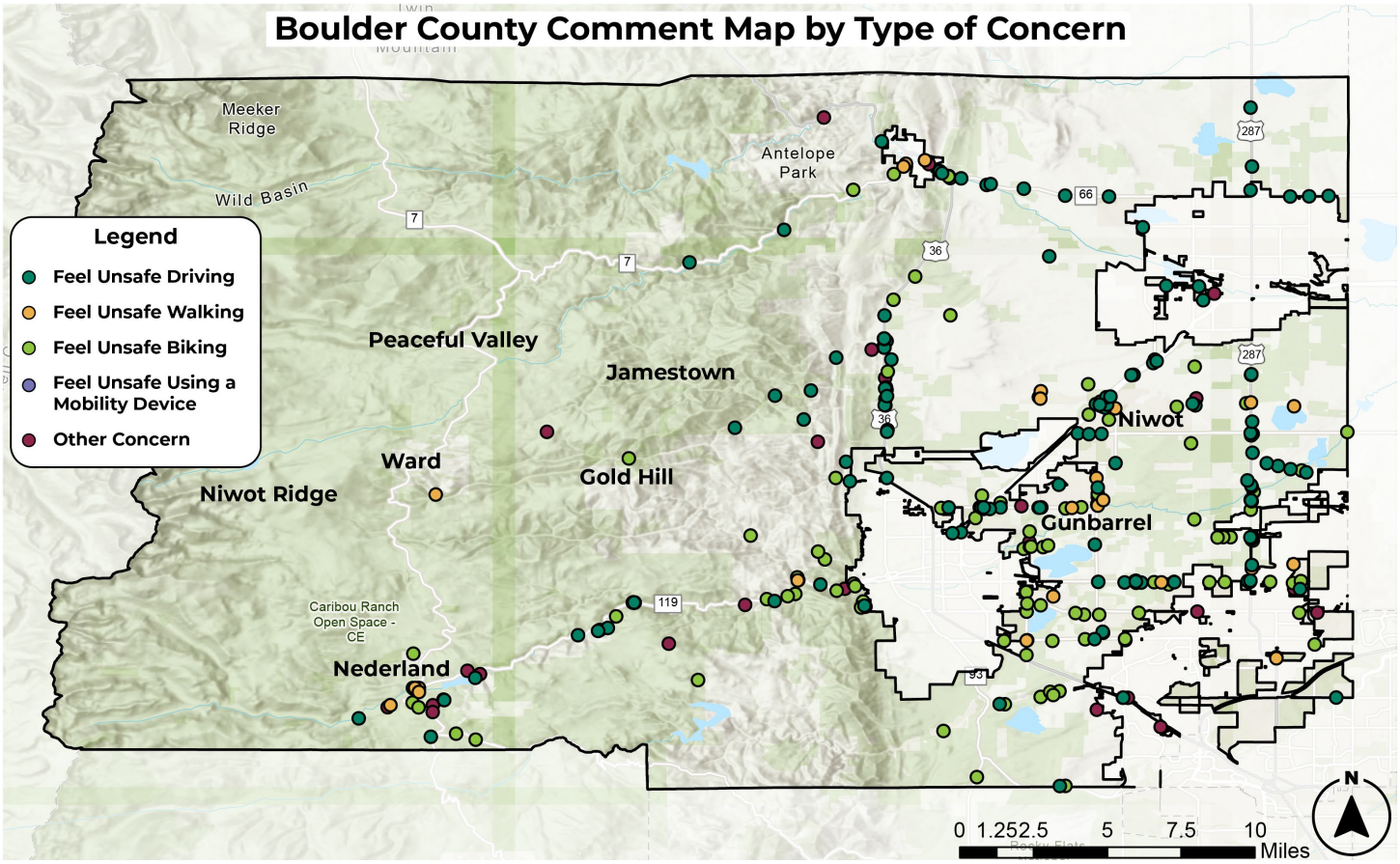


Figure 7. Boulder County Comment Map by Type of Concern

Corridors with a high number of comments include:

- CO-119 (west of Boulder)
  - High vehicle speeds
  - The combination of road geometry and tourist/natural attractions causes unsafe conditions for pedestrians, bicyclists, and drivers
  - In some areas, it is challenging for drivers and bicyclists to share the road due to road width
- CO-119 (east of Boulder)
  - High speeds and traffic volumes
  - Some intersection-specific concerns (CO-119 and Airport Road, CO-119 and Jay Road)
- US-36
  - Turn lanes and acceleration lanes are being used as passing lanes along the corridor (especially by Middlefork)
  - US-36 and Neva Road – unsafe intersection for turning movements
- US-287
  - Many unsafe intersections that along US-287
  - High vehicle speeds, many crashes witnessed along the corridor
- Jay Road
  - Red-light running and fast speeds at Jay Road & CO-119
  - Lacking pedestrian and bicycle infrastructure on Jay Road between 63rd Avenue and 75th Avenue
- Arapahoe Road

    - Feels unsafe for bicyclists due to inadequate infrastructure; there is a desire for a parallel east-west facility
    - Some inaccessible RTD stops and other issues accessing amenities
    - High speeds, high volumes, and red light-running
- CO-170
    - Inadequate bicycle infrastructure/bicyclists feel unsafe biking here

Areas with a high number of comments include:

- Kenosha Road/Lookout Road between US-287 and 119th Street
    - High vehicle speeds
- 75th Street between South Boulder Road and Lookout Road
    - High vehicle speeds
    - Red-light running and lack of yielding to pedestrians
    - Concerns about high speeds in the school zone
- SH-66 approaching Lyons
    - Desire to increase the distance of the speed ramp-down entering Lyons
- Lefthand Canyon and Fourmile Canyon
    - Some vehicle and bicycle conflict—many bicyclists do not adhere to the "single file" signage--and some narrow areas make it uncomfortable to share the road
- Town of Nederland
    - Inadequate pedestrian infrastructure—some calls to improve pedestrian access to schools
    - Some areas where road infrastructure is considered—missing shoulders, no curb/gutter/guardrail in areas, washed out roads, lacking signage

Figure 20 is a word cloud generated from the top 100 words mentioned in the Boulder County area map comments. The larger the word, the more frequently it appeared in the comments.

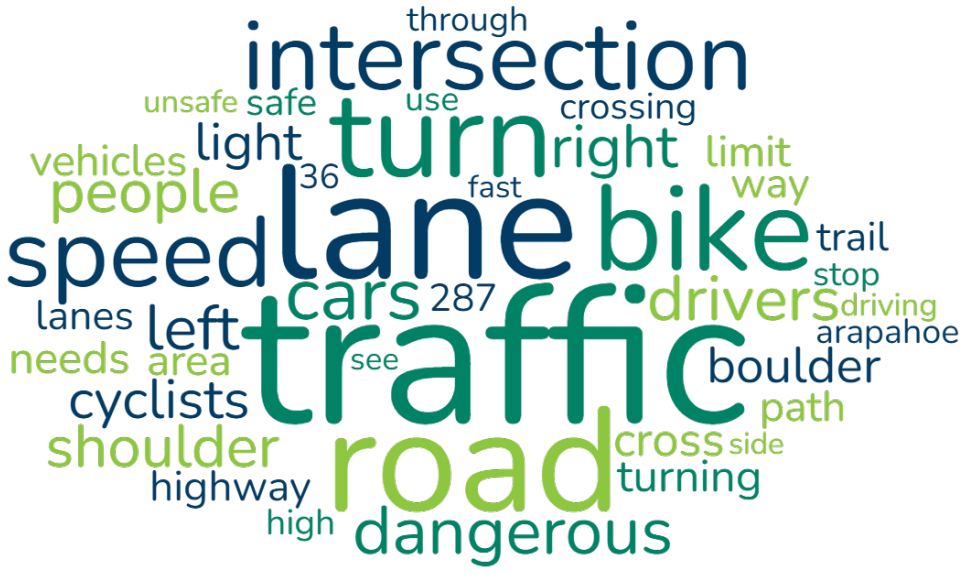


Figure 8. Word Cloud Generated from Boulder County Map Comments

Next Steps

Phase 1 outreach for the Boulder County, Lafayette, & Superior Vision Zero Action Plans project solicited feedback from project stakeholders as well as over 1,000 in-person and virtual comments and survey responses from people who live, work, and travel through Boulder County. This feedback is invaluable for understanding qualitative and quantitative transportation concerns in the project area beyond the crash data. The project team will use the Phase 1 outreach results to inform the next stage of the project in which safety projects are developed and prioritized in each jurisdiction. Phase 2 outreach will occur late 2024/early 2025.

Appendices

Appendix A: Promotional Materials

Appendix B: Steering Committee Meeting Materials

Appendix C: Pop-up and Public Meeting Materials

Appendix A.
Promotional Materials

Boulder County, Lafayette, and Superior
VISION ZERO ACTION PLANS

Help Us Work Toward Zero Traffic Deaths

Thanks to a Safe Streets and Roads for All (SS4A) grant, Boulder County, Lafayette, and Superior have received funding to develop **Vision Zero Action Plans (VZAPs)** to comprehensively improve transportation safety. Each plan will be a detailed analysis of traffic crashes and risk factors with specific recommendations to implement in the coming years.

We are looking for input from the community on transportation safety.

Learn more and take our transportation safety survey by **August 31**!

Scan here or visit
boco.org/visionzeroactionplan

Boulder County, Lafayette y Superior
PLANES DE ACCIÓN DE *VISION ZERO*

Ayúdenos a lograr cero muertes por accidentes de tránsito

Gracias a una subvención de Calles y Carreteras Seguras para Todos (SS4A por sus siglas en inglés), el condado de Boulder, Lafayette y Superior han recibido fondos para desarrollar **Planes de Acción de *Vision Zero* (VZAPs por sus siglas en inglés)** para mejorar integralmente la seguridad del transporte. Cada plan será un análisis detallado de los accidentes de tráfico y los factores de riesgo con recomendaciones específicas a implementar en los próximos años.

Estamos buscando opiniones de la comunidad sobre la seguridad del transporte.

¡Aprenda más sobre el proyecto y responda a nuestra encuesta de seguridad en el transporte hasta el **31 de agosto!**

Escanea aquí o visite
boco.org/visionzeroactionplan

Boulder County, Lafayette, and Superior
VISION ZERO ACTION PLANS

Boulder County

City of Lafayette

Town of Superior
Gateway to Boulder Valley

Learn more and take our transportation safety survey by **August 31**!

Scan here or visit
boco.org/visionzeroactionplan

Boulder County, Lafayette, y Superior
PLANES DE ACCIÓN DE *VISION ZERO*

Boulder County

City of Lafayette

Town of Superior
Gateway to Boulder Valley®

¡Aprenda más sobre el proyecto y responda a nuestra encuesta de seguridad en el transporte hasta el **31 de agosto!**

Escanea aquí o visite
boco.org/visionzeroactionplan

July 18, 2024

Boulder County Launches a Vision Zero Action Plan to Advance Transportation Safety

Boulder County Has Partnered With Lafayette and Superior to Eliminate Traffic Crashes That Result Serious Injury or Death

Key Points

- Boulder County is developing a Vision Zero Action Plan (VZAP) to improve safety at locations where a high number of severe crashes are currently occurring and to proactively reduc risk at other key locations.
- The Vision Zero project team is seeking input from community members on transportation safety concerns through an online survey, community events, and online public meetinç
- Learn more and sign up for updates at boco.org/visionzeroactionplan or contact the project team by email at visionzero@bouldercounty.gov.

Boulder County, Colo. – Boulder County has partnered with Lafayette and Superior to develop Vision Zero Action Plans to improve transportation safety throughout Boulder County. Visi is a strategy and commitment to eliminate all serious injury and fatal traffic crashes.

Funded through a federal Safe Streets and Roads for All (SS4A) grant that Boulder County, Lafayette, and Superior were jointly awarded in 2023, the project team is undertaking a detaile analysis of traffic crashes and risk factors and developing specific recommendations to improve transportation safety in the coming years. Three Vision Zero Action Plans will be develope through this effort. The Boulder County VZAP area will include unincorporated Boulder County as well as Jamestown, Nederland, and Ward. The VZAP effort began in April 2024 and is b by Boulder County.

In addition to determining locations with a significant history of severe crashes and those with high risk factors, the VZAP project team is engaging with residents and visitors to learn abou transportation safety concerns. Boulder County residents who are interested in transportation safety are encouraged to visit the VZAP website to learn more about the effort, provide input sign up for project updates.

Safety Survey and Upcoming Opportunities to Engage

A transportation safety survey is currently posted on the project website; responses are being collected through August 31.

The VZAP team is attending two upcoming community events. Stop by to visit with the project team to learn more and share your input:

- Nederland Farmers Market - 80 E. Second St. & 85 E. First St. (Sunday, July 21, 10 a.m. - 1 p.m.)
- Lafayette Art Night Out - S. Public Rd. between Emma and Cannon Streets (Friday, August 9, 5 p.m. - 8 p.m.)

There will also be a series of online public meetings that are open to all community members:

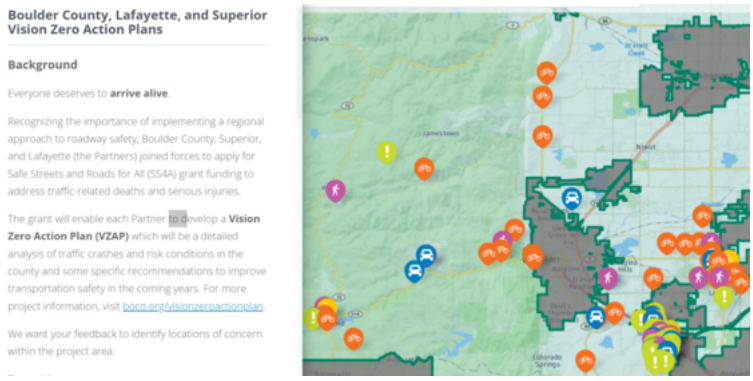
- Superior - Thursday, August 1
- Unincorporated Boulder County and mountain towns - Thursday, August 8
- Lafayette - Tuesday, August 20

The VZAP team will be providing an overview of transportation safety for each jurisdiction and listening to community member concerns. For more information about locations and times f events, please subscribe to the Vision Zero newsletter.

Project Schedule and Contact Information

The VZAP effort will culminate in three Vision Zero Action Plans (for unincorporated Boulder County, Jamestown, Nederland, and Ward; Lafayette; and Superior) and is scheduled to run t early 2025.

For more information, contact Liv Lewin, Boulder County Vision Zero Program Manager, at visionzero@bouldercounty.gov or 720-564-2292.



Boulder County wants to ensure that everyone has equal access to our programs, activities, and services. To request an Americans with Disability Act (ADA) accommodation, please ema ADA@bouldercounty.gov, or call 303-441-1386.

If you need help in another language, please email CPPfrontdesk@bouldercounty.gov or call 303-441-3930.

News Links

- News Releases
- Events Calendar
- Social Media

Appendix B.
Stakeholder Meeting #1 Materials & Notes

Boulder County, Lafayette, and Superior

VISION ZERO ACTION PLANS

Steering Committee Meeting #1

June 26, 2024

Agenda

1. Introductions
2. Project Overview & Schedule
3. Stakeholder & Community Engagement
4. Role of Steering Committee
5. Questions/Comments
6. Tour of Project Website & Survey
7. Listening Session
8. How You Can Help!

Introductions

Introductions

- Name
- Affiliation or Interest in the Vision Zero Action Plan Project
- Town/City of Residence
- Ice Breaker: What is your favorite Ice Cream Flavor?

Project Overview and Schedule

What is Vision Zero?

Vision Zero is a transportation strategy to eliminate all traffic fatalities and serious injuries for people using all modes of transportation.

Vision Zero recognizes that humans make mistakes and therefore the transportation system should be designed to minimize the consequences of human error.

Safe System Approach

TRADITIONAL APPROACH		VISION ZERO
Traffic deaths are **INEVITABLE**		Traffic deaths are **PREVENTABLE**
PERFECT human behaviour	VS	Integrate **HUMAN FAILING** in approach
Prevent **COLLISIONS**		Prevent **FATAL AND SEVERE CRASHES**
INDIVIDUAL responsibility		**SYSTEMS** approach
Saving lives is **EXPENSIVE**		Saving lives is **NOT EXPENSIVE**

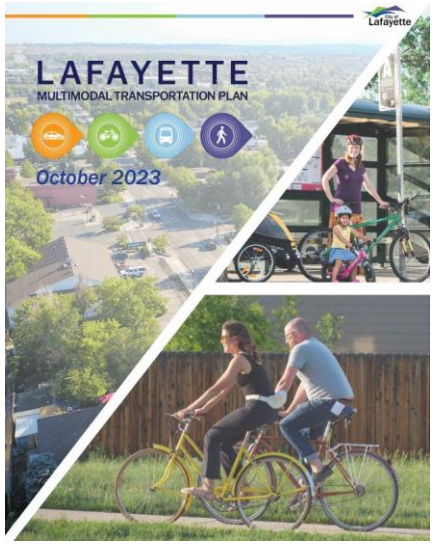
Source: Vision Zero Network

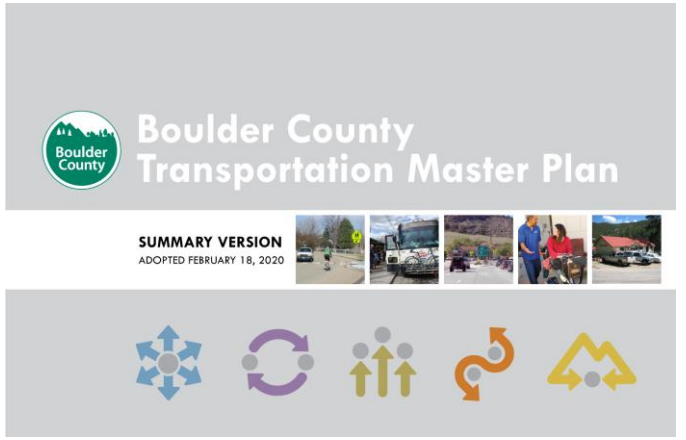
Project Overview

- Boulder County, Lafayette, and Superior (the Partners) joined forces to apply for 2023 **Safe Streets and Roads for All (SS4A)** grant funding.
- Awarded a Planning Demonstration Grant for the development of an Action Plan.

Action Plan Development

- Deliver three standalone Vision Zero Action Plans:
  1. **Boulder County** – includes unincorporated, State Highways, Jamestown, Nederland, and Ward
  2. **City of Lafayette**
  3. **Town of Superior**
- Create list of specific actions, noting responsibility and potential funding sources for implementation.





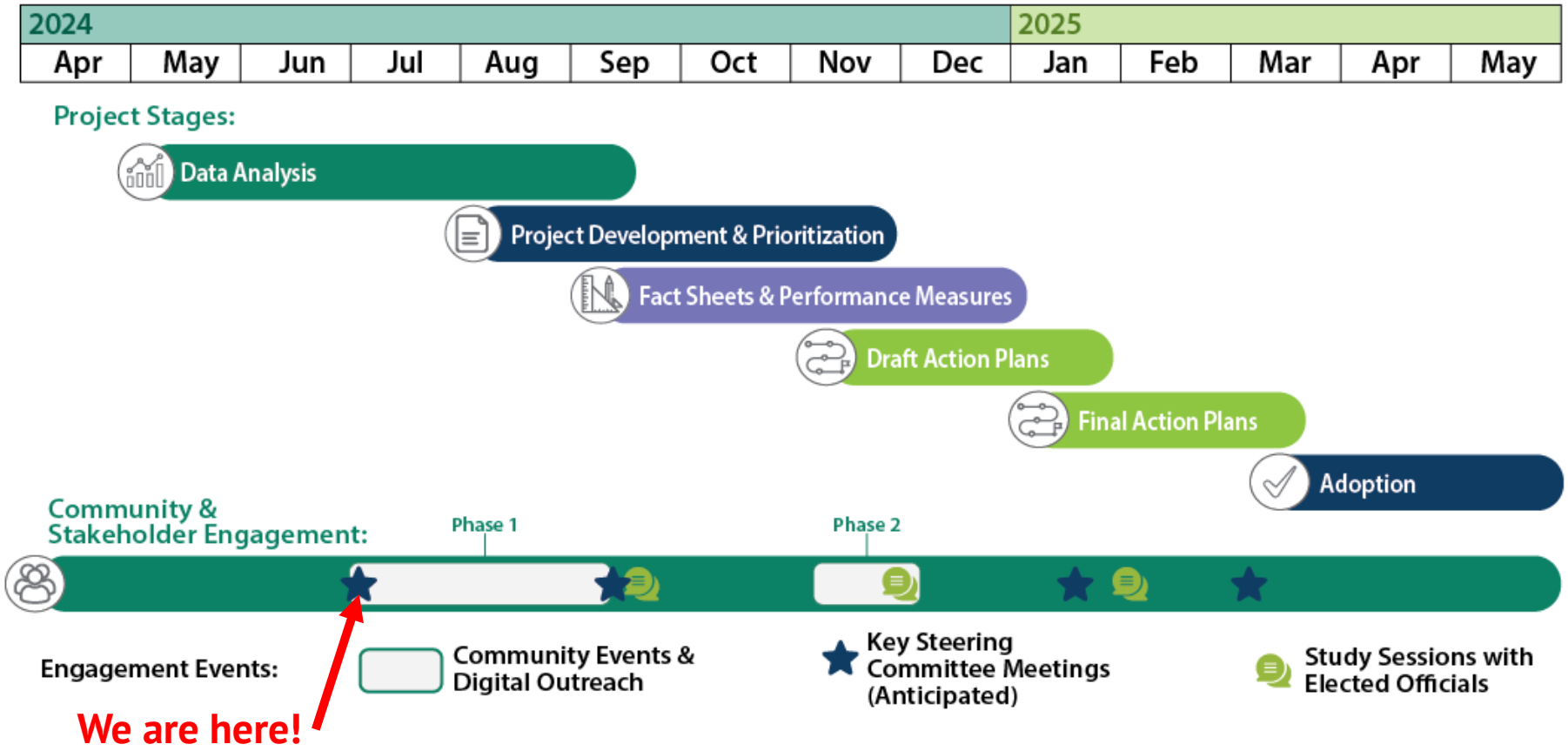
Project Process

Project Process

Project Process

Project Process

Schedule


2024
2025
Apr
May
Jun
Jul
Aug
Sep
Oct
Nov
Dec
Jan
Feb
Mar
Apr
May
Project Stages:
Data Analysis
Project Development & Prioritization
Fact Sheets & Performance Measures
Draft Action Plans
Final Action Plans
Adoption
Community & Stakeholder Engagement:
Phase 1
Phase 2
Engagement Events:
Community Events & Digital Outreach
Key Steering Committee Meetings (Anticipated)
Study Sessions with Elected Officials
We are here!

Stakeholder & Community Engagement

Engagement Process

Phase 1
July/August
We are here

Inform public about Vision Zero and listening session to learn about traffic safety concerns.

Phase 2
November/December

Share draft content for the Vision Zero Action Plan and ask for feedback on the draft recommendations.

Engagement Strategies

Stakeholder Outreach:

- Steering Committee
  - Geographic or special topic areas
  - Emergency Services
- VZ Community Partnership
- Elected Officials

Community Outreach:

- Public meetings
- Pop-up events
- Additional events
- Supplement with digital outreach

Digital Outreach:

- Website
- Social Media Blasts
- Online surveys/ interactive maps
- Project Newsletters
- Community-based organizations





Upcoming Engagement Activities (Phase 1)

Pop-up Events and Online Public Meetings

Boulder County

Unincorporated and Mountain Towns

- Nederland Farmers Market and Party in the Peaks – July 21
- Public Meeting – Aug 8

Lafayette

- Lafayette Art Night Out – Aug 9
- Public Meeting – Aug 20

Superior

- 4th of July Festivities – July 4
- Public Meeting – Aug 1

Survey/Web Map

boco.org/visionzeroactionplan

Survey Open Through August 31!

Role of Steering Committee

Steering Committee Roles & Responsibilities

Roles: To provide input on project-related issues and serve as liaisons between the project team, your organization, and members of your community.

Responsibilities:

- Provide locally-focused expertise on the project
- Share project info with your organization and community
- Support community engagement activities
- Attend Steering Committee meetings and engage in touchpoints
- Participate with open and honest input & listen with an open mind
- Commit to pursuit of collaborative decisions

Member Expectations

- Full group meetings
  1. June 26 – today!
  2. September 2024*
  3. January 2025*
  4. March 2025*

**Tentative Dates*

- Smaller group meetings or work sessions based on geography or topic area

Your participation and input is valuable for the success of developing the Vision Zero Action Plans!

Questions or Comments?

Project Website and Survey

Links for Demonstrations

boco.org/visionzeroactionplan

Listening Session

Mural Board

Go to

https://bit.ly/BOCOVZAPSC

Or scan this QR code:

How You Can Help!

How You Can Help!

Actions

- Add ideas to the Mural!
- Promote public engagement events, website, and survey
- Attend/participate
- Connect us to your organization/communities

Calendar

- **July/August:** Pop-up events and public meetings
- **August 31:** Survey closes
- **September TBD:** Full Group Steering Committee Meeting #2

Thank you!

Project Contacts

Liv Lewin, PE
Boulder County
Vision Zero Program Manager
visionzero@bouldercounty.gov

Nikki Riemer, PE, RSP$_1$
Consor Engineers
Consultant Project Manager
Nikki.riemer@consoreng.com

Project Website & Survey/Web Map

boco.org/visionzeroactionplan

Survey Open Through August 31!

Boulder County, Lafayette, & Superior Vision Zero Action Plans Steering Committee #1

June 26, 2024 | 11 am – 12:30 pm

LOCATION: Virtual (Zoom)

ATTENDEES:

Liv Lewin, Boulder County, VZAP PM		Clark Chapman, *Boulder/Nederland area resident*
Alex Hyde-Wright, Boulder County		Craig Towler, Center for People with Disabilities, *Boulder resident*
Mark Shisler, Boulder County		Denice Walker, Mobility for All Ambassador *Lafayette resident*
Alex Bullen, Superior		George Eveleth, Boulder County, Engineer *Denver resident*
Michelle Melonakis, Lafayette		John Flora, JM Flora Law Group *Superior resident*
Nikki Riemer, Consor		Joshua Davis, Town of Nederland Streets Manager, *Nederland resident*
Krystian Boreyko, Consor		Katrina Harms, Peak to Peak Housing & Human Services Alliance, Peak to Peak Scenic Byway Board member, *Nederland resident*
Jenny Godwin, Consor		Krista Nordback, Community Cycles *Boulder resident*
Alexandra Phillips, Boulder County *South Boulder resident*		Landon Hillard, Boulder County, *Boulder resident*
Alvan Bidal Sanchez, DRCOG		Matthew Muir, Coalition 4 Cyclists
Bill Crist, Boulder County Sheriff's Office		Rachel Arndt, Boulder County Public Health *Nederland resident*
Bryce Reeves, CDOT Bike/Ped Coordinator & ADA Coordinator, *Windsor resident*		Rachel Plessing, *Superior resident*
Cammie Edson, City of Longmont Vision Zero *Longmont resident*		Stephanie Walton, former Lafayette Councilperson; Lafayette Senior Advisory Committee *Lafayette resident*

MEETING NOTES:

1. **Introductions**
2. **Project Overview & Schedule**
    a. What is Vision Zero?
        1) Definition: Vision Zero is a transportation strategy to eliminate all traffic fatalities and serious injuries for people using all modes of transportation. Vision Zero recognizes that humans make mistakes and therefore the transportation system should be designed to minimize the consequences of human error.
    b. Safe System Approach
        1) Principles of Safe Systems:
            a. Deaths and Serious Injuries are Unacceptable
            b. Humans Make Mistakes
            c. Humans are Vulnerable
            d. Responsibility is Shared
            e. Safety is Proactive
            f. Redundancy is Critical
        2) Elements
            a. Safer People
            b. Safer Vehicles
            c. Safer Speeds
            d. Safer Roads
            e. Post-Crash Care
    c. Project Process
        1) Data Analysis – documenting major crash trends, developing the high-injury network (corridors where the most crashes are occurring), and identifying risk factors
        2) Project Development & Prioritization – identifying and prioritizing specific projects to address existing issues and proactive measures to address risk
        3) Fact Sheets & Performance Measures – developing concepts for priority projects and determining how we will monitor progress/success
        4) Action Plans – creating to-do lists of specific actions (both infrastructure, such as roadway improvements, and non-infrastructure, such as educational campaigns), noting responsibility and potential funding sources for implementation
        5) Community and Stakeholder Engagement – engagement will occur throughout each stage of the project
    d. Schedule
        1) Phase 1 engagement will occur in July/August, and Steering Committee Meeting kicks-off the start of Phase 1 engagement
        2) Phase 2 engagement will occur late fall/early winter
        3) Draft action plan by late 2024/early 2025
        4) Final action plan March/April 2025
3. **Stakeholder & Community Engagement**
    a. Phases

1) Phase 1 (July/August): Inform public about Vision Zero and listening session to learn about traffic safety concerns
2) Phase 2 (November/December): Share draft content for the Vision Zero Action Plan and ask for feedback on the draft recommendations

b. Engagement Strategies
    1) Stakeholder Outreach
        a. Steering Committee
        b. VZ Community Partnership
        c. Elected Officials
    2) Community Outreach
        a. Public meetings
        b. Pop-up events
        c. Additional events
        d. Supplement with digital outreach
    3) Digital Outreach
        a. Website Social media blasts
        b. Online survey/interactive maps
        c. Project newsletters
        d. Community-based organizations

c. Upcoming Engagement Activities (Phase 1)
    1) Dates for events in each Partners' jurisdictions posted on website
    2) Steering Committee members encouraged to share events with their communities/organizations

4. **Role of Steering Committee**
    a. Role: To provide input on project-related issues and serve as liaisons between the project team, your organization, and members of your community
    b. Responsibilities
        1) Provide locally-focused expertise on the project
        2) Share project info with your organization and community
        3) Support community engagement activities
        4) Attend Steering Committee meetings and engage in touchpoints
        5) Participate with open and honest input & listen with an open mind
        6) Commit to pursuit of collaborative decisions
    c. Member expectations
        1) Four full group meetings (June 26, September 2024, January 2025, March 2025)
        2) There will be smaller group meetings/work sessions based on geography or topic area between the full group meetings
5. **Q&A**
    a. Stephanie Walton: How will the project team support language access for inclusion and how will information from other adopted regional action plans inform this effort?

1) Nikki: All materials will be translated into Spanish (including virtual and in-person materials). The Partners' have already started Vision Zero efforts and have obtained feedback from prior plans that will be referenced and incorporated (Lafayette MMTP, US 287 Vision Zero Study, etc.).
2) Liv: Vision Zero Community Partnership brings together entities involved in Vision Zero efforts already, offering an avenue for learning and supporting from related efforts.

b. Cammie Edson: USDOT updated their visuals to be more equitable and encourage using the newer graphic here instead: What Is a Safe System Approach? | US Department of Transportation
    1) Nikki: We will incorporate the newer graphic moving forward.
c. Katrina Harms: Nederland just completed their Transportation Plan and is currently working on their Comprehensive Plan. The Scenic Byway also has a plan.
    1) Nikki: The project team will review and incorporate findings from these efforts.
d. Stephanie Walton: Is there a PIO or comms person on the project team and synced up with local community PIOs?
    1) Krystian: Yes, we are working with the Communications team from each partner jurisdiction to promote the Vision Zero Action Plans and upcoming meeting notices through local channels like newsletters, e-blasts, and social media posts.
    2) Liv: Communications staff from all the Partners are coordinating. We'd love to have access to other communication channels too, if you have other specific ideas.
e. Cammie Edson: When visiting the map, will people see they can give feedback on state highway connections running through the region? Is there a way to call attention to where they can give feedback geographically up front?
    1) Nikki: The map is geolocated so people will be able to drop a pin within state highways within the county but if outside of the are covered in the VZAP, they will get an error message.
    2) Krystian: The intro text for the survey clarifies areas within which to provide feedback. The project team can further clarify that the map acts as an independent effort and add further information to the splash screen that pops up initially too.
f. Stephanie Walton: Is the map embedded within the survey? Can I add comments to the map multiple times?
    1) Krystian: Yes, you can visit the map as many times as you'd like.
g. Katrina Harms: Is there a way to provide feedback over the phone if people don't have internet access?
    1) Krystian: The accommodation for people who don't have internet is to fill out a printed survey in person at pop-up events/meetings. The project team is also

considering additional ways to reach people without internet access to provide tools that accommodate their needs

2) Katrina Harms: Nederland Library is a great place to post materials.

h. Stephanie Walton: Suggest printed materials be available at libraries and senior centers with briefing to resource coordinators.

6. **Tour of Project Website & Survey**
   a. Website: Boulder County Vision Zero Action Plan - Boulder County
   Shortened URL: boco.org/visionzeroactionplan
      1) Suggestion from Stephanie Walton: perhaps the project website could link to the most recent or final MMTP for Lafayette. The current link looks like the project plan used during the building the plan (which is now outdated and likely "expired" info -- not sure there are plans to update?).
   b. Survey: Boulder County, Lafayette, Superior Vision Zero Action Plans | Social Pinpoint (mysocialpinpoint.com)
7. **Listening Session**
   a. Mural activity (open through 7/5)
      1) What would a successful Vision Zero Action Plan look like to you? Please use the sticky notes to add key success themes.
      2) What are your ideas for roadway safety in Boulder County? Please add your ideas for how the Vision Zero Action Plans can advance transportation safety outcomes under the topic areas below.
   b. Link: https://bit.ly/BOCOVZAPSC
      1) Stephanie Walton: A thoughtful implementation plan that's actionable and with a focus on funding. Ensure the plan isn't collecting dust and is in motion and moving forward. Bring people through the engagement process and integrate within related efforts/projects. Balance education with growth in population and impact that residents are feeling – demonstrate keeping up with quality of life and emerging needs.
      2) Katrina Harms: From a highway point of view, success is challenging when Nederland (and Peak to Peak Highway) is enveloped with traffic. There are services on both sides of the highway and a lack of crosswalks. Unincorporated areas aren't receiving attention or funding currently.
      3) Stephanie Walton: How do we communicate and how is CDOT involved in this effort? Let's be sure to include actions for state highways running through these communities.
         a. Krystian: CDOT is at the table (including on the Steering Committee) and will be engaged in the recommendation development stage. Important to be comprehensive with each action plan and review all facilities, regardless of who operates/maintains them.

4) Matt Muir: Instead of solely reactive safety metrics, a success metric could be, for example, proximity of population to a multi-modal facility. 1.) Make crash data automatic with a statewide standard electronic crash report form. 2.) Infrastructure is slow and expensive, develop policy solutions. Specifically, improved driver's certification. 3.) Communicate how funding works and the, say, basic $9M per year from the county's sales tax. Need to ensure people understand Colorado traffic laws and remind people of the contract they enter into when operating a motor vehicle in the state of Colorado. Consider sharing videos to remind people of traffic laws.
    a. Stephanie Walton: Consider having up-to-date information about current and new legislation that is communicated in a way that is easy to digest for people. Additionally, legislation does not come with a marketing budget so awareness building/continuing education is important. What are some potential funding mechanisms to augment CDOT's PSA media budget?
5) Rachel Plessing: Consider the respect and responsibility we take on as drivers – inspire a communal sense of looking out for vulnerable users.
6) Katrina Harms: Consider places like along Peak to Peak Highway where there aren't municipalities advocating for elements of the P2P Plan. Consider how Nederland is uniquely impacted and which requires tailored strategies to be effective. Ensure attention to the types of through-traffic coming through this area and awareness level of drivers/safety issues (winter traffic, animals in the roadway, lack of crossing facilities so people are dashing across the roadway).
    a. Rachel Plessing: Agree with Katrina on the difference in local vs. tourist traffic!
7) Rachel Arndt: I think going directly to communities that are difficult to reach when they are already meeting vs. them coming to you.
8) Stephanie Walton: How can we anticipate the needs of transportation and infrastructure for older adults, as it relates to VZ?

8. **Next Steps**
    a. Actions
        1) Add ideas to the Mural! (through July 5)
        2) Promote public engagement events, website, and survey
        3) Attend/participate
        4) Connect us to your organization/communities
    b. Calendar
        1) July/August: Pop-up events and public meetings
        2) August 31: Survey closes
        3) September TBD: Full Group Steering Committee Meeting #2

Appendix C.
Pop-Up and Public Meeting Materials

Boulder County
Vision Zero Action Plan

Help Us Work Towards Zero Traffic Deaths

Recognizing the importance of implementing a regional approach to roadway safety, Boulder County, Lafayette, and Superior (the Partners) joined forces to apply for Safe Streets and Roads for All (SS4A) grant funding to address **traffic-related deaths and serious injuries**.

The grant will enable each Partner to develop a **Vision Zero Action Plan (VZAP)** which will be a detailed analysis of traffic crashes and risk factors in the county and some specific recommendations to comprehensively **improve transportation safety** in the coming years.

Key Project Stages:

Data Analysis: Documenting major crash trends, developing the high-injury network (corridors where the most crashes are occurring), and identifying risk factors.

Project Development & Prioritization: Identifying and prioritizing specific projects to address existing issues and proactive measures to address risk.

Fact Sheets & Performance Measures: Developing concepts for priority projects and determining how we will monitor progress/success.

Action Plans: Creating to-do lists of specific actions (both infrastructure, such as roadway improvements, and non-infrastructure, such as educational campaigns), noting responsibility, timing, and potential funding sources for implementation.

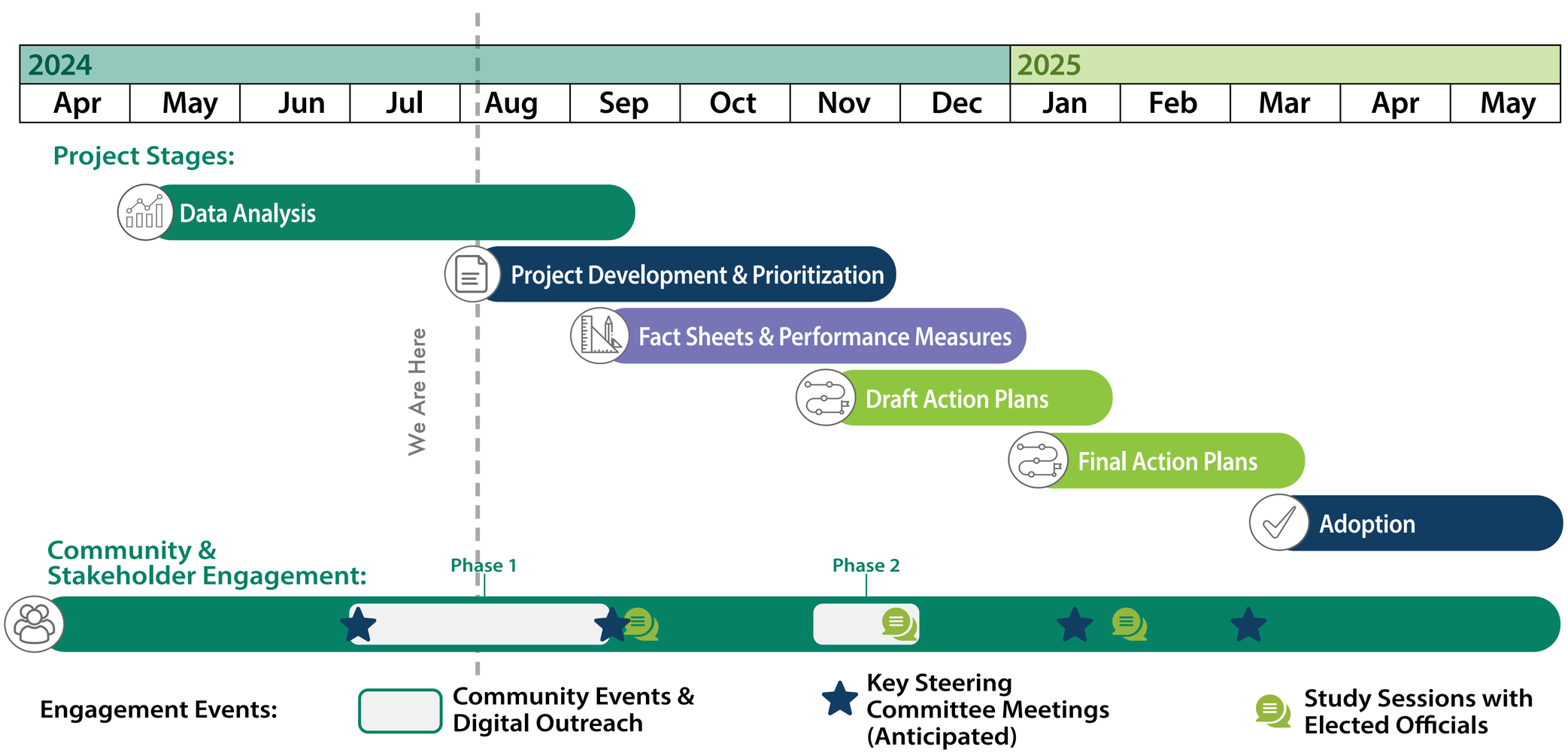
What is Vision Zero?

Vision Zero is a community strategy to eliminate all traffic fatalities and serious injuries, while increasing safe, healthy, equitable mobility for all.

Learn More About the Plan:

boco.org/VisionZeroActionPlan

Project Timeline:



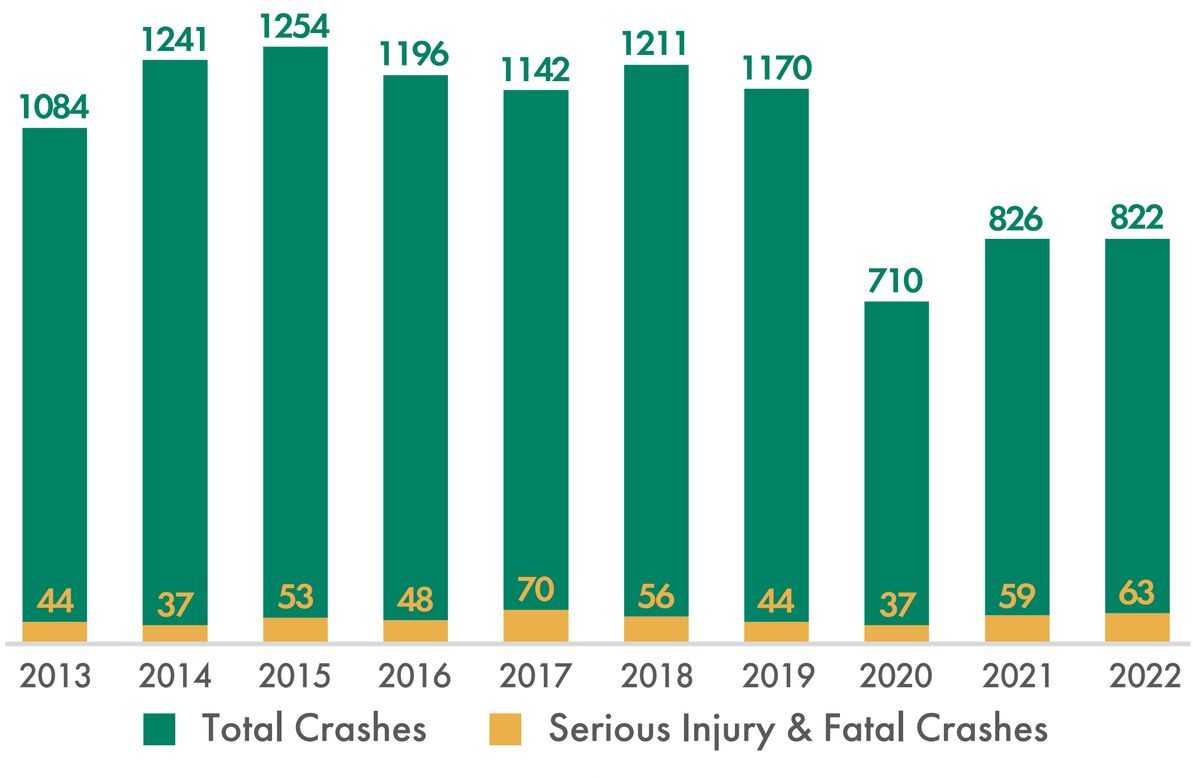
Unincorporated Boulder County Traffic Safety Analysis

The Project Area includes Unincorporated Boulder County and the Mountain Towns of Nederland, Jamestown, and Ward

Why is Vision Zero Important?

Over 10 years, **135** people died in traffic crashes in the Project Area

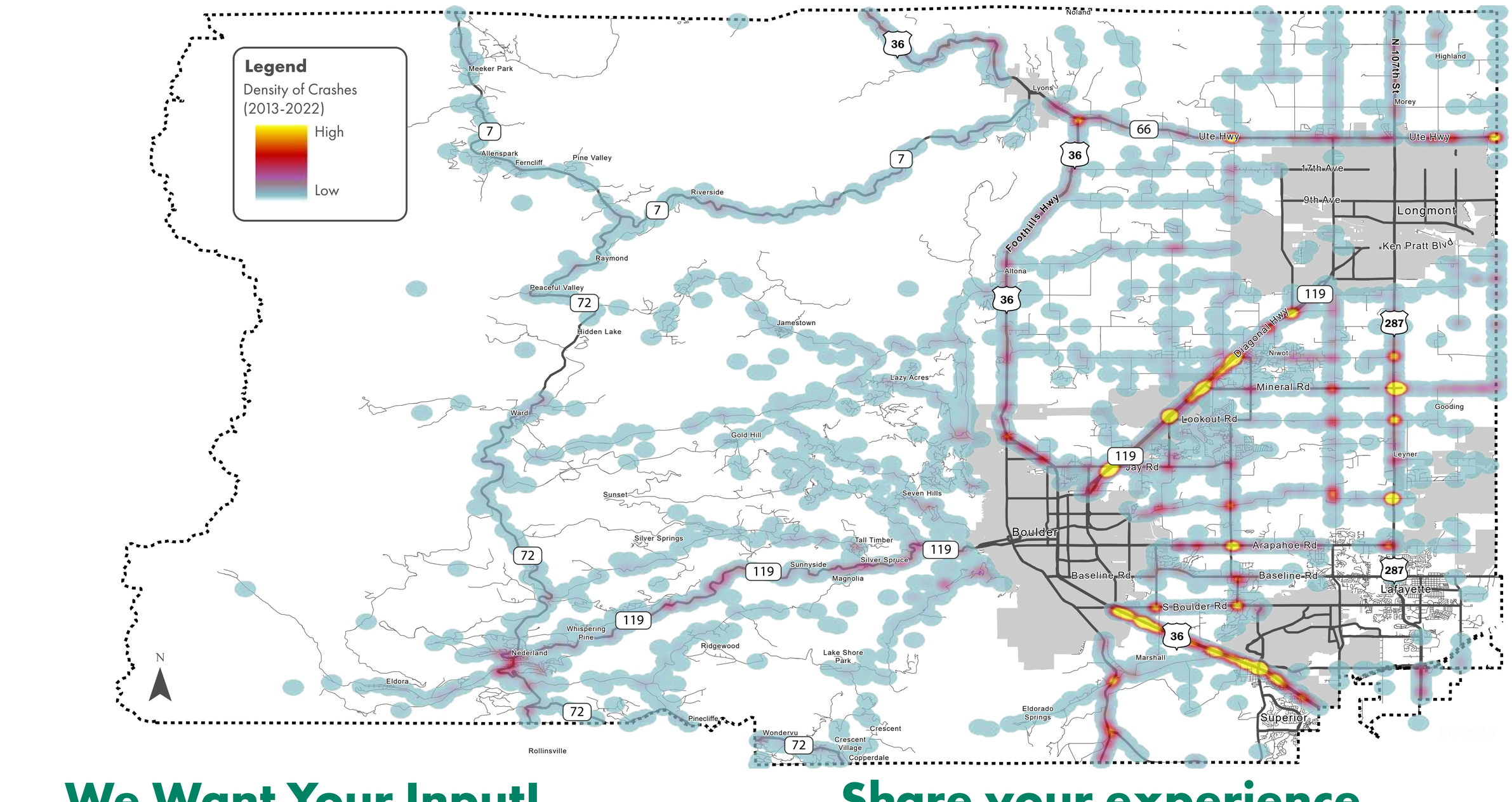
Crashes Over Time:



Top Five Serious Injury & Fatal Crash Types:

Fixed Object	16%
Overturning / Rollover	15%
Bicycle	11%
Broadside	11%
Head-On	11%

Though total crashes have decreased since 2019, the percentage of serious injury and fatal crashes has **increased**.



We Want Your Input!

Crash analysis is a critical part of developing Vision Zero Action Plans — and so is hearing from the community to proactively address locations where people feel unsafe or are experiencing close calls.

Share your experience traveling in Boulder County by:

- Placing stickers on our map or dropping pins on our online interactive map
- Taking our online survey by August 31

boco.org/VisionZeroActionPlan

Boulder County, Lafayette, and Superior

VISION ZERO ACTION PLANS

Condado de Boulder
Plan de Acción de *Vision Zero*

Ayúdenos a lograr cero muertes por accidentes de tránsito

Reconociendo la importancia de implementar una estrategia regional para la seguridad vial, el condado de Boulder, Lafayette y Superior (los socios) unieron fuerzas para solicitar fondos de subvención de Calles y Carreteras Seguras para Todos (SS4A por sus siglas en inglés) para abordar **las muertes y lesiones graves relacionadas con el tránsito**.

La subvención permitirá a cada socio desarrollar un **Plan de Acción de *Vision Zero* (VZAP por sus siglas en inglés)**, que será un análisis detallado de los accidentes de tránsito y los factores de riesgo en el condado y algunas recomendaciones específicas para **mejorar la seguridad del transporte** en los próximos años.

Etapas Clave del Proyecto:

Análisis de Datos: Documentar las principales tendencias de accidentes, desarrollar la red de alto índice de lesiones (corredores donde ocurren la mayoría de los accidentes) e identificar factores de riesgo.

Desarrollo y Priorización del Proyecto: Identificar y priorizar proyectos específicos para abordar problemas existentes y medidas proactivas para abordar el riesgo.

Hojas Informativas y Medidas de Desempeño: Desarrollar conceptos para proyectos prioritarios y determinar cómo monitorear el progreso/éxito.

Planes de Acción: Crear listas de tareas pendientes de acciones específicas (tanto de infraestructura, p.ej. mejoras de carreteras, como de no infraestructura, p.ej. campañas educativas), señalando la responsabilidad, el calendario y las posibles fuentes de financiación para la implementación.

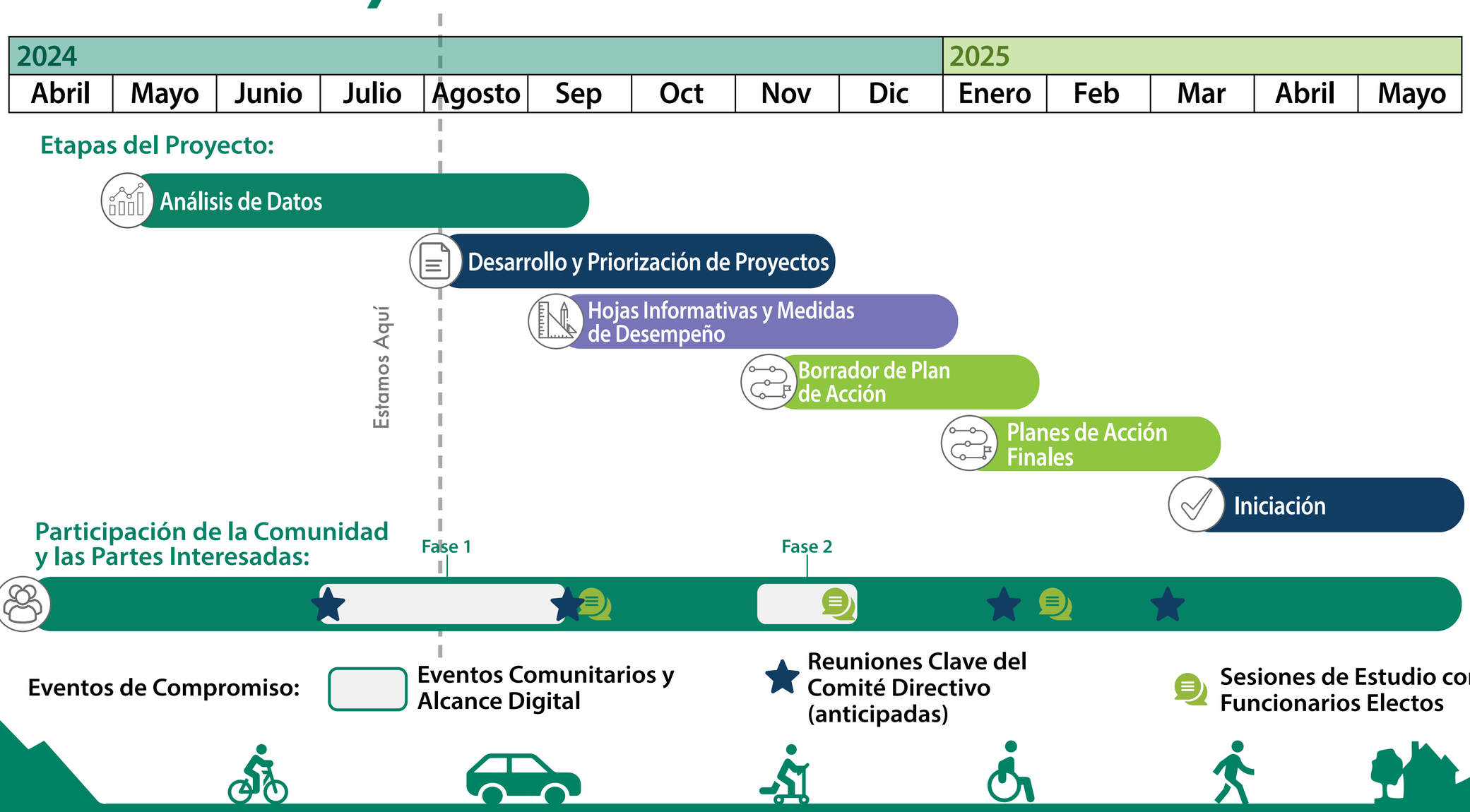
¿Qué es *Vision Zero*?

Vision Zero es una estrategia comunitaria para eliminar todas las muertes y lesiones graves en accidentes de tránsito y aumentar los viajes seguros, sanos y equitativos para todos.

Obtenga más Información sobre el Plan:

boco.org/VisionZeroActionPlan

Calendario del Proyecto:



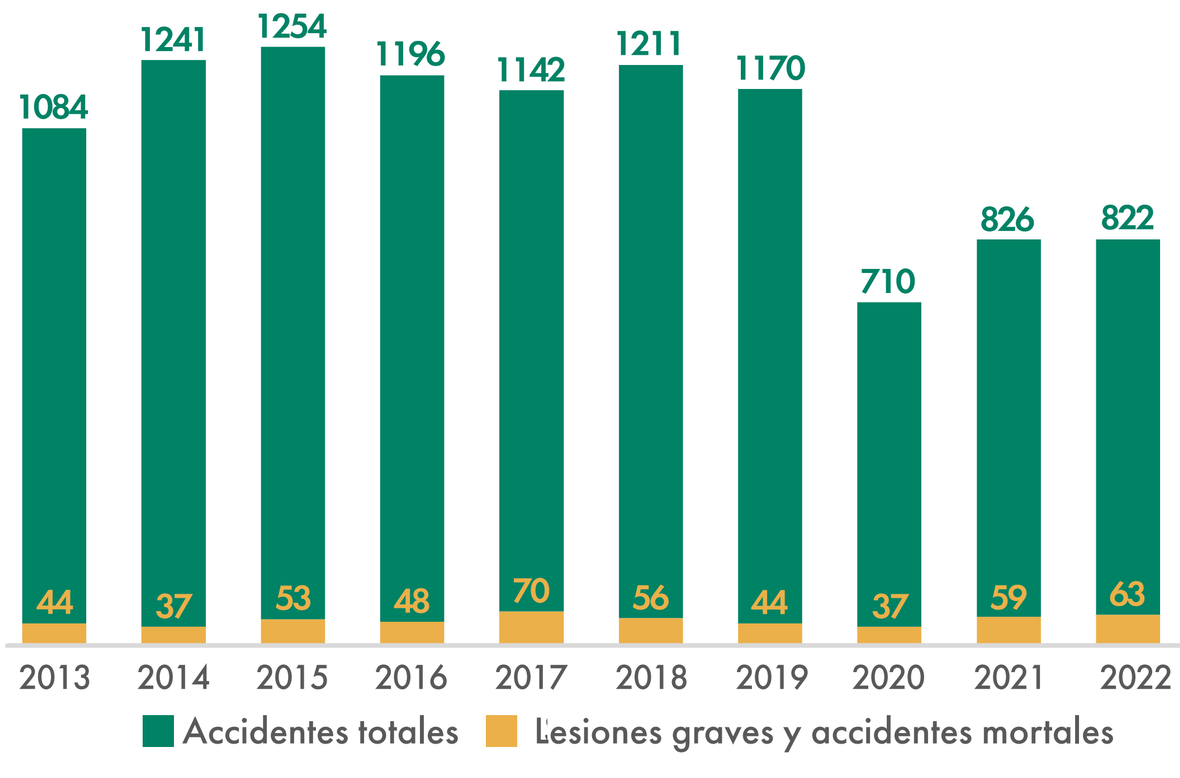
Condado de Boulder No Incorporado
Análisis de Seguridad Vial

El área del proyecto incluye el condado no incorporado de Boulder y las communidades participantes de Nederland, Jamestown y Ward

¿Por qué es importante *Vision Zero*?

En 10 años, **135** personas murieron en accidentes de tránsito en el Área del Proyecto

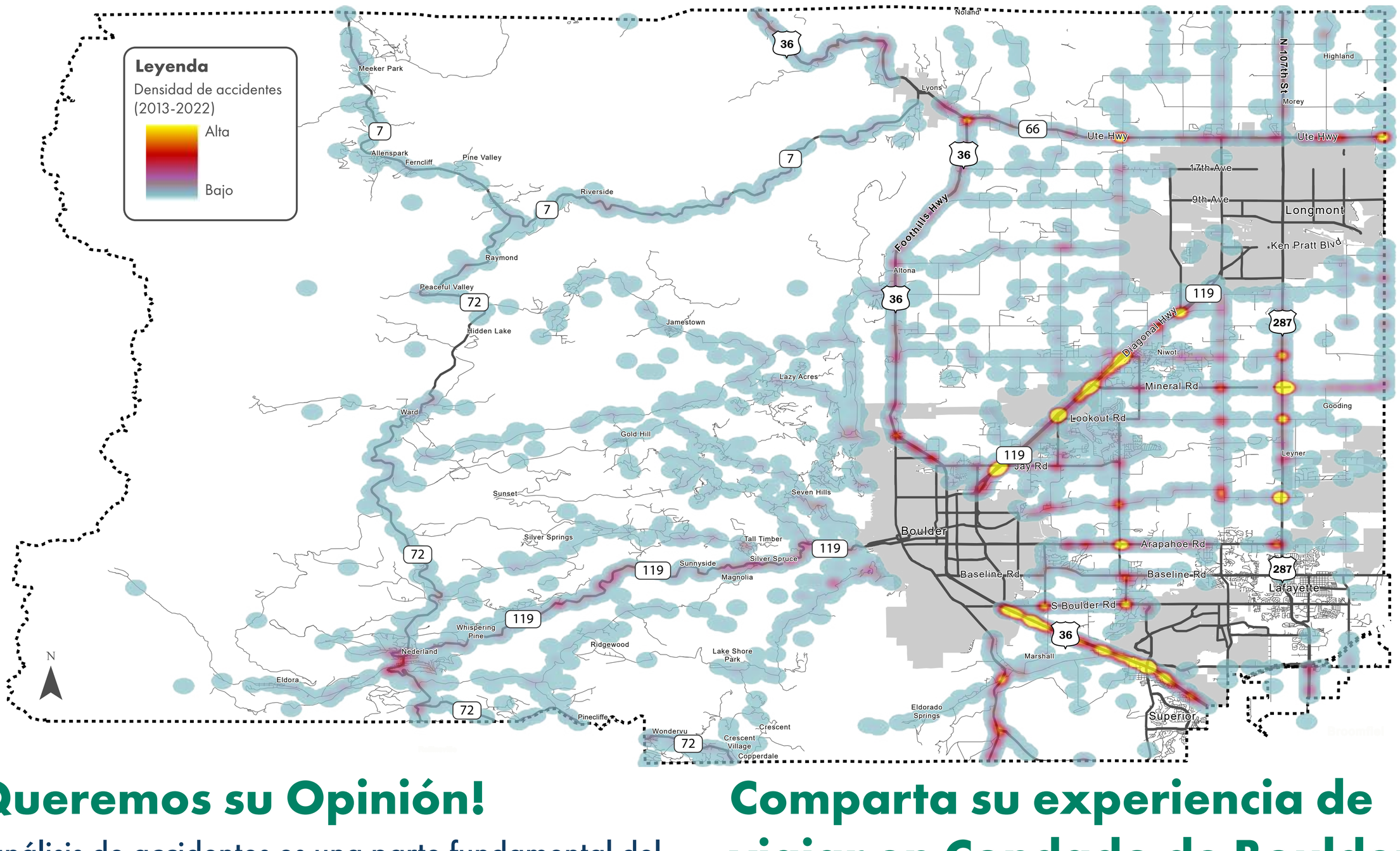
Accidentes por Año:



Los cinco tipos principales de lesiones graves y accidentes mortales:

Objeto Fijo	16%
Vuelco	15%
Bicicleta	11%
De Costado	11%
De Frente	11%

Aunque el total de accidentes ha disminuido desde 2019, el porcentaje de accidentes con lesiones graves y fatales ha **aumentado**.



¡Queremos su Opinión!

El análisis de accidentes es una parte fundamental del desarrollo de los Planes de Acción de Vision Zero y también lo es escuchar a la comunidad para abordar de manera proactiva los lugares donde las personas se sienten inseguras o experimentan situaciones cercanas.

Comparta su experiencia de viajar en Condado de Boulder al:

- Colocar calcomanías en nuestro mapa o alfileres en nuestro mapa interactivo en línea
- Responder nuestra encuesta en línea antes del 31 de agosto

boco.org/VisionZeroActionPlan

Boulder County, Lafayette y Superior

PLANES DE ACCIÓN DE *VISION ZERO*

Boulder County, Lafayette, and Superior

VISION ZERO ACTION PLANS

Unincorporated Boulder County Public Meeting #1

August 8, 2024

Project Team Introductions

Goals of Meeting

1. Define “What is Vision Zero?”
2. Provide information about the project background and schedule
3. Present crash data and what we’ve heard from the community
4. Facilitate a discussion to allow the community to express their comments and questions
5. Encourage participation of online survey

What is Vision Zero?

Vision Zero is a transportation strategy to eliminate all traffic fatalities and serious injuries for people using all modes of transportation.

Vision Zero recognizes that humans make mistakes and therefore the transportation system should be designed to minimize the consequences of human error.

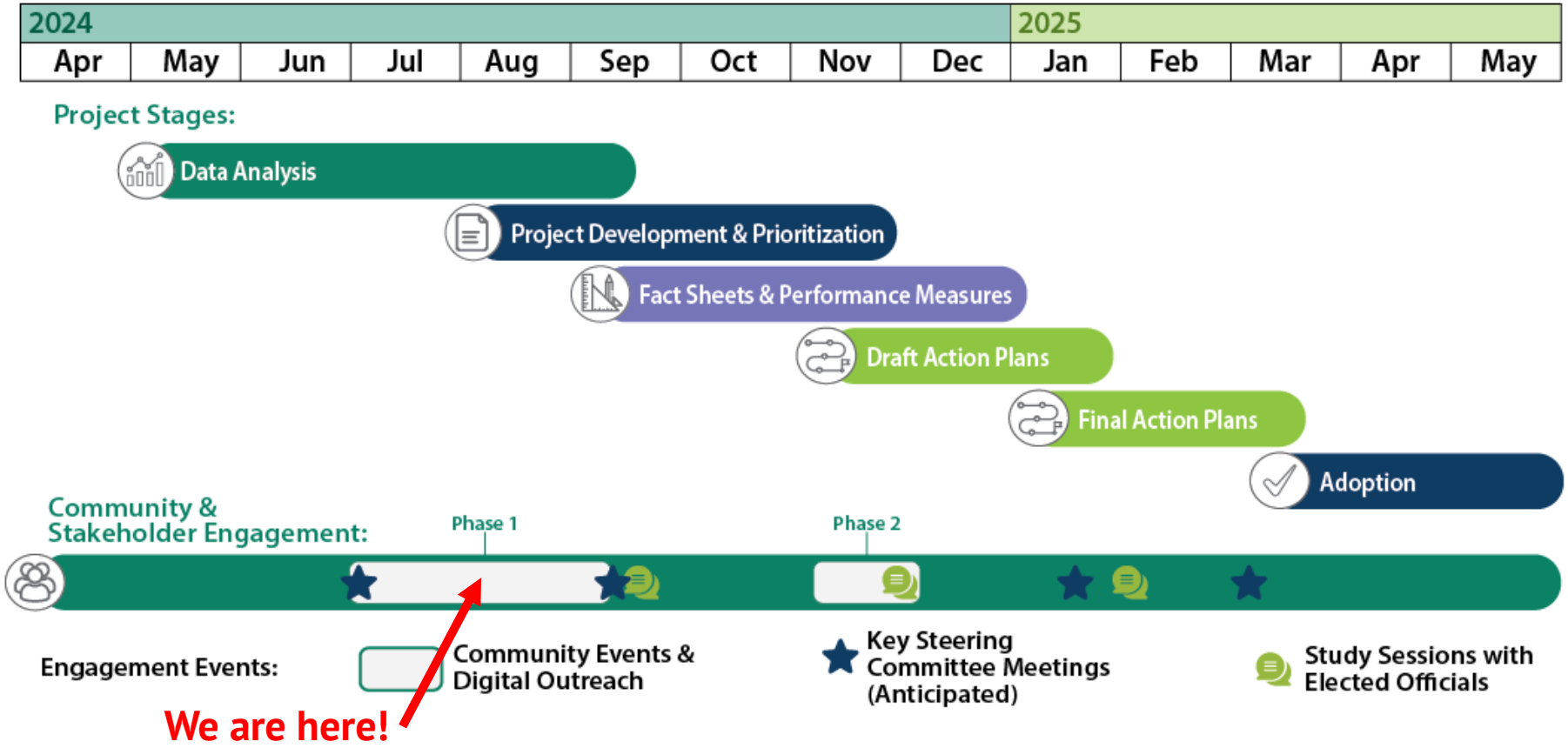
Safe System Approach

TRADITIONAL APPROACH		VISION ZERO
Traffic deaths are **INEVITABLE**		Traffic deaths are **PREVENTABLE**
PERFECT human behaviour	VS	Integrate **HUMAN FAILING** in approach
Prevent **COLLISIONS**		Prevent **FATAL AND SEVERE CRASHES**
INDIVIDUAL responsibility		**SYSTEMS** approach
Saving lives is **EXPENSIVE**		Saving lives is **NOT EXPENSIVE**

Unincorporated Boulder County VZAP Project Overview

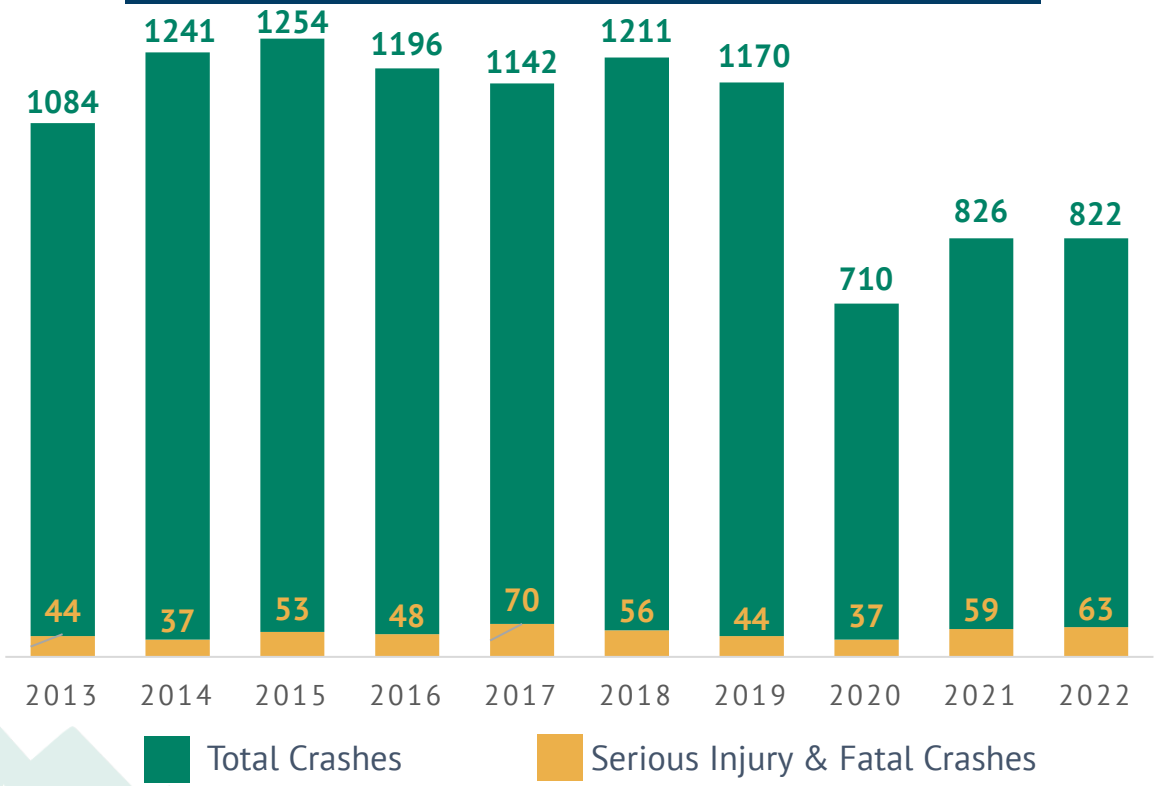
- Boulder County, Lafayette, and Superior (the Partners) joined forces to apply for 2023 **Safe Streets and Roads for All (SS4A)** grant funding.
- Awarded a Planning Demonstration Grant for the development of an Action Plan.
- Create list of specific actions, noting responsibility and potential funding sources for implementation.

Schedule


2024
2025
Apr
May
Jun
Jul
Aug
Sep
Oct
Nov
Dec
Jan
Feb
Mar
Apr
May
Project Stages:
Data Analysis
Project Development & Prioritization
Fact Sheets & Performance Measures
Draft Action Plans
Final Action Plans
Adoption
Community & Stakeholder Engagement:
Phase 1
Phase 2
Engagement Events:
Community Events & Digital Outreach
Key Steering Committee Meetings (Anticipated)
Study Sessions with Elected Officials
We are here!

Crash History in Unincorporated Boulder County & Mountain Towns

Over 10 years, **135** people died in traffic crashes in the Project Area



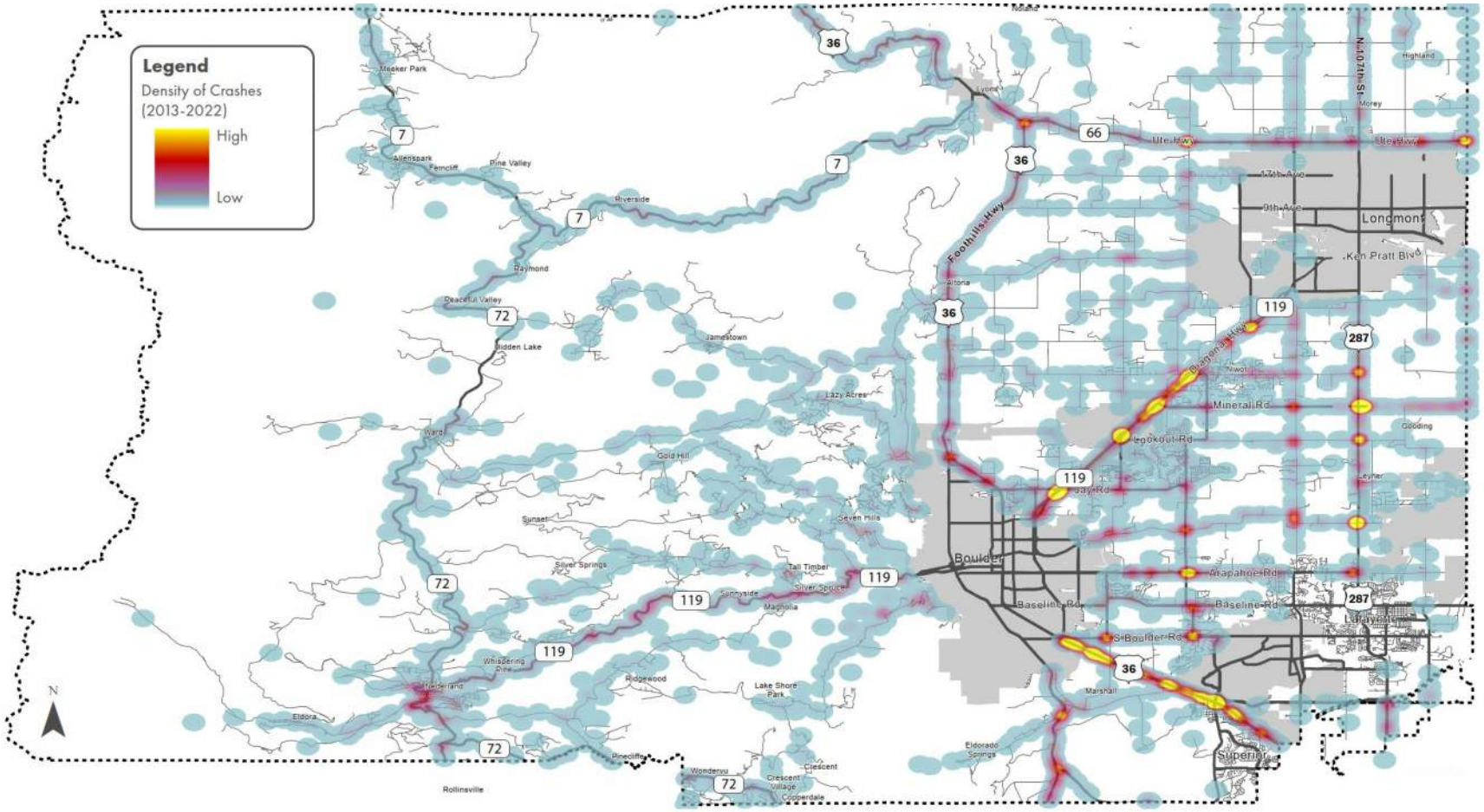
Top Five Serious Injury & Fatal Crash Types:

Fixed Object	16%
Overturning / Rollover	15%
Bicycle	11%
Broadside	11%
Head-On	11%

Though total crashes have decreased since 2019, the percentage of serious injury and fatal crashes has **increased**.

Crash History in Unincorporated Boulder County

65% of crashes in Boulder County are occurring along corridors



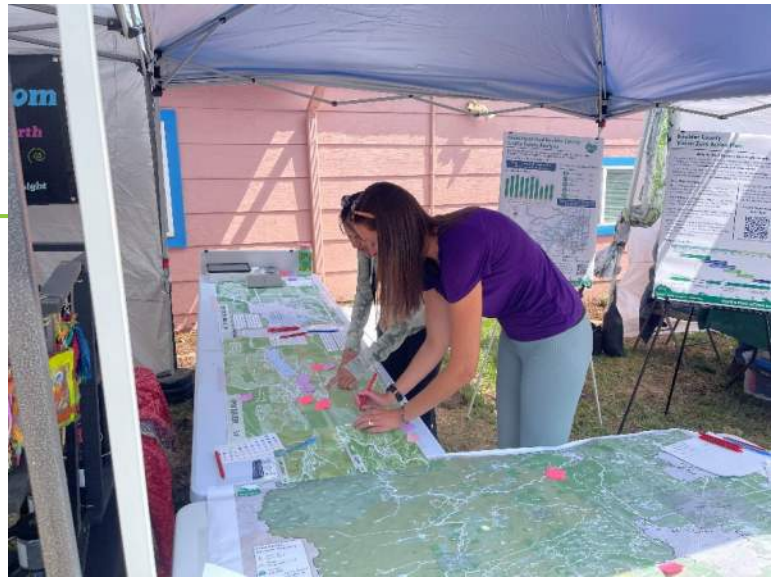
Survey Open Through August 31

Project Website & Survey/Web Map

boco.org/visionzeroactionplan

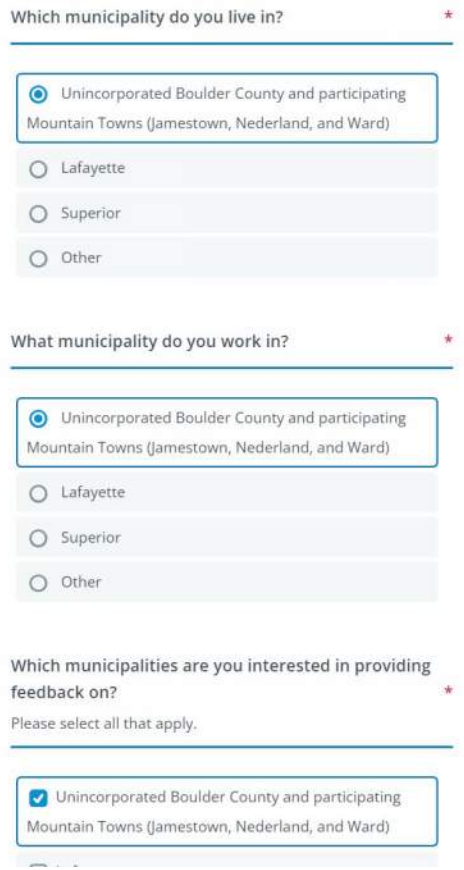
How We're Collecting Input

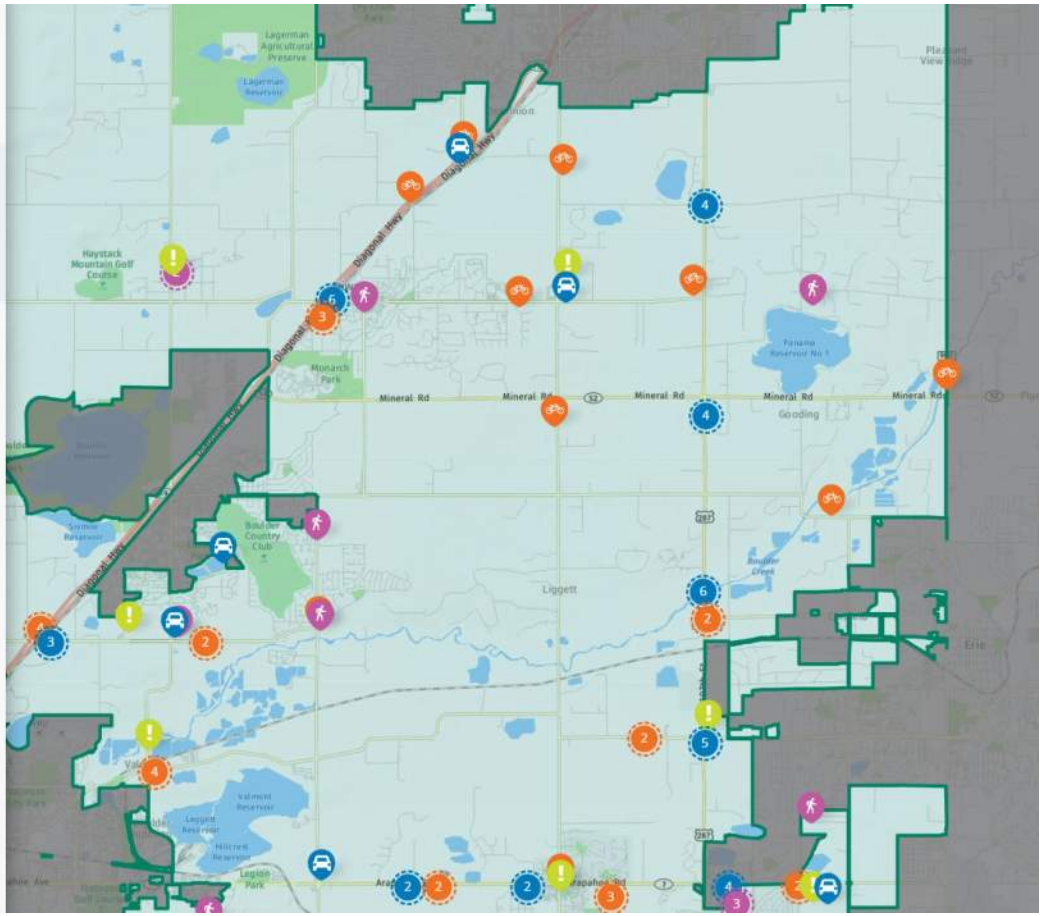
- Nederland Farmer's Market
- Online Survey



What We've Heard So Far

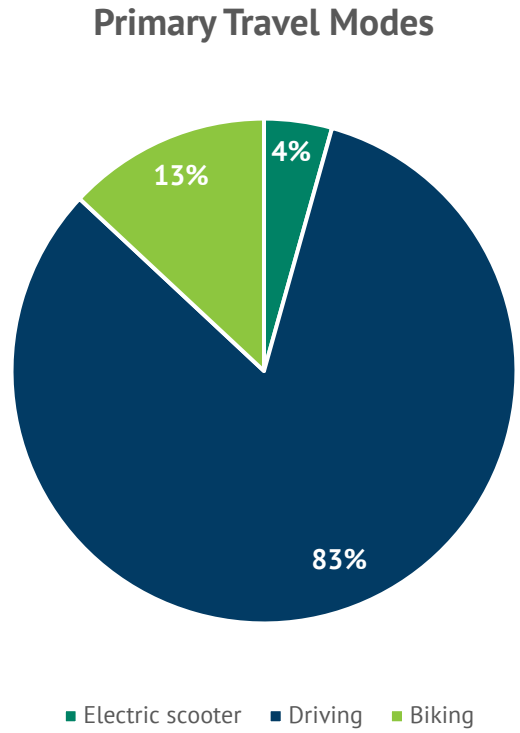
Online survey and map





What We've Heard So Far

- Over 250 survey & map responses
- Majority (71%) of survey respondents live in unincorporated Boulder County or the mountain towns



What We've Heard So Far

How safe do you feel traveling in Boulder County? (Responses other than neutral):

Safe: 50%
Unsafe: 29%

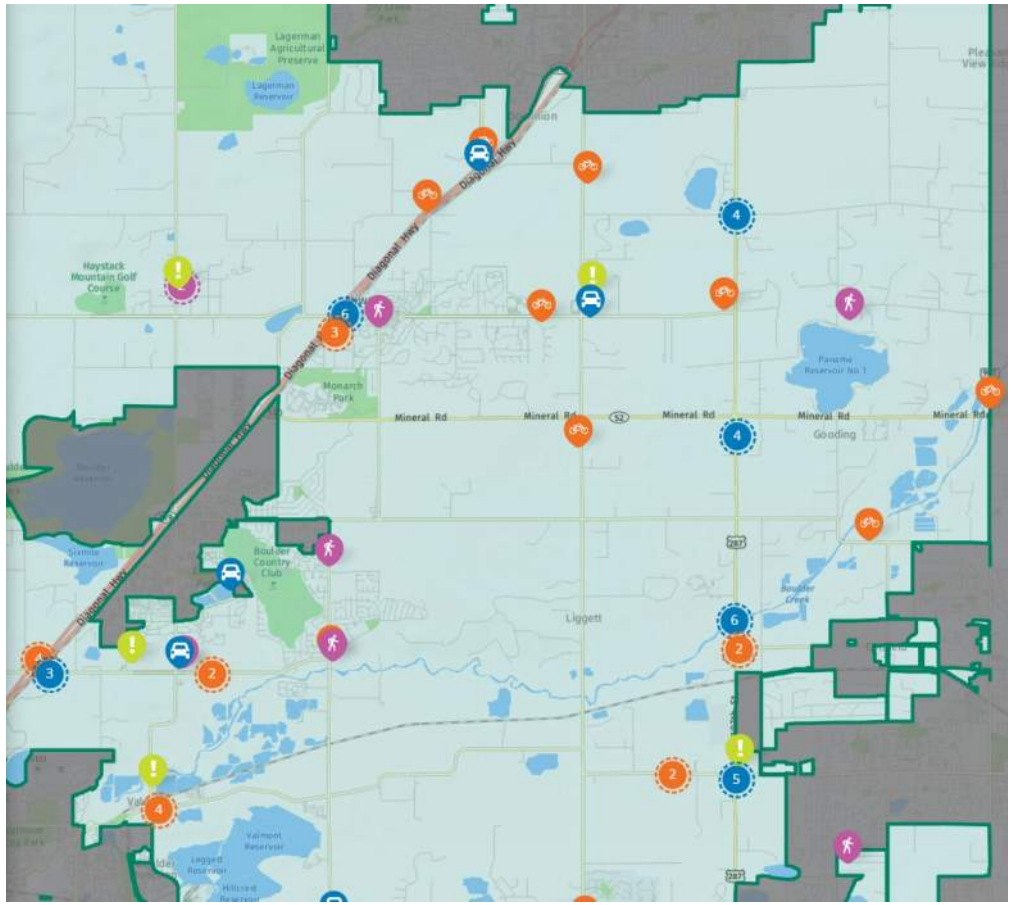
Safe: 29%
Unsafe: 21%

Safe: 13%
Unsafe: 33%

Respondents involved in a crash in unincorporated Boulder County in past five years: **30%**

What We've Heard So Far: Locations of Concern

- SH 119
  - Diagonal Highway: traffic speed changes and intersection at Niwot Road make driving the corridor feel unsafe
  - Boulder Canyon: Vehicle speeds, passing activity, and user conflicts at locations like Boulder Falls
- Jay Road: Feels uncomfortable for bicyclists and drivers report site distance challenges
- Foothills Parkway: Vehicle speeds



Discussion

Discussion

- Does the input we have heard to date resonate with you?
- Are there additional concerns we should be aware of?
- What would a safe street look like to you?

Please feel free to unmute or share ideas in the chat

Questions or Comments

Next Steps

1. Use crash analysis and public outreach to inform development of draft recommendations (engineering and non-engineering)
2. Develop a draft of the Boulder County Vision Zero Action Plan
3. Bring draft Action Plan to public for feedback on the draft recommendations

How You Can Help!

- Take online survey by August 31
- Visit project website and sign up for updates.

boco.org/visionzeroactionplan

Calendar

- **August 31:** Online survey closes
- **Late Fall/Early Winter:** Share draft content for the Vision Zero Action Plan with the public and ask for feedback on the draft recommendations.

Thank you!

Project Contacts

Liv Lewin, PE
Boulder County
Vision Zero Program Manager
llewin@bouldercounty.gov

Nikki Riemer, PE, RSP$_1$
Consor Engineers
Consultant Project Manager
Nikki.riemer@consoreng.com

Project Website & Survey/Web Map

boco.org/visionzeroactionplan

Survey Open Through August 31!

Boulder County
Vision Zero Action Plan
Phase 2 Engagement Summary

March 2025

Contents

Introduction 2
Project Outreach Set-up & Promotion Information 2
Website 2
Flyer 3
Social Media 3
Newsletter 3
Stakeholder Engagement 4
Steering Committee Meeting #2 4
Steering Committee December Update 4
Community Engagement 4
Pop-Up Event – Boulder County Winter Bike to Work Day 4
Pop-Up Event – Nederland TownTalk 5
Informational Videos 6
Online Survey 6
Proposed Safety Solutions 7
Project Prioritization 17
Open-Ended Responses 20
Next Steps 20
Appendices 21
Appendix A: Steering Committee Meeting Materials 21
Appendix B: Pop-up Materials 82
Appendix C: Survey Questions 93

Introduction

Recognizing the importance of implementing a regional approach to road safety, Boulder County, Lafayette, and Superior (the Partners) joined forces to apply for 2023 Safe Streets and Roads for All (SS4A) grant funding. The Partners were awarded the SS4A grant funding which enables each Partner to develop a Vision Zero Action Plan (VZAP) of their own. The VZAP will be a detailed analysis of traffic crashes and risk factors in the county or jurisdiction, and provide specific recommendations to comprehensively improve transportation safety in the coming years. The Boulder County Vision Zero Action Plan is being developed using community engagement to supplement the data-driven safety analysis completed for the project. Two phases of community outreach were planned in the form of public meetings and pop-up events:

- Phase 1 served as a listening session to learn from the public about traffic safety attitudes and location-specific feedback; and
- Phase 2 informed the public by presenting draft content from the Vision Zero Action Plan, including high-priority recommendations.

In winter 2024/2025, the project team implemented Phase 2 of outreach. During this phase, the community was asked to review high-level results from the safety analysis and provide feedback on proposed countermeasures. The community and stakeholder engagement efforts included a blend of in-person, virtual, and digital engagement strategies, including informational online videos, an online survey, and participation at in-person community events. The community feedback collected in Phase 2 will be used to prioritize Vision Zero projects and specific actions Boulder County can implement to improve traffic safety.

Project Outreach Set-up & Promotion Information

Understanding that outreach and communication with the community was a top priority, the project team created a variety of content to promote and encourage participation in the engagement efforts for this project. Diversifying the outreach platforms allowed Boulder County to reach a wider array of community members for more comprehensive engagement.

Website

During Phase 1, the project team worked closely with the Partners to develop a Vision Zero Action Plan project website hosted on Boulder County's webpage. The website contains static information including project overview, project schedule, to-date safety progress in each of the jurisdictions, an opportunity to sign up for project updates, FAQs, and program contact information. It also includes information that is updated regularly including public engagement opportunities, upcoming public meetings, and past public meeting recordings and presentations. The Partners promoted the project website with their constituents, and the project team included the website address and QR code on all promotional and engagement materials.

The website can be accessed by QR code, by the abbreviated weblink, or by the full weblink:

QR Code:

Abbreviated weblink: https://boco.org/visionzeroactionplan

Full weblink: https://bouldercounty.gov/transportation/multimodal/vision-zero-action-plan/

Flyer

The project team created a project flyer in both English and Spanish to promote public involvement in Phase 2 of outreach for the Vision Zero Action Plan. The flyer encouraged community members to take the transportation survey and provided both a QR code and an abbreviated weblink to access the project website.

Social Media

The project team assembled a social media calendar to promote attendance at the pop-up event and encourage online survey completion. The project team worked with the Boulder County communications teams to push content out through their social media channels. Each social media calendar included text content, images, and outlined the platforms for distribution (Twitter [X], Facebook, Instagram, Nextdoor, LinkedIn) for each post.

Newsletter

The project team drafted a news release to be distributed to residents explaining the Vision Zero Action Plan project and how residents can get involved and provide feedback. The newsletter content was emailed to website subscribers of Vision Zero, Transportation News, or Media Only (5,438 recipients).

Stakeholder Engagement

A Steering Committee was formed to help foster and shape the development of the Vision Zero Action Plan. The Steering Committee consisted of members from Boulder County, Lafayette, Superior, Nederland, Colorado Department of Transportation (CDOT), and advocacy agencies. Throughout the project duration, the team facilitated meetings with the Steering Committee, and targeted meetings as needed. The Stakeholder Committee convened once between Phase 1 and Phase 2 engagement efforts (Steering Committee Meeting #2), and were provided a memorandum with updates on the project status as well as an encouragement to take the online survey and share with their networks during Phase 2.

Steering Committee Meeting #2

On October 10, 2024, the project team hosted a virtual meeting with members of the Steering Committee including representatives from Boulder County, Lafayette, Superior, Nederland, Colorado Department of Transportation (CDOT), and advocacy agencies. The team reviewed information about the project scope, background, and schedule, then provided an overview of input received during Phase 1 of community outreach as well as the results of the safety analysis. Steering Committee members were asked to react to the results of the crash analysis and High-Injury Networks. The following discussion revolved around potential inputs focusing on roadways being used for recreation versus commuting/non-recreation. Finally, the group discussed potential outreach events and ways to support Phase 2 of engagement. The Steering Committee Meeting presentation and meeting notes are available in Appendix A.

Steering Committee December Update

In December 2024, the project team developed graphic updates for each agency that were shared with the Steering Committee members. The updates focused on a review of Phase 1 community feedback, the safety analysis findings, the High-Injury Network, and an overview of the recommendation development process including example recommended actions. The Steering Committee Update specific to Boulder County can be found in Appendix A.

Community Engagement

Community engagement strategies included two in-person events, informational online videos, and an online survey. Community engagement materials can be found in Appendix B.

Pop-Up Event – Boulder County Winter Bike to Work Day

The Boulder County Winter Bike to Work Day pop-up event occurred on February 14th, 2024 from 7AM-9AM at the Boulder Chamber. At the event, the project team set up boards with project background information, a summary of crash analysis statistics in Boulder County, and the High-Injury Network (HIN). The project team also set up an activity that prompted the public to place stickers to indicate their level of support for the preliminary recommended countermeasures to address the top crash types in Boulder County. Figure 1 displays photos from the pop-up event. Overall, the more than 65 participants were supportive of the six countermeasures, with some concerns raised about median barriers and their effectiveness on reducing crashes. In addition to the sticker exercise, the project team facilitated an activity to understand priorities for where to implement safety improvements first. Participants were given 7 tokens and asked to distribute them among 4 buckets based on their top priorities. The top priority for participants was to improve walking and biking ability, followed by locations with known crash history.

Figure 1. Boulder County Bike to Work Day Pop-Up Event

Pop-Up Event – Nederland TownTalk

The Nederland TownTalk pop-up event occurred on February 20th, 2024 from 3PM-5PM at Kathmandu. Similarly to the Boulder County Winter Bike to Work Day Event, the project team set up boards with project background information, a summary of crash analysis statistics in Boulder County, and the High-Injury Network (HIN). The project team also set up an activity that prompted the public to place stickers to indicate their level of support for the preliminary recommended countermeasures to address the top crash types in Boulder County. **Figure 2** displays a feedback board from the pop-up event. Overall, participants were supportive of the six countermeasures, with some concerns raised about speed cameras and their efficacy, as well as privacy concerns. In addition to the sticker exercise, the project team facilitated an activity to understand priorities for where to implement safety improvements first. Participants were given 7 tokens and asked to distribute them among 4 buckets based on their top priorities. The top priority for participants was to improve walking and biking ability, followed by locations with known crash history.

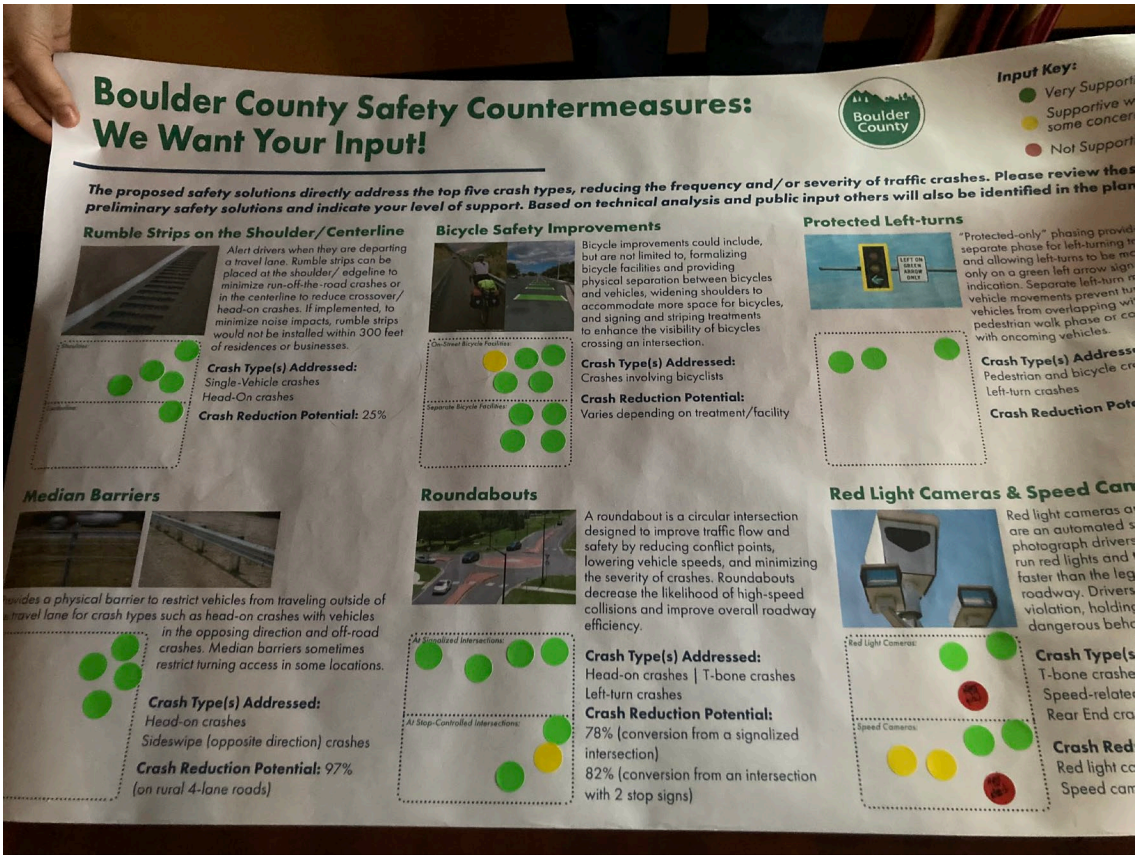


Figure 2. Nederland TownTalk Pop-Up Event

Informational Videos

Informational videos were posted to the project website in early 2025 to provide community members with an update on project process, present the results of the safety analysis, and describe proposed safety solutions. An introductory video provided an overview of the project, what Vision Zero is, and how the Partners are collaboratively developing their individual Vision Zero Action Plans. Next, a Boulder County-specific video detailed insights from the safety analysis process, including the HIN, as well as describing some of the proposed safety solutions and how they address the most common crash types in Boulder County. Finally, the video provided an overview of the Vision Zero Action Plan next steps, such as project prioritization, and prompted viewers to participate in the online survey.

Online Survey

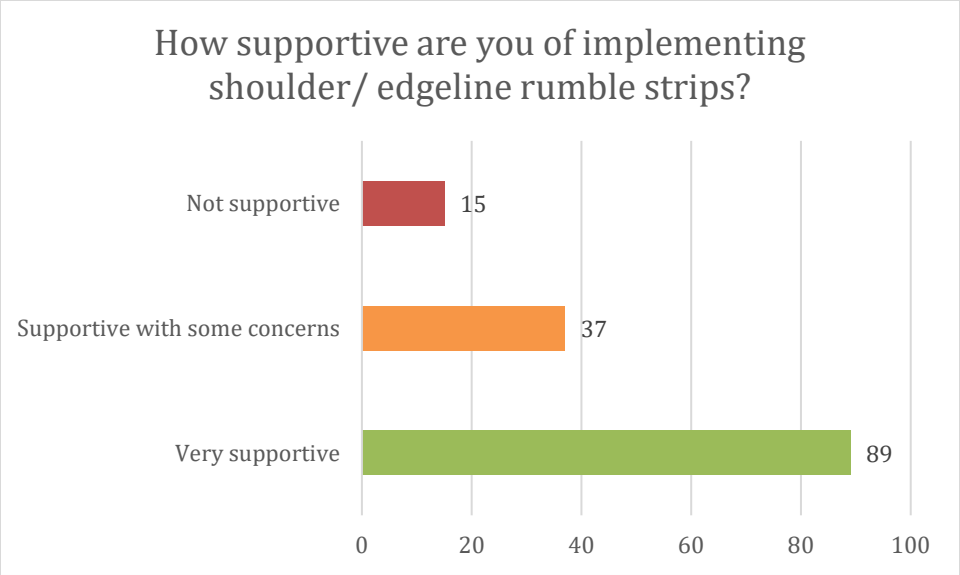
An online survey was shared with the public on SurveyMonkey and was open from February 11, 2025 through March 2, 2025. The survey presented high-level results from the safety analysis and proposed safety solutions related to the top crash types in Boulder County. The survey also gathered feedback about potential prioritization factors and provided the opportunity to provide additional open-ended comments. The full online survey can be viewed in Appendix C. There were 129 online survey responses, which were supplemented by the results of the activities at the pop-up events to inform the following results.

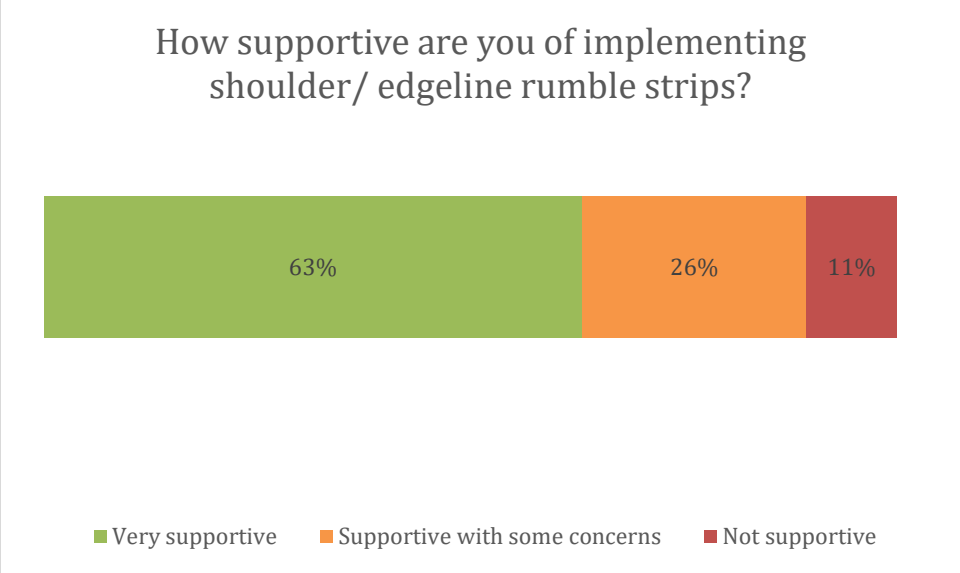
Proposed Safety Solutions

For each of the proposed safety solutions, participants indicated their level of support for implementation within Boulder County and had the opportunity to share any concerns about the safety solution.

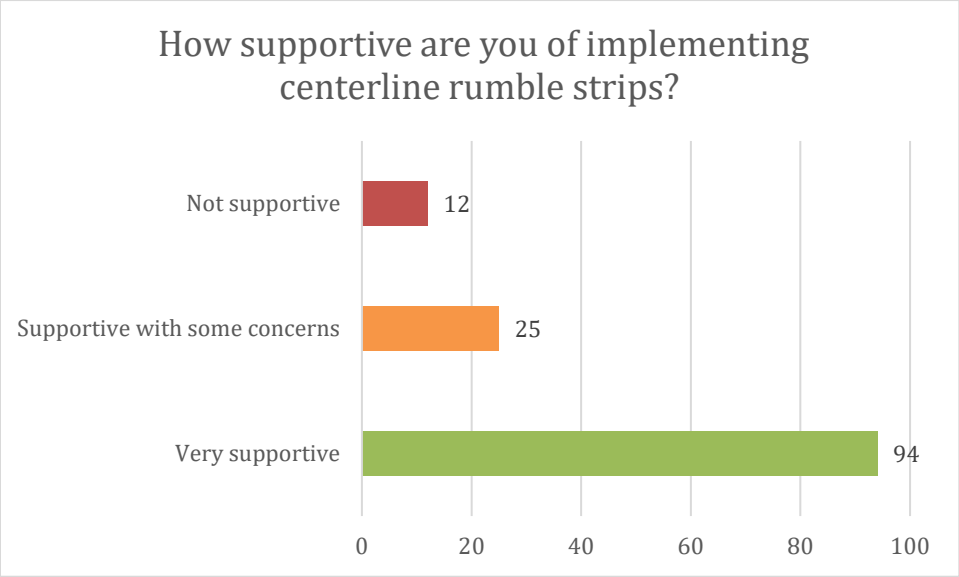
Rumble Strips

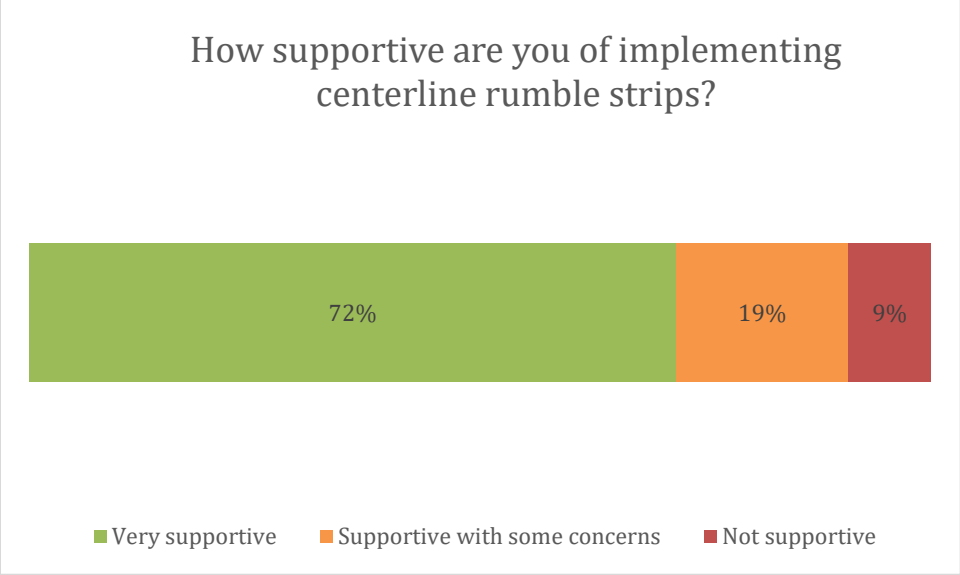
Shoulder/ Edgeline Rumble Strips





Centerline Rumble Strips

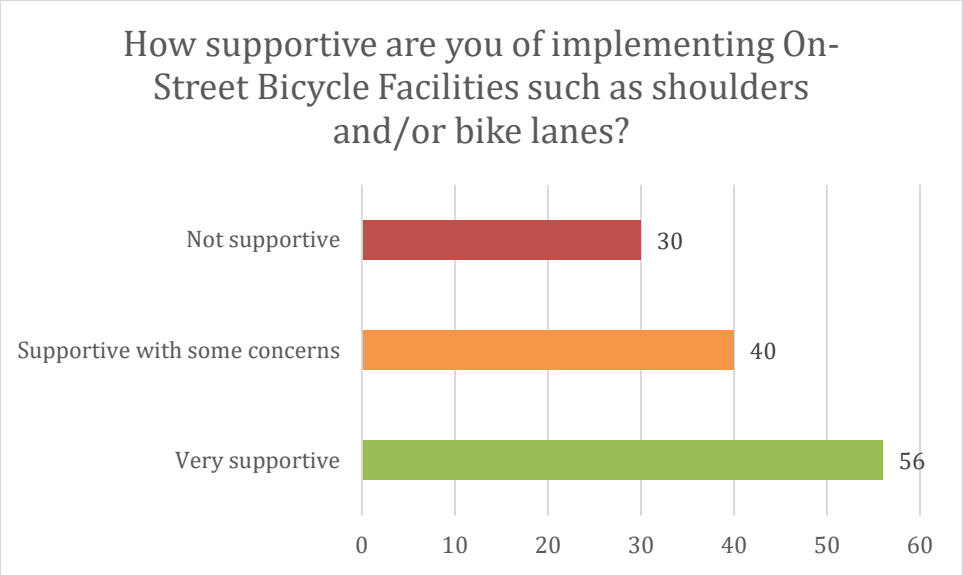


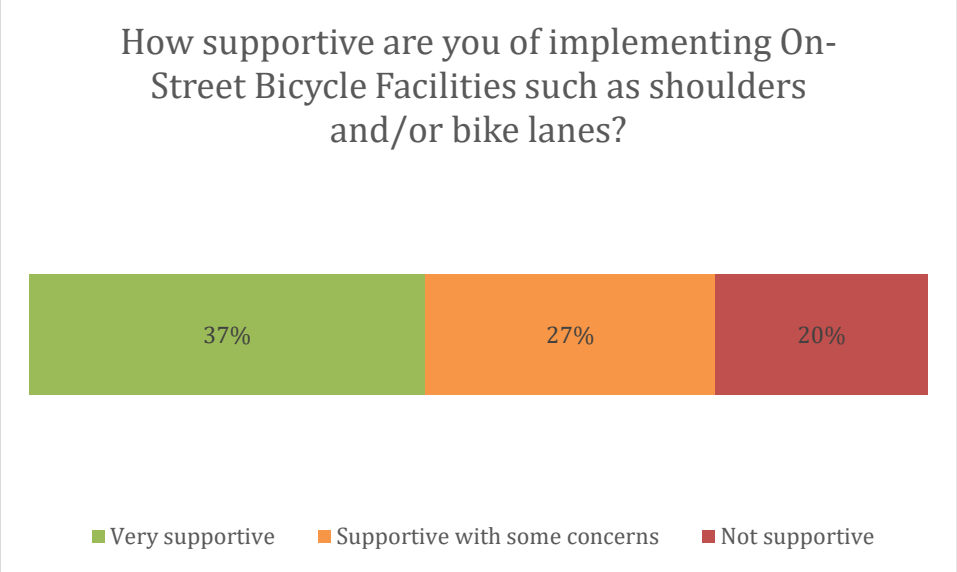


Of the 47 open-ended responses, many focused on concerns about bike safety when rumble strips are installed. Many of these concerns were related to cutting down the size of bike lanes and shoulders, and concerns about bikers accidentally running over rumble strips. Responses also highlighted only installing rumbles strips on high-volume roads, such as US 36 and Lee Hill Rd. Based on the concerns shared regarding the safety of cyclists in relation to the installation of rumble strips, implementation of this countermeasure should be prioritized on locations with non-shoulder bicycle facilities and paired with education about how to navigate rumple strips as a bicyclist.

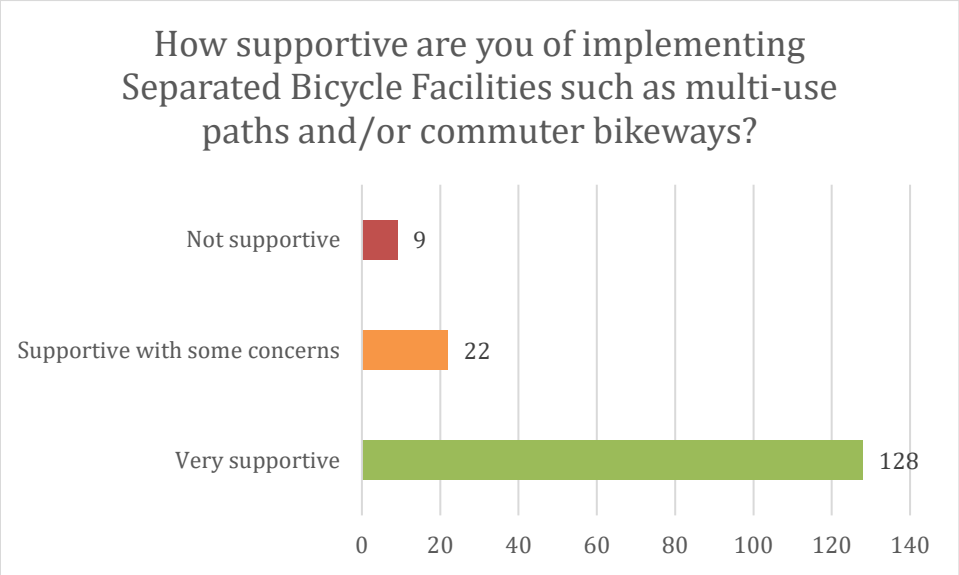
Bicycle Safety Improvements

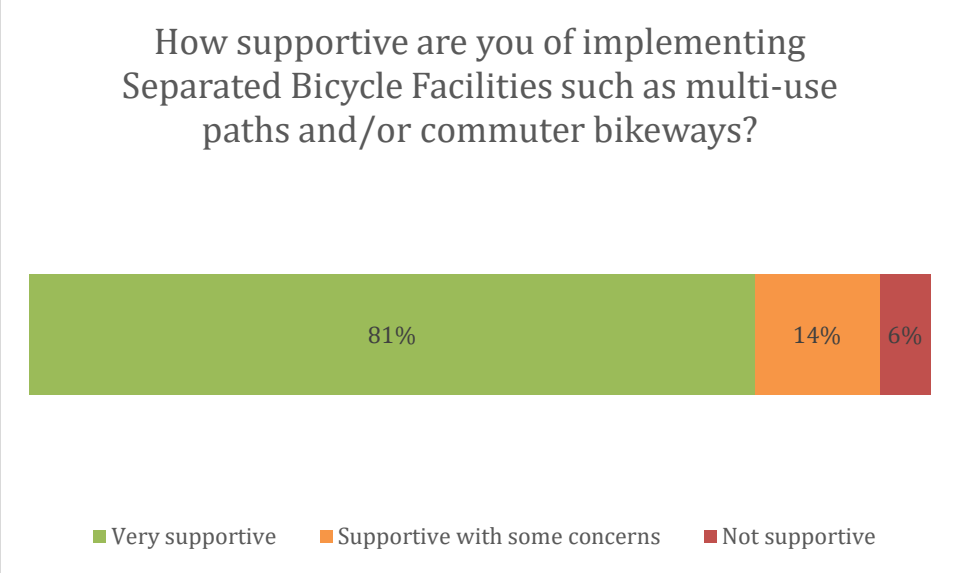
On-Street Bicycle Facilities





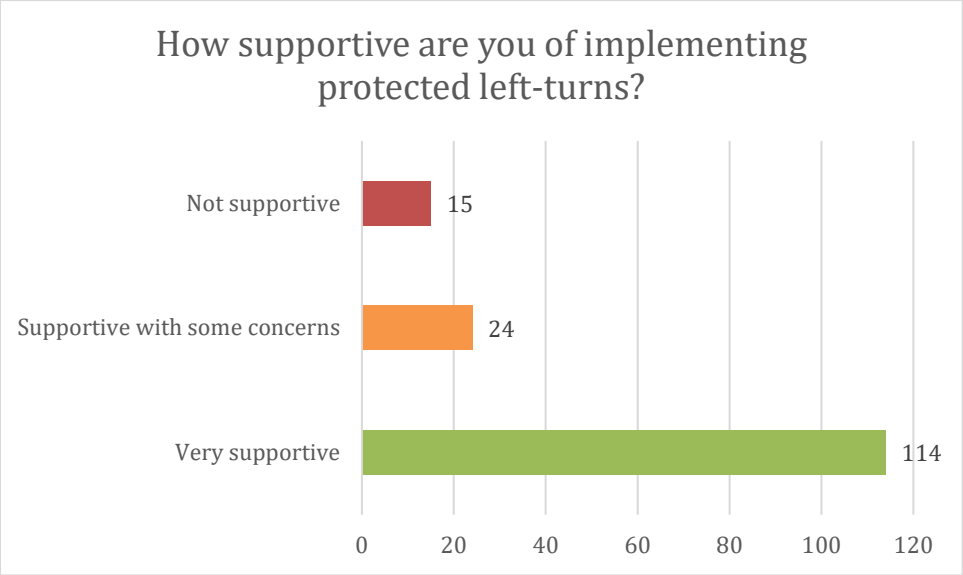
Separated Bicycle Facilities

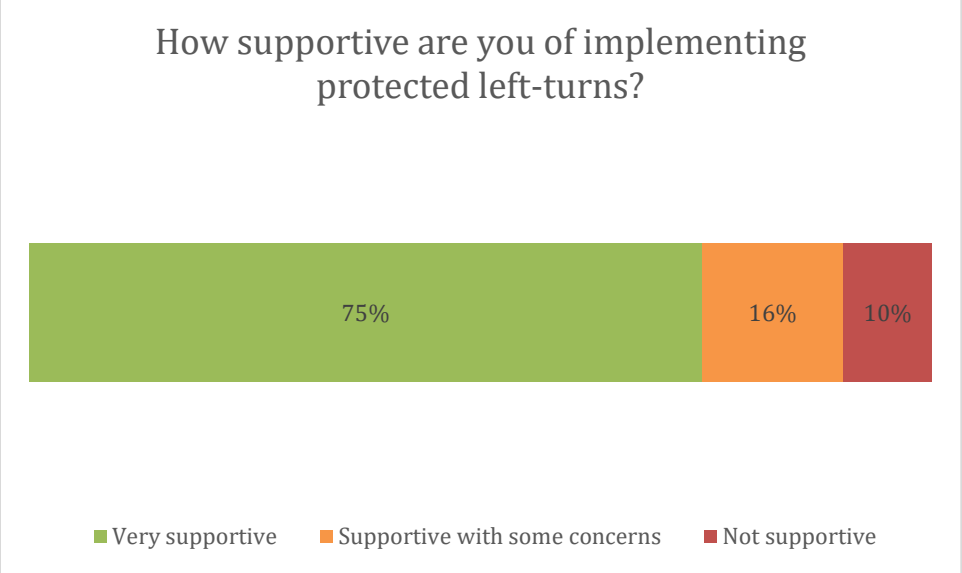




Of the 75 open-ended responses, many focused on concerns about the impacts to vehicle lanes with the implementation of bicycle safety measures. Many of these concerns were related to cutting down the size and amount of vehicle lanes and traffic flow issues that arise with smaller and fewer lanes. Responses also highlighted concerns about the visual clutter of on-street facilities (particularly those with flexible delineators) and how they impact both biker safety and vehicle safety. In general, responses were more supportive of separated, bicycle-only facilities rather than on-street facilities. Based on the concerns shared regarding the size and number of lanes available to cars as well as safety concerns with visual noise, implementation of this countermeasure should be paired with consideration for areas where bike safety measures do not impede the flow of traffic.

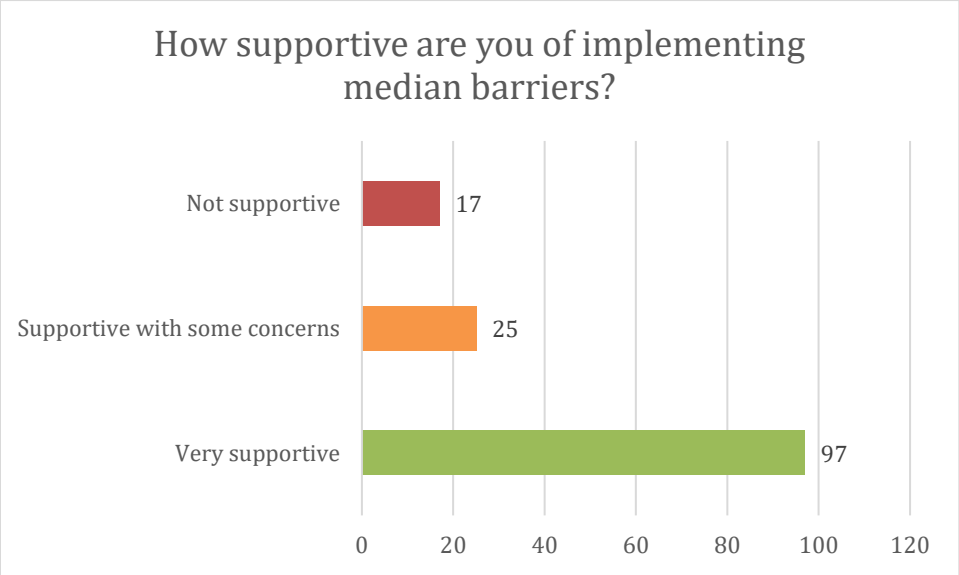
Protected Left-Turns

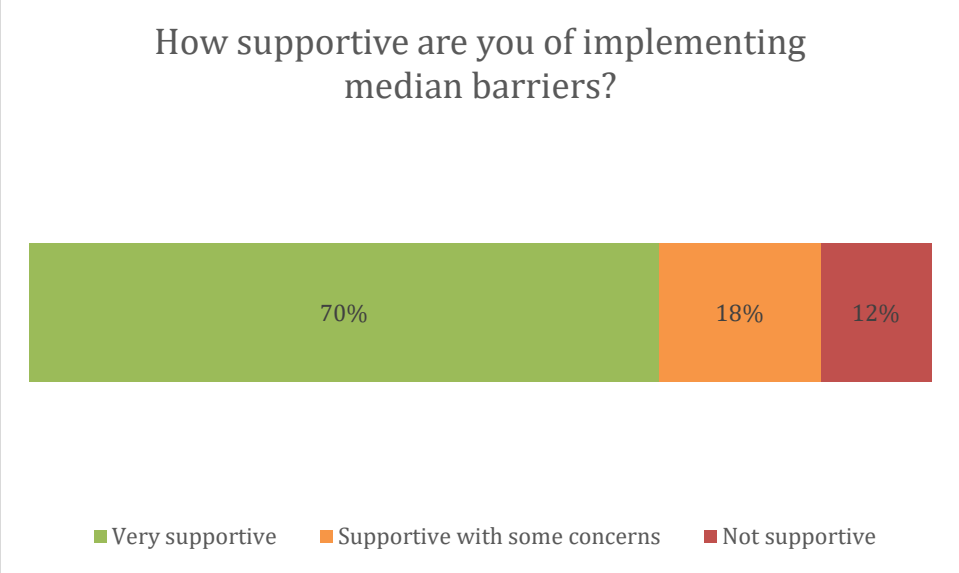




Of the 47 open-ended responses, many focused on concerns about traffic signals at intersections with protected left-turns, highlighting concerns about signal timing, flashing yellow lights, and drivers ignoring traffic signals. An additional subset of responses emphasized the implementation of protected left-turns only in areas of need. Additional concerns noted in the open-ended responses included concerns about bike and pedestrian safety, vehicle safety, traffic flow concerns, and the desire for increased police enforcement of traffic laws. Based on the concerns shared regarding the efficacy of traffic signals and impacts on drivers, bikers, and pedestrians by the community, implementation of this countermeasure should focus on maintaining existing traffic flow whenever possible while prioritizing collaboration with law enforcement to improve compliance with traffic signals.

Median Barriers

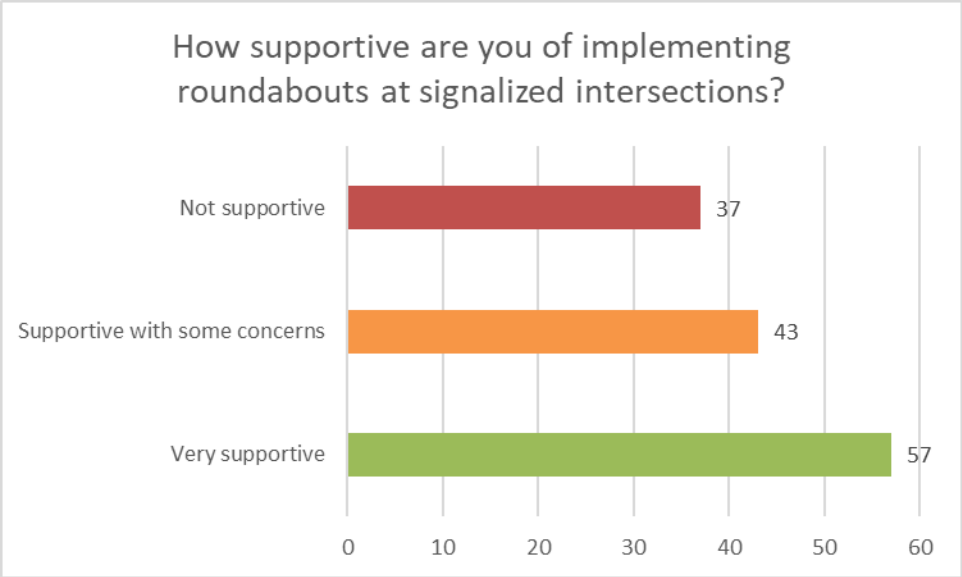


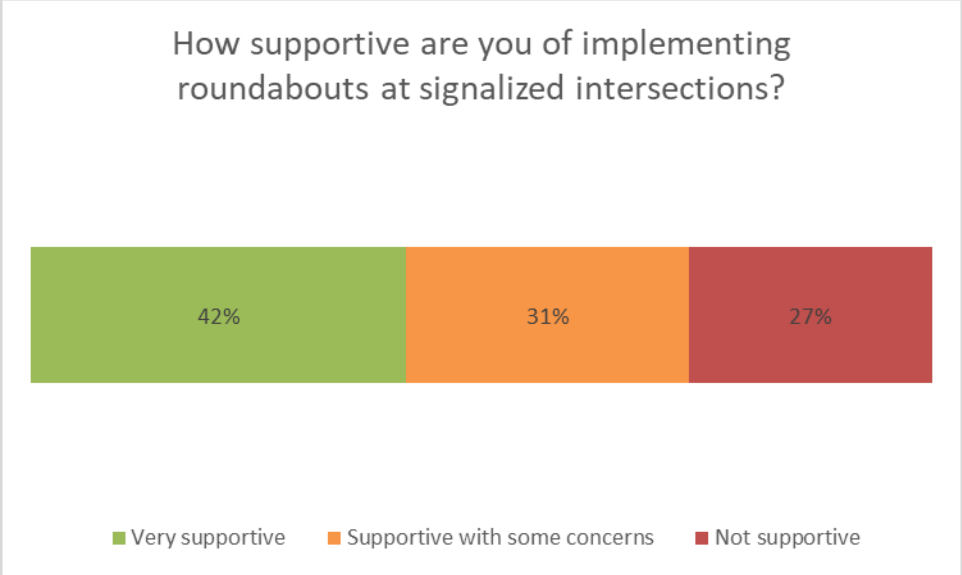


Of the 34 open-ended responses, many focused on concerns about the implementation of median barriers impacting the size of travel lanes. An additional subset of respondents were concerned with implementing median barriers in areas of need such as US 287, US 36, and Hwy 93. Based on the concerns shared regarding median barriers by the community, implementation of this countermeasure should focus on areas with high concentrations of prior accidents and where median barriers have the least impact on the size of travel lanes.

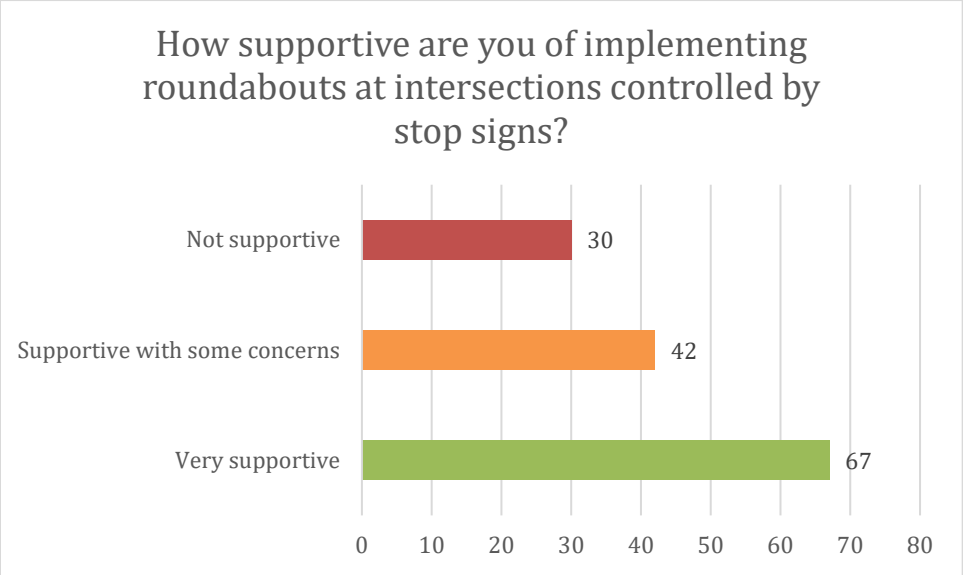
Roundabouts

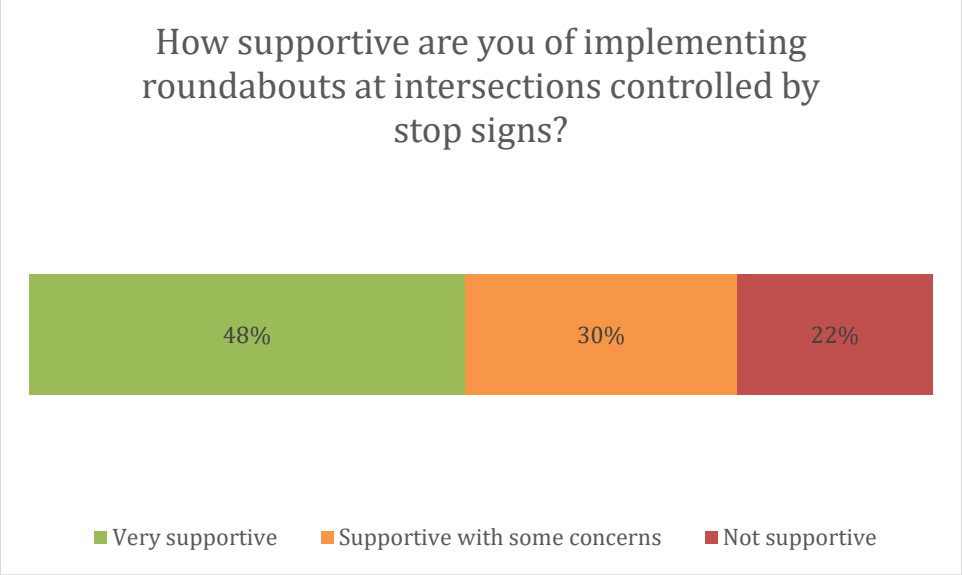
Roundabouts at Signalized Intersections





Roundabouts at Intersections Controlled by Stop Signs

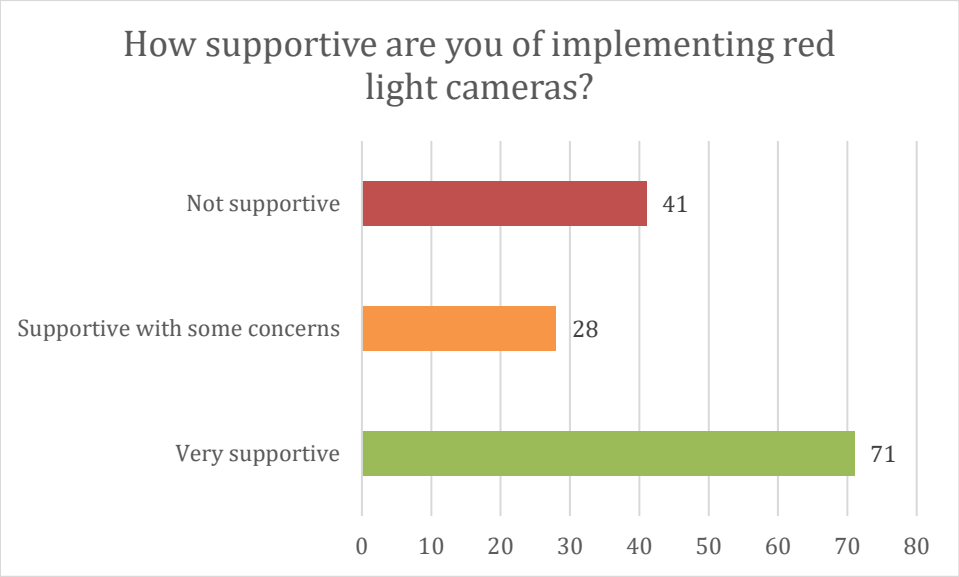


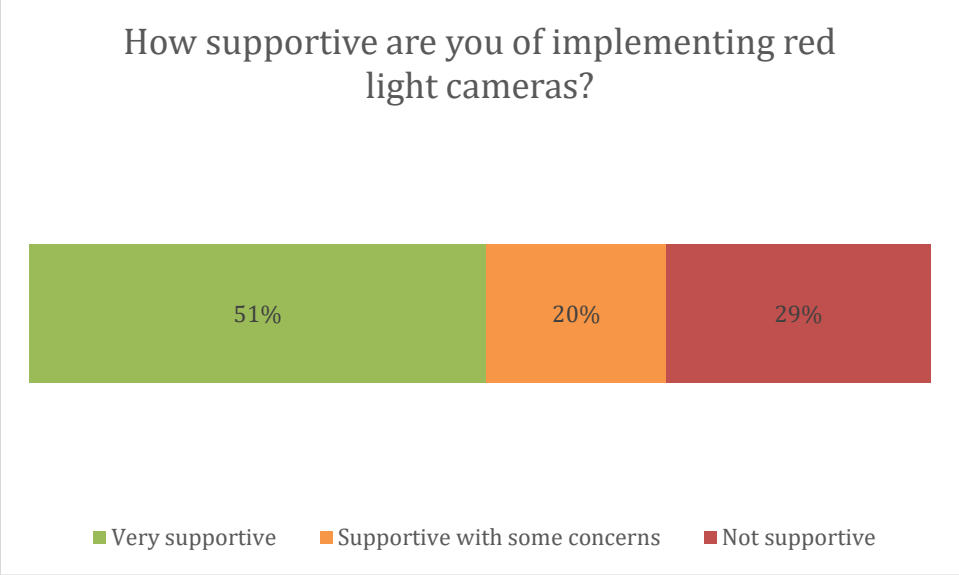


Of the 67 open-ended responses, the majority of responses focused on concerns about confusion about how these roundabouts work as well as calling for more public education on driving on roundabouts. Many of these concerns are related to drivers not understanding how to correctly navigate roundabouts, and traffic flow concerns. Additional concerns noted in the open-ended responses included how roundabouts may impact travel lane and intersection size. Based on concerns regarding roundabouts shared by the community, implementation of this countermeasure should be accompanied by educational outreach.

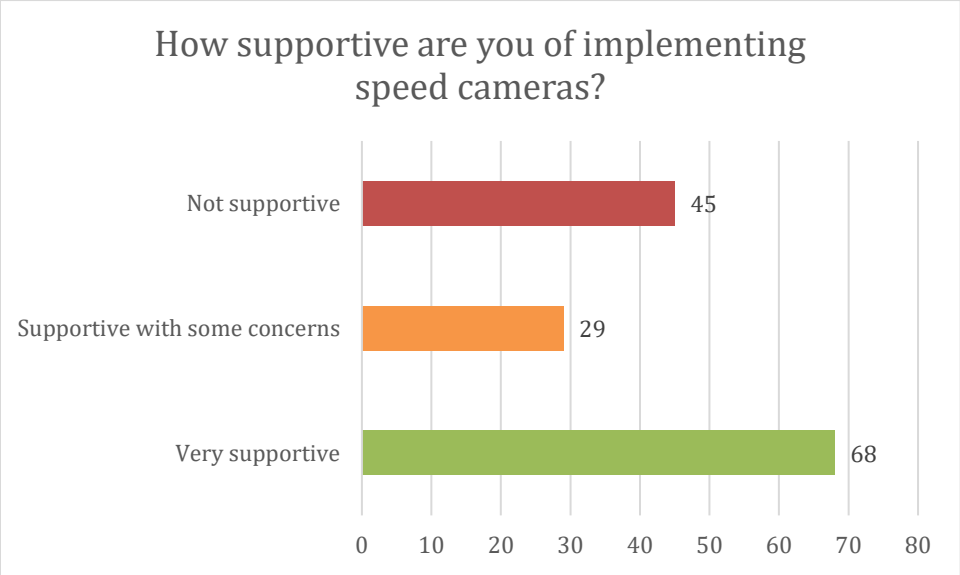
Red Light and Speed Cameras

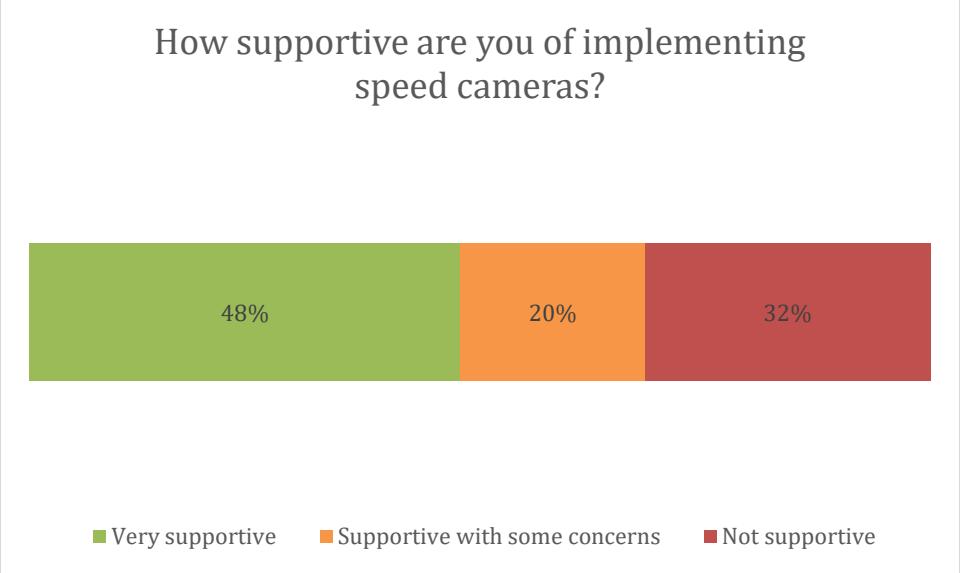
Red Light Cameras





Speed Cameras

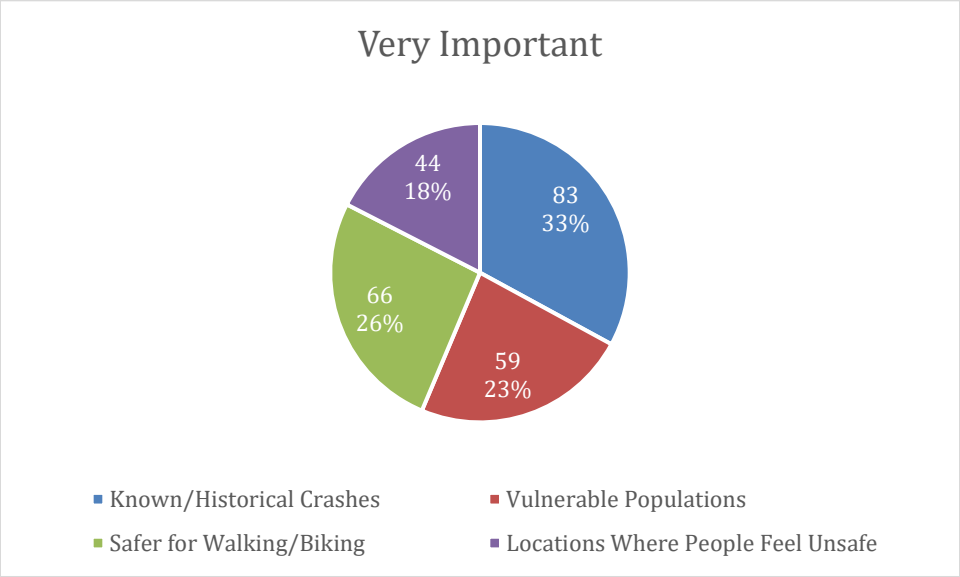




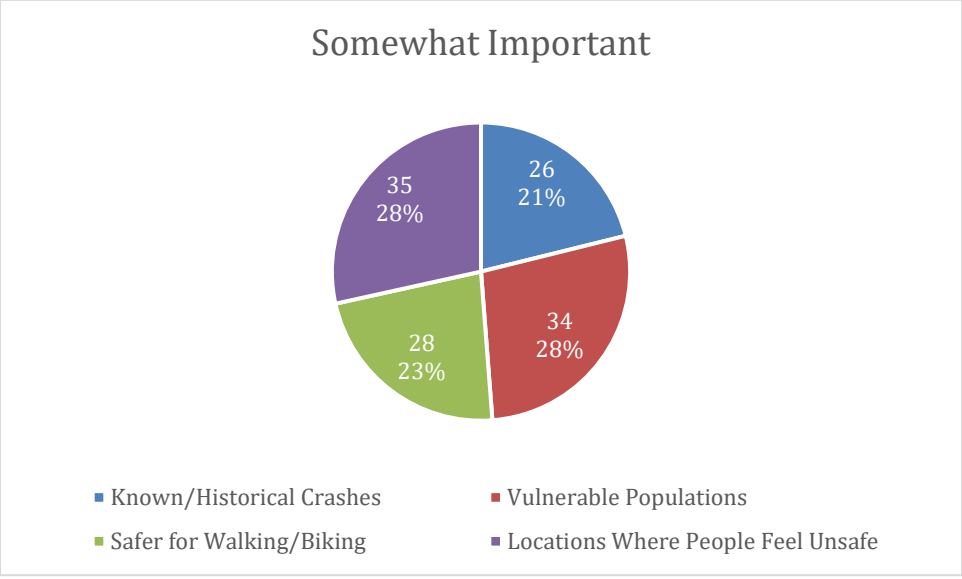
Of the 63 open-ended responses, many responses focused on concerns about technical errors associated with red light and speed cameras as well as calling for increased police enforcement as an alternative. Several responses also highlighted concerns about inequities and conflicts with for profit law enforcement, noting that higher income residents in the community have no problem paying tickets but lower income residents may be more financially impacted by traffic tickets. Based on concerns regarding the implementation of red light and speed cameras shared by the community, implementation of this countermeasure should focus on ensuring the enforcement of traffic laws is equitable and errors associated with technology are minimal.

HIN Scoring Factors

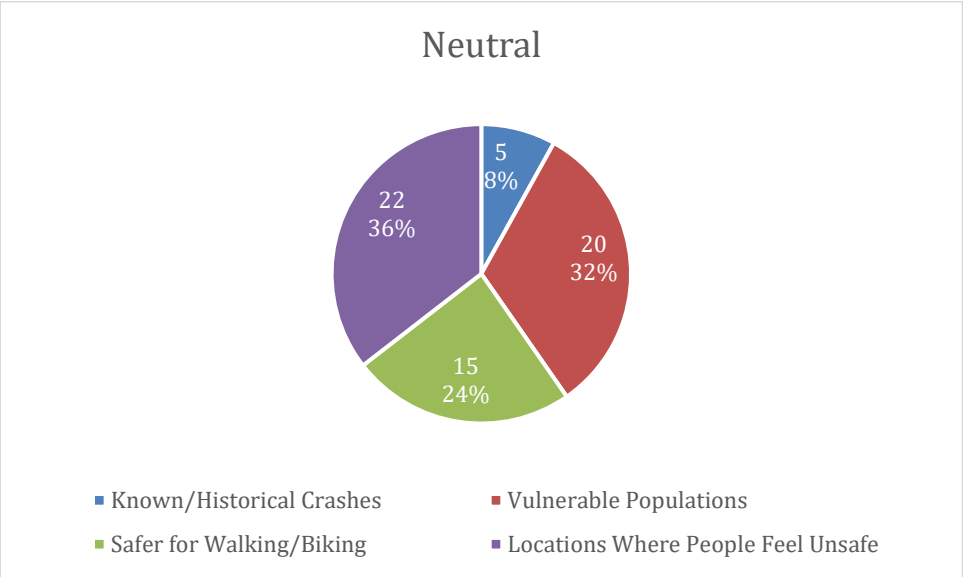
To inform scoring of the HIN, survey participants were asked to rank potential factors from highest to lowest priority.



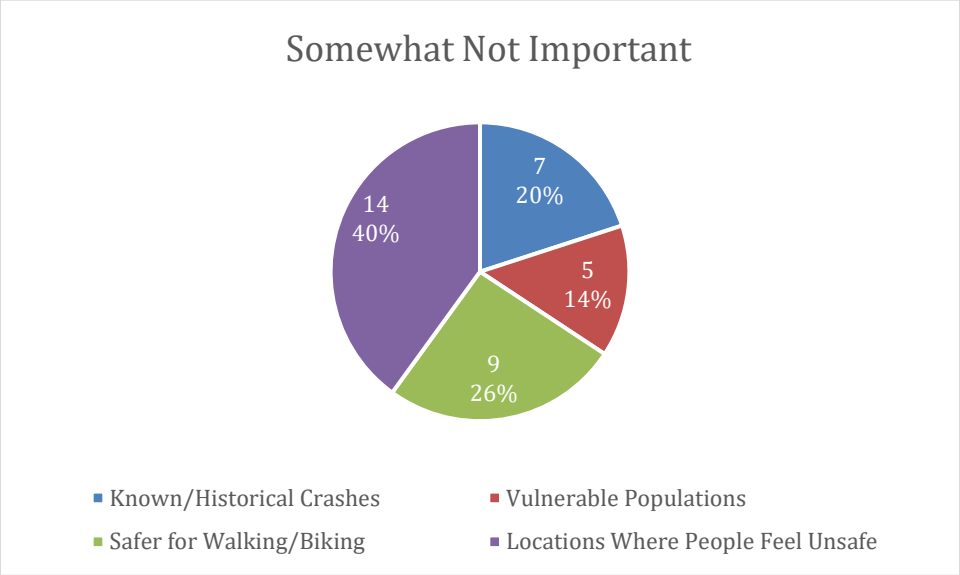
Most responses (33%) place areas of known/ historical crashes as a very important priority, while safer walking and biking infrastructure was another significant factor that participants placed as a very important priority (26%). The following lower priorities were vulnerable populations (23%) and locations that feel unsafe based on Summer 2024 community feedback (18%).



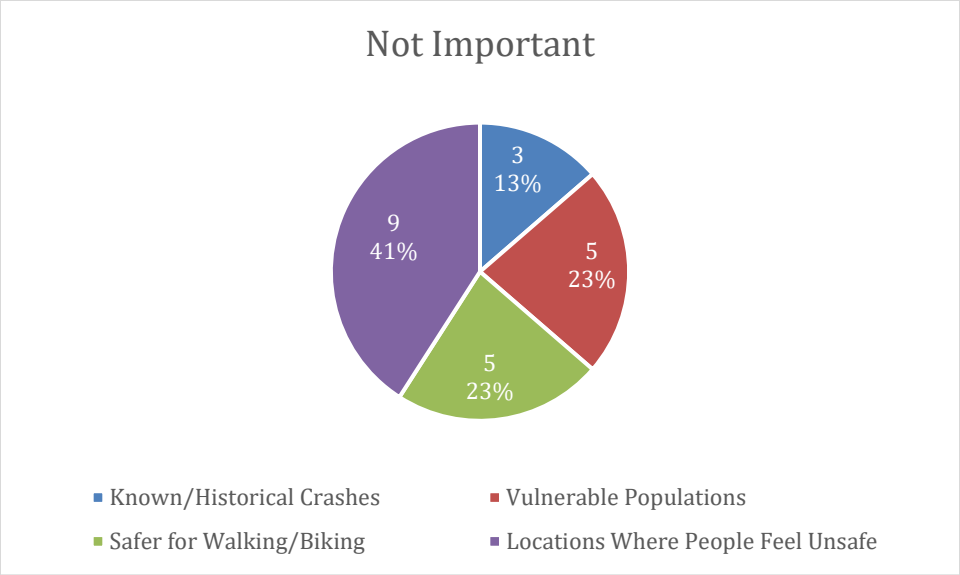
Responses indicated a somewhat important priority with nearly equal proportions: vulnerable populations (28%), locations that feel unsafe (28%), safer walking and biking infrastructure (23%), areas of known/ historical crashes (21%)



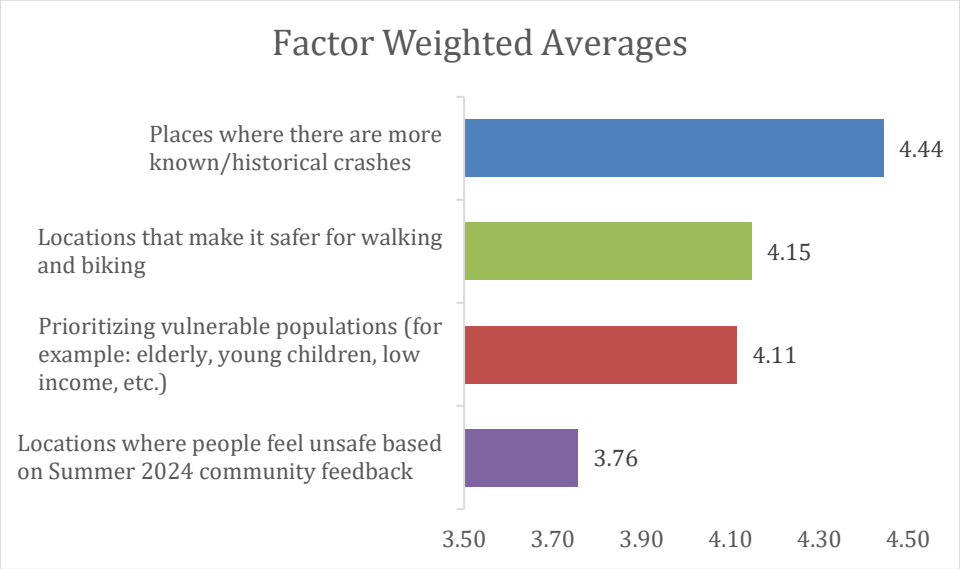
Most respondents (36%) identified locations that feel unsafe as a neutral priority. The remaining respondents identified vulnerable populations (32%), safer walking and biking infrastructure (24%), and sites of known/ historical crashes (8%) as other lower priorities.



When identifying somewhat not important priorities, most responses identified the locations that feel unsafe (40%) followed by making spaces safer for walking and biking (26%), known/ historical crashes (20%), and vulnerable populations (14%).



In person responses placed making locations that feel unsafe as their least important priority (41%) followed by making spaces safer for walking and biking (23%) and vulnerable populations (23%). Responses placed known/ historical crashes as their lowest priority (13%).



A weighted average was determined for each factor based on the number of responses in each level of importance, with "not important" associated with 1 and "very important" associated with 5. Known/ historical crashes received the highest weighted average, followed by walking and biking and vulnerable populations in close proximity to each other. Locations where people feel unsafe based on community feedback received the lowest weighted average. These results informed the weighting of factors when assigning scores to each HIN segment and intersection.

Open-Ended Responses

Finally, participants were invited to share any additional thoughts on safety countermeasures or HIN scoring. Many emphasized concerns about high vehicle speeds and reckless driving, particularly in residential areas and along rural roads. Several comments highlighted the need for better pedestrian and bicycle infrastructure, as well as improved traffic flow and lane design. Some respondents expressed skepticism about the effectiveness of traffic calming measures, while others voiced support for increased law enforcement and proactive maintenance. A few noted frustration with past planning efforts, stating that community input often feels overlooked. Several comments were related specifically to locations or practices within the City of Boulder, rather than Unincorporated Boulder County. Overall, the comments reflected a desire for balanced, data-driven safety solutions that also consider local context and lived experience.

Next Steps

Phase 2 outreach for the Boulder County Vision Zero Action Plan project solicited feedback from project stakeholders as well as over 200 in-person and virtual comments and survey responses from people who live, work, and travel through Boulder County. This feedback is invaluable for understanding support to ensure that solutions eliminate fatal and serious crashes in Boulder County. The project team will use the Phase 2 outreach results to refine strategies and actions developed within the Vision Zero Action Plan, which will be available for public review in spring 2025.

Appendices

Appendix A: Steering Committee Meeting Materials

Boulder County, Lafayette, and Superior

VISION ZERO ACTION PLANS

Steering Committee Meeting # 2

October 30, 2024

Introductions

- Name
- Organization (if applicable)
- Where do you live?

Goals of Meeting

1. **Review Project Background & Schedule**
2. **Discuss Where We've Been**
   - Phase 1 Community Outreach
   - Safety Analysis
3. **Discuss Where We're Going**
   - Working Towards the Action Plan
   - Next Steps





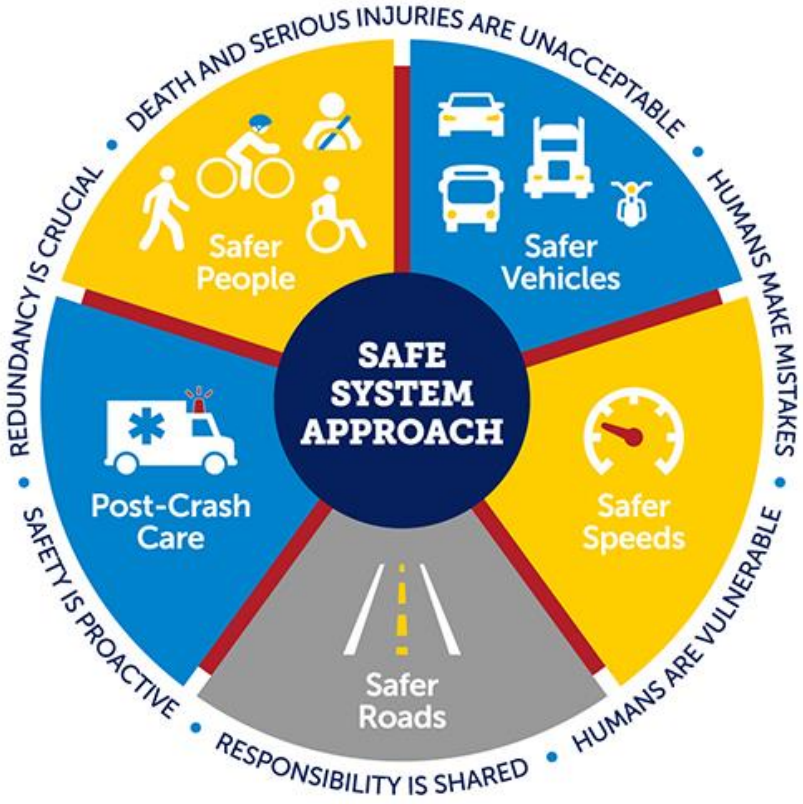
Project Background

Vision Zero & Safe System Approach

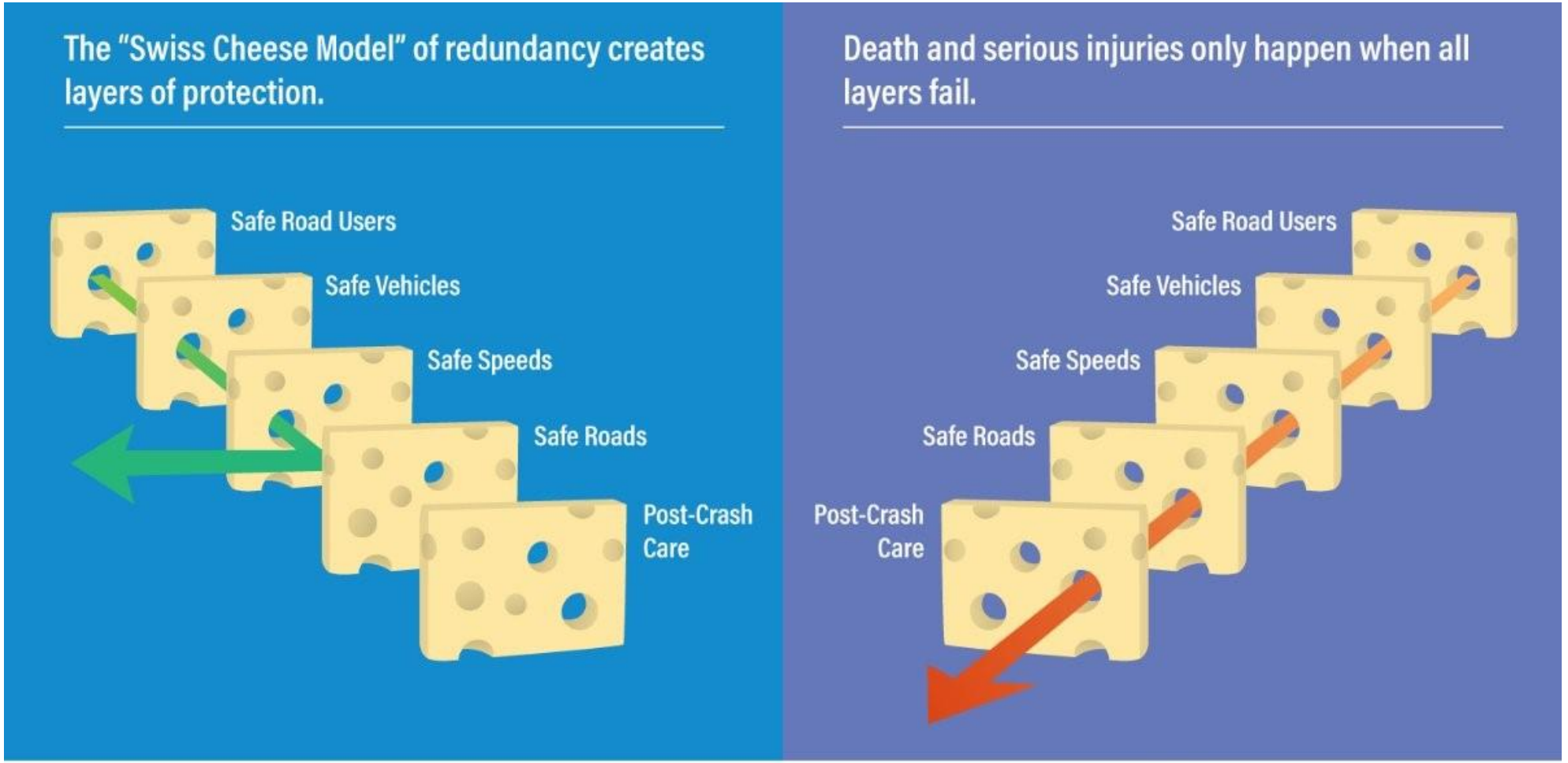
Goal: Eliminate all traffic fatalities and serious injury crashes

TRADITIONAL APPROACH		VISION ZERO
Traffic deaths are **INEVITABLE**		Traffic deaths are **PREVENTABLE**
PERFECT human behaviour	VS	Integrate **HUMAN FAILING** in approach
Prevent **COLLISIONS**		Prevent **FATAL AND SEVERE CRASHES**
INDIVIDUAL responsibility		**SYSTEMS** approach
Saving lives is **EXPENSIVE**		Saving lives is **NOT EXPENSIVE**

Source: Vision Zero Network



Vision Zero & Safe System Approach



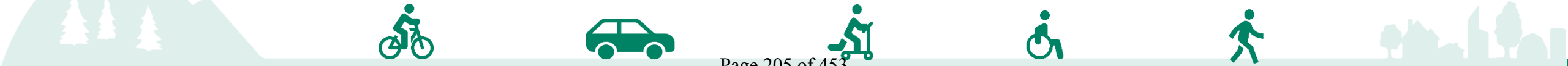
The Safe System Approach

CAMBRIDGE SYSTEMATICS

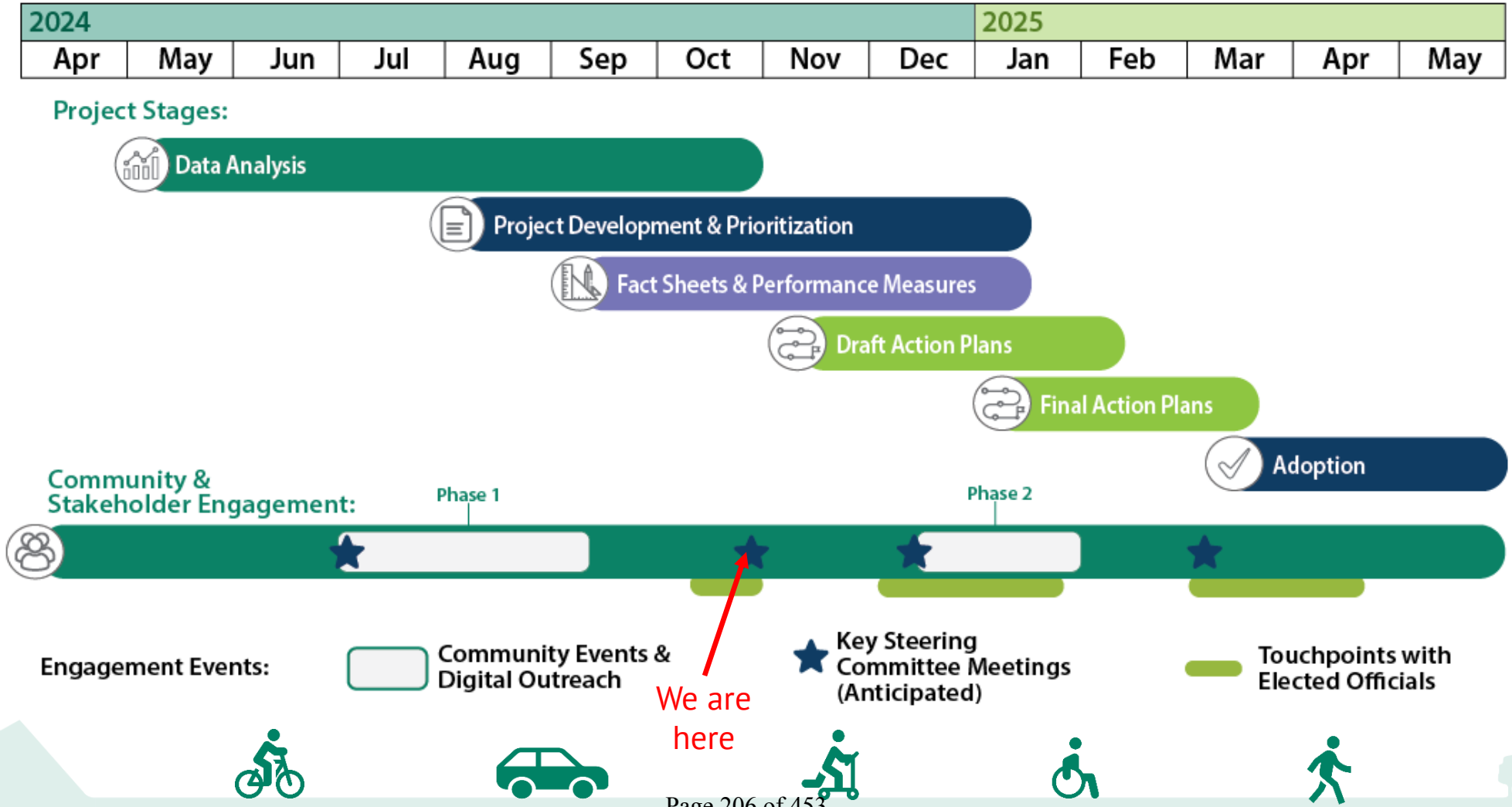
GHSA Governors Highway Safety Association

Action Plan Development

- Deliver three standalone Vision Zero Action Plans:
  1. **Boulder County** – includes unincorporated, State Highways, Jamestown, Nederland, and Ward
  2. **City of Lafayette**
  3. **Town of Superior**
- Create list of specific actions, noting responsibility and potential funding sources for implementation.

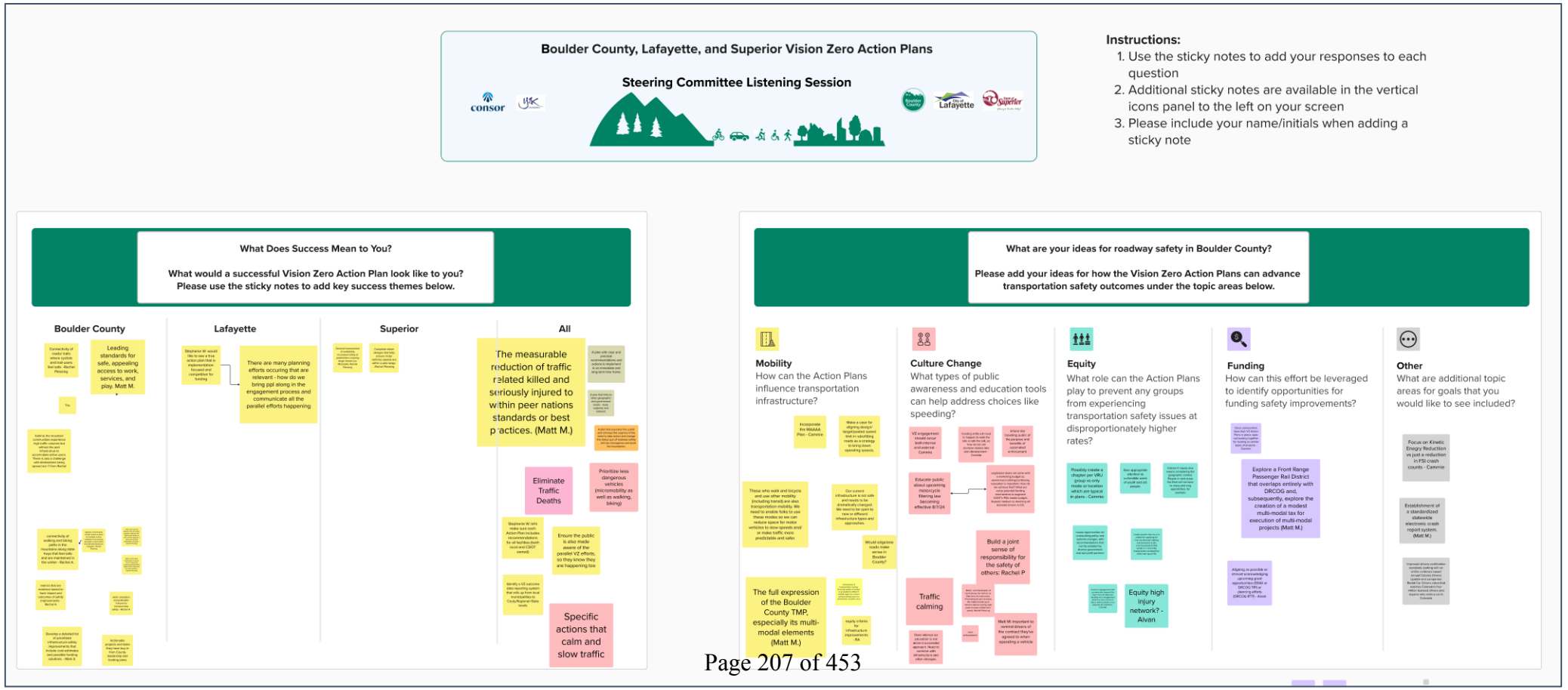


Schedule


2024
2025
Apr
May
Jun
Jul
Aug
Sep
Oct
Nov
Dec
Jan
Feb
Mar
Apr
May
Project Stages:
Data Analysis
Project Development & Prioritization
Fact Sheets & Performance Measures
Draft Action Plans
Final Action Plans
Adoption
Community & Stakeholder Engagement:
Phase 1
Phase 2
Engagement Events:
Community Events & Digital Outreach
Key Steering Committee Meetings (Anticipated)
Touchpoints with Elected Officials
We are here

What We Covered at the June Meeting

- Project Background
- Promotion of Phase 1 Outreach
- Listening Session



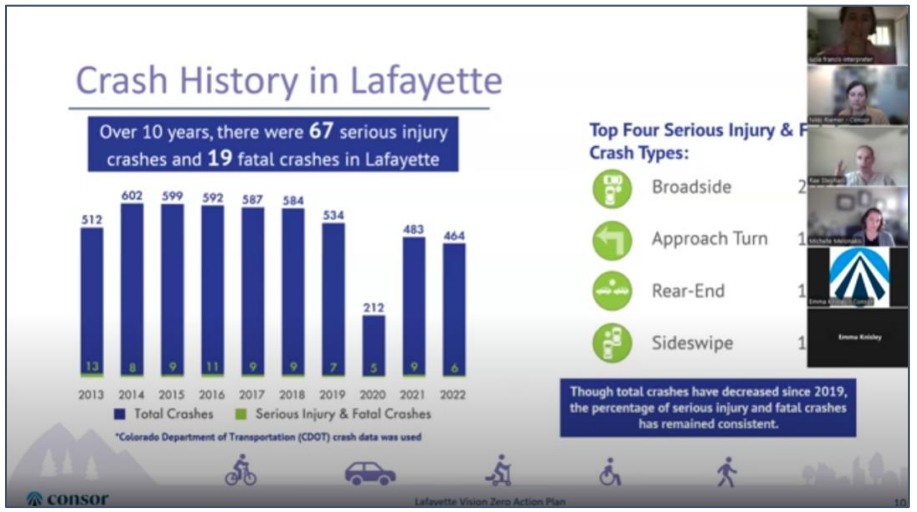
Where We've Been: Phase 1 Community Outreach

How We Collected Input for Each Partner

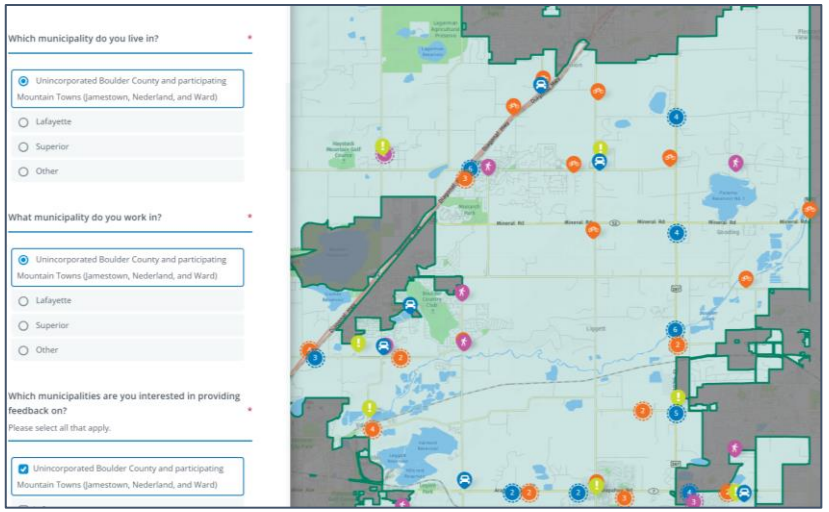
July and August 2024

In-person Pop-up Events

Virtual Public Meetings



Online Input Map & Survey



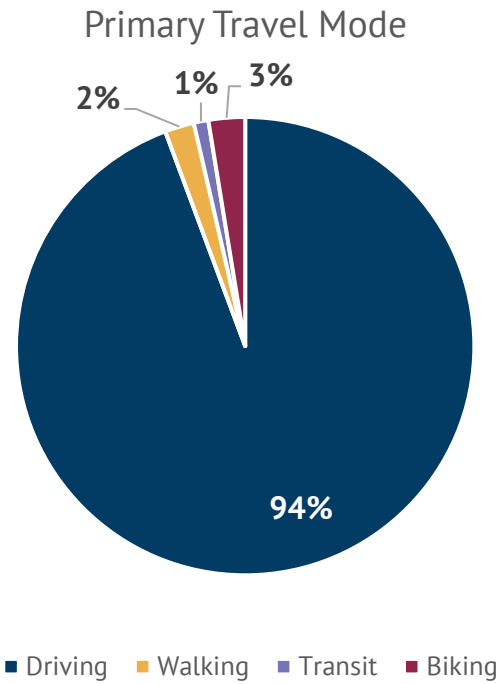
Summary of What We Heard

Online Survey Responses

Boulder County	Lafayette	Superior
196 survey responses 309 map pins	378 survey responses 463 map pins	78 survey responses 83 map pins

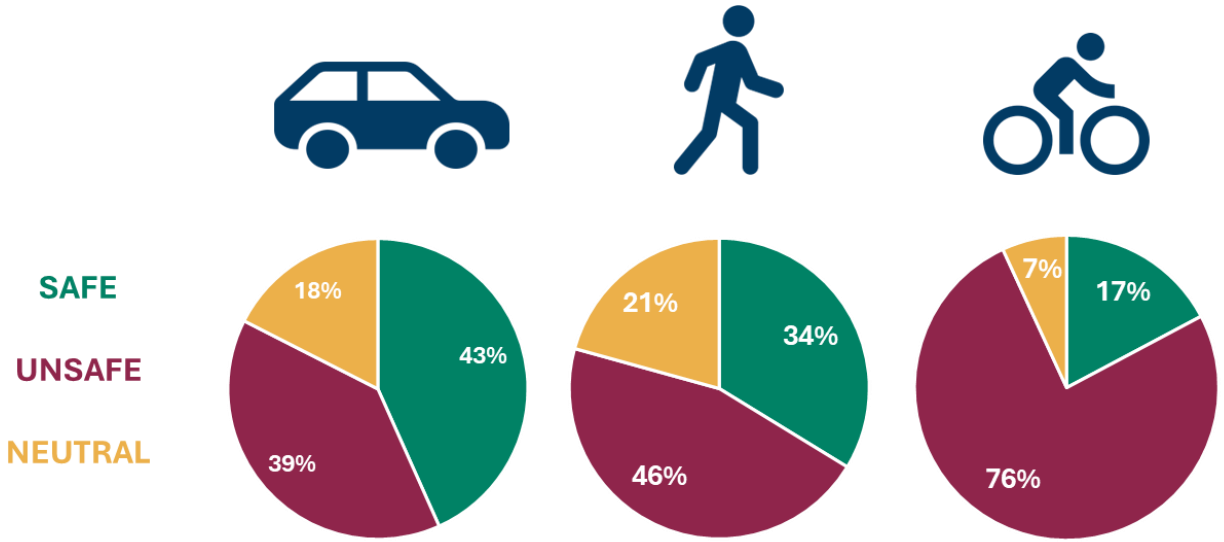
What We Heard: Boulder County & Mountain Towns

- 196 survey responses
- Majority (62%) of survey respondents live in Unincorporated Boulder County and Mountain Towns



What We Heard: Boulder County

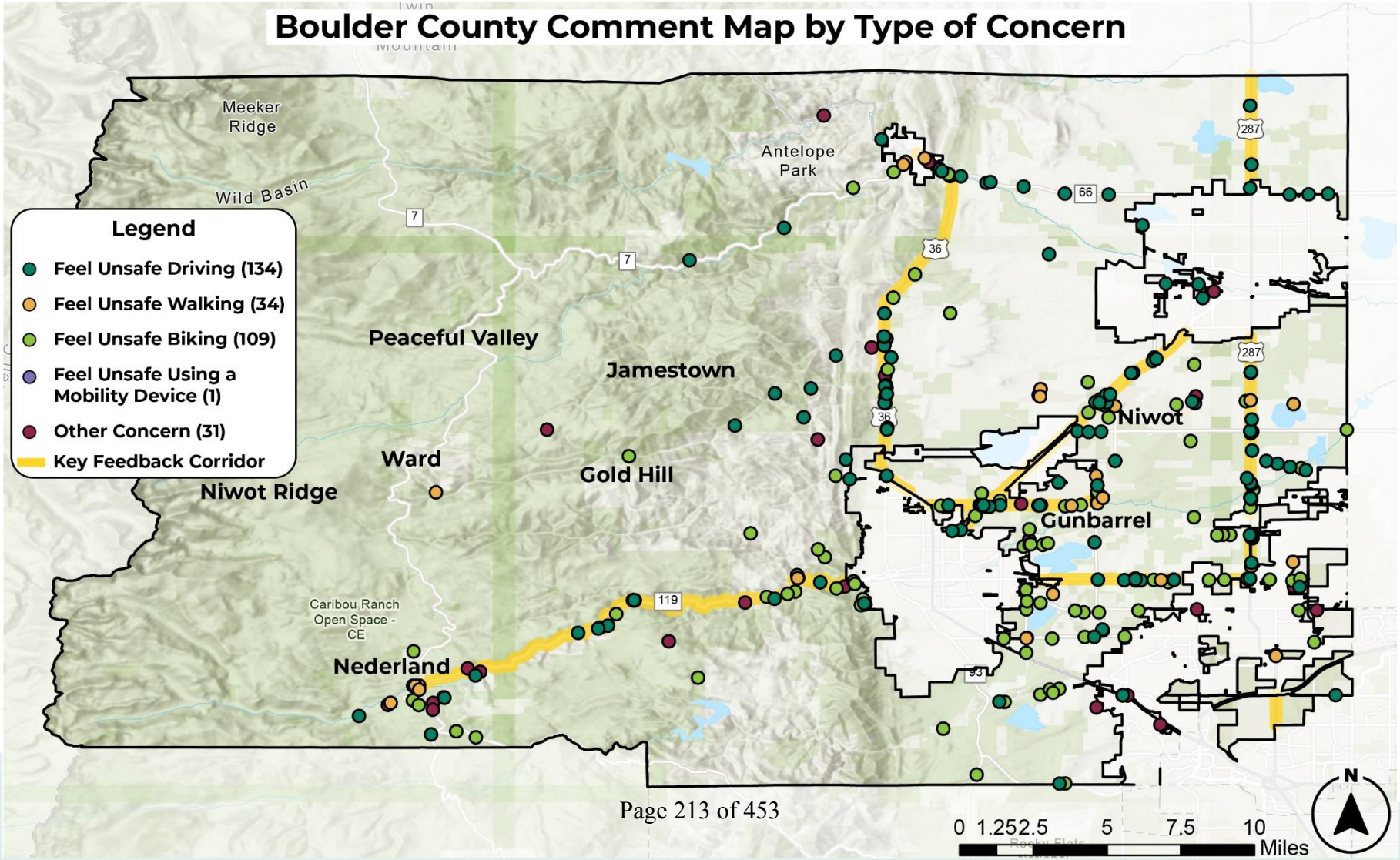
How safe do you feel traveling in Boulder County?



**The number of responding reporting to use transit or a mobility device is not significant enough to draw conclusions about the perceived safety of those modes.*

Respondents or someone they know involved in a crash in unincorporated Boulder County in past five years: **31%**

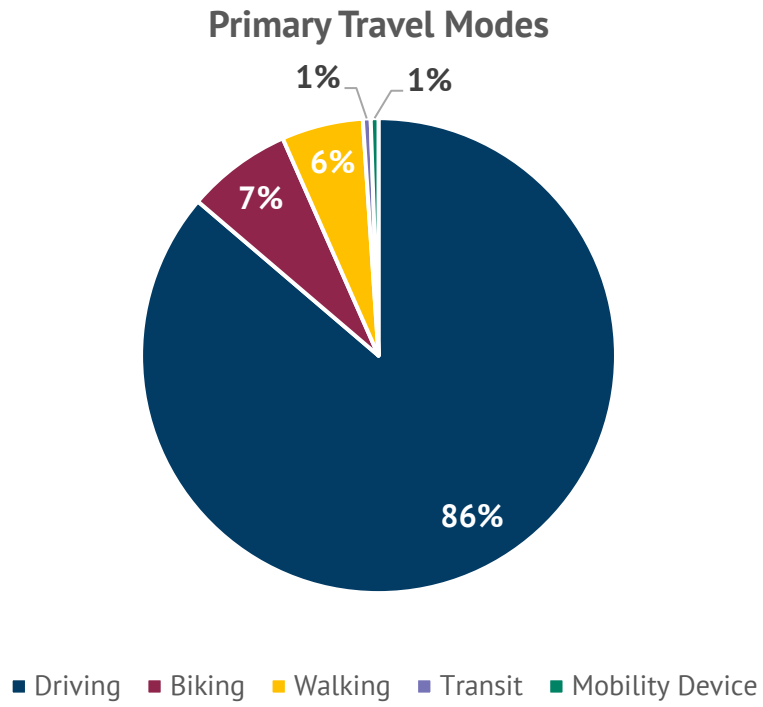
What We Heard: Boulder County (309 pins)



consor

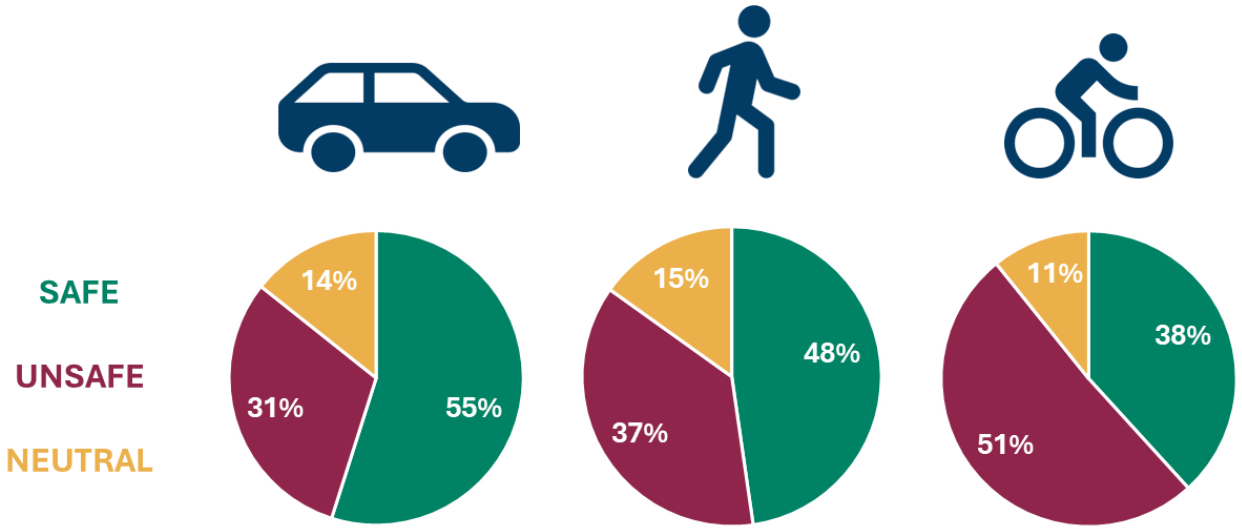
What We Heard: Lafayette

- 378 survey responses
- 463 map pins
- Majority (76%) of survey respondents live in Lafayette



What We Heard: Lafayette

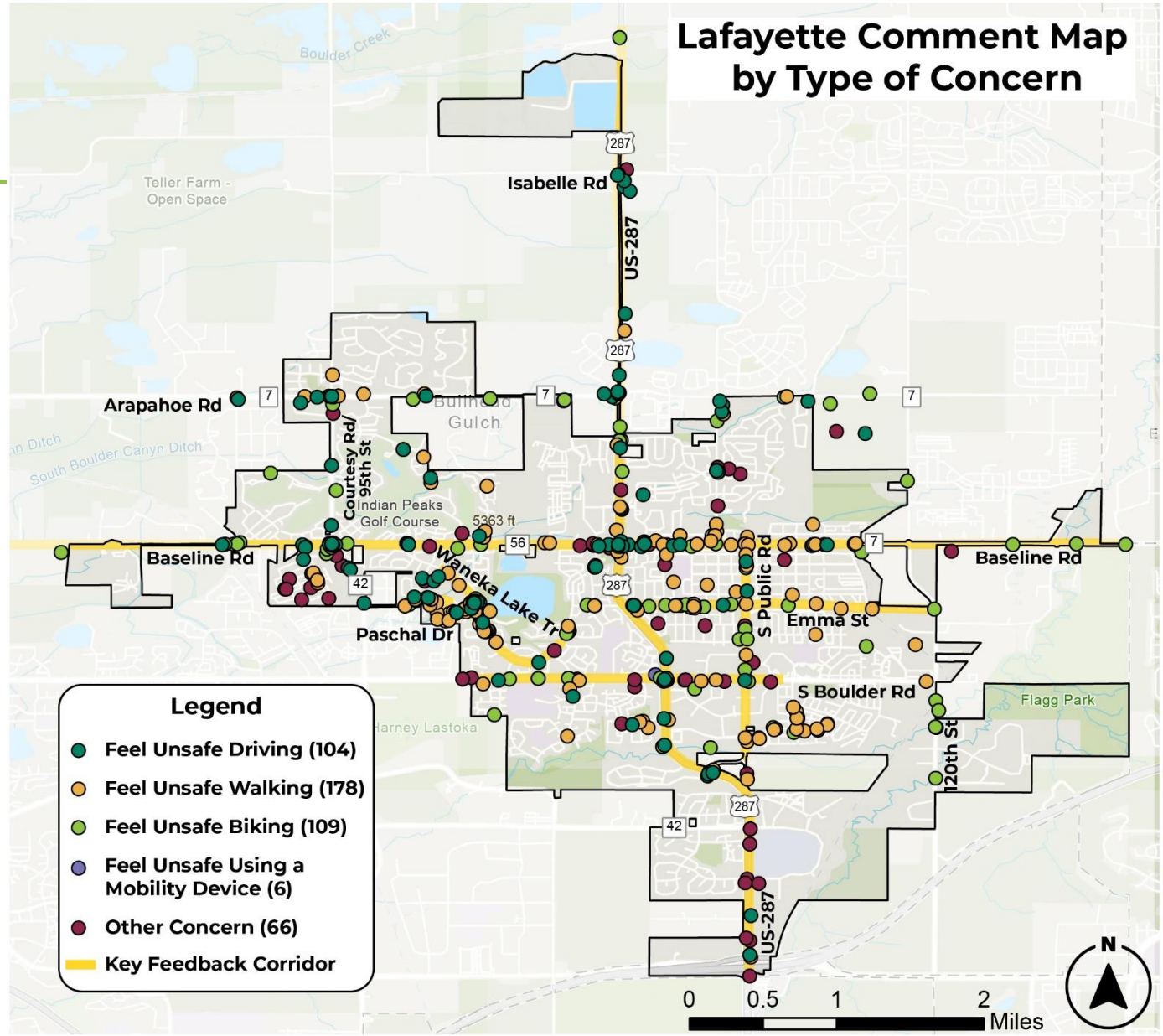
How safe do you feel traveling in Lafayette?



Respondents or someone they know involved in a crash in Lafayette in past five years: **22%**

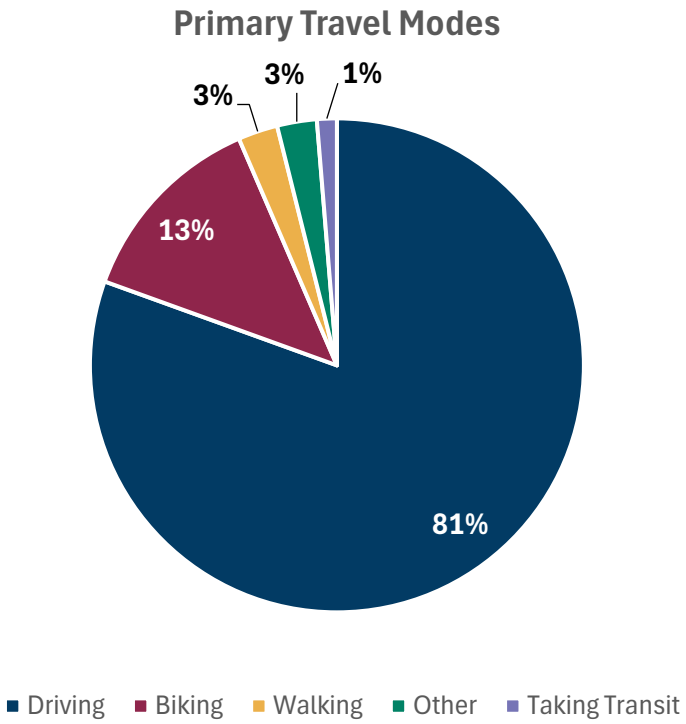
**The number of responding reporting to use transit or a mobility device is not significant enough to draw conclusions about the perceived safety of those modes.*

What We Heard: Lafayette (463 pins)



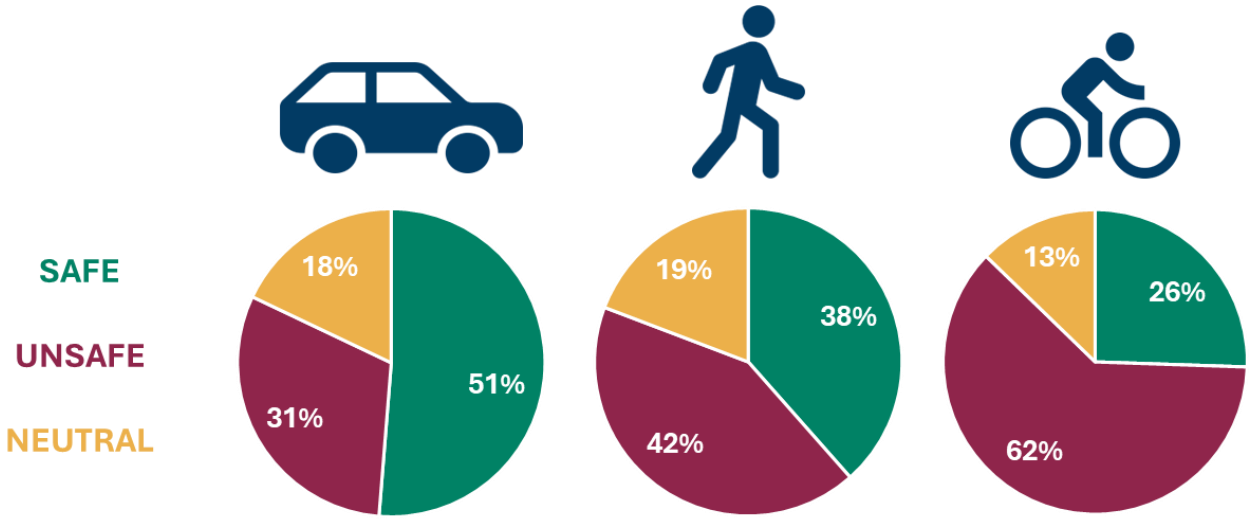
What We Heard: Superior

- 78 of survey responses
- 83 map pins
- 29% of survey respondents live in Superior while most respondents (67%) live elsewhere in Boulder County or in Lafayette.



What We Heard: Superior

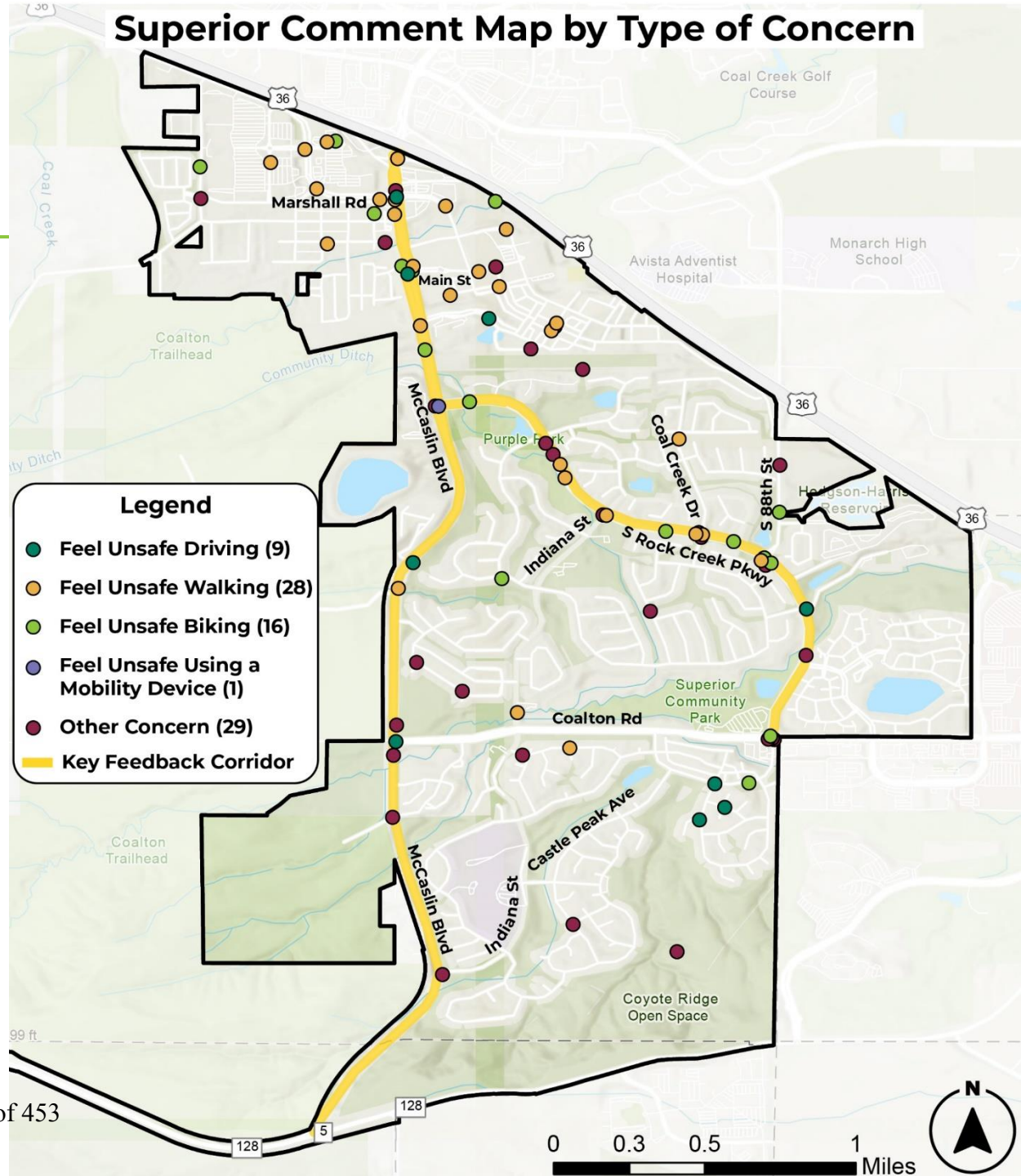
How safe do you feel traveling in Superior?



Respondents or someone they know involved in a crash in Superior in past five years: **7%**

**The number of responding reporting to use transit or a mobility device is not significant enough to draw conclusions about the perceived safety of those modes.*

What We Heard: Superior (83 pins)



Questions?

Where We've Been: Safety Analysis

Safety Analysis Process

- Detailed analysis for Unincorporated Boulder County & the Mountain Towns, Lafayette, & Superior
- Analyzed 10 years of CDOT crash data (January 2013 to December 2022)

HIN & HRN: What's the Difference?

High Injury Network

Addressing Crashes Today

Identifies locations where the top injury crashes are occurring based on historical crash data

High Risk Network

Preventing Crashes Tomorrow

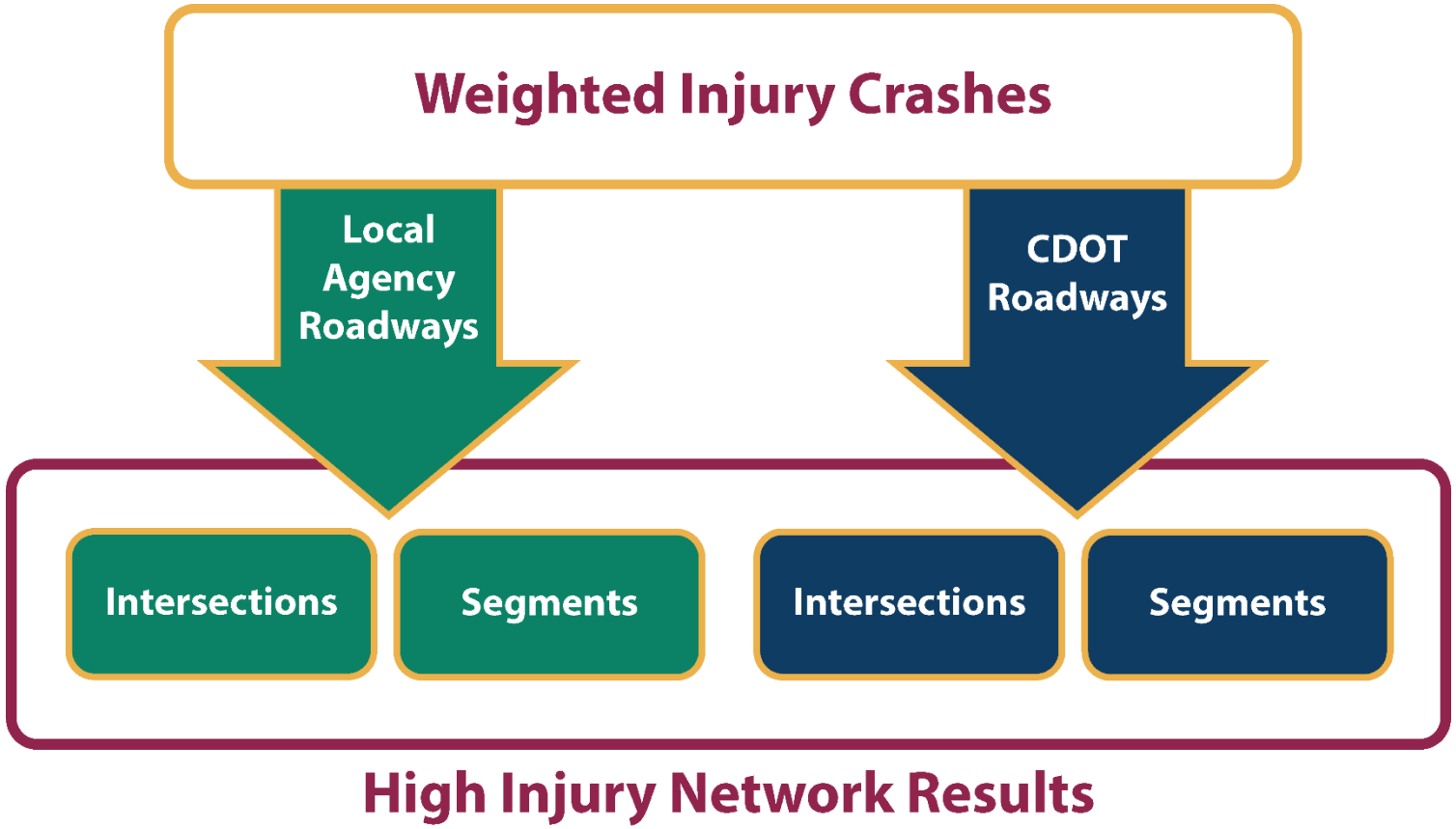
Identifies locations where there is high risk for potential crashes based on roadway characteristics





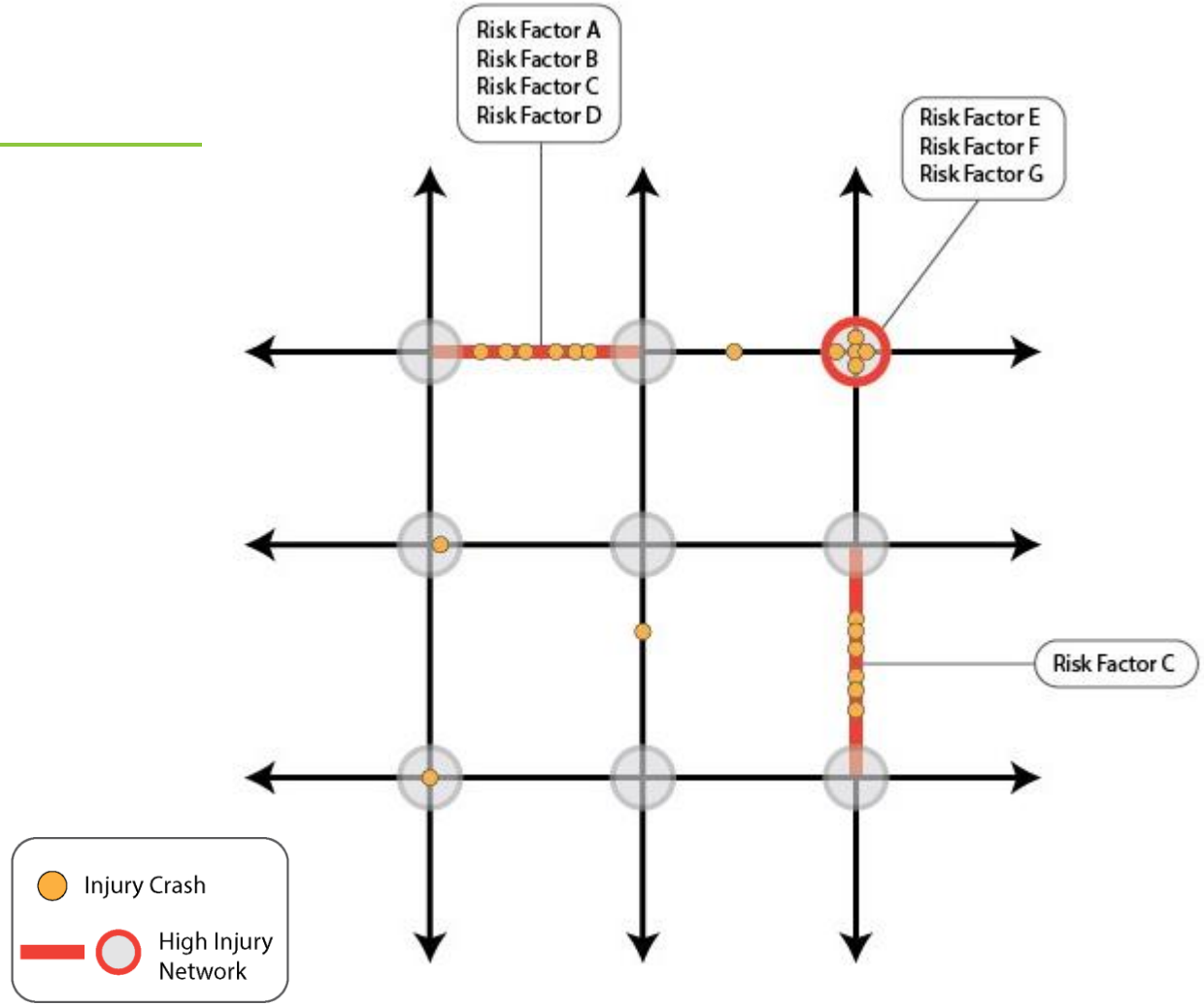
HIN Process

- Serious and fatal injury crashes weighted higher than minor injury crashes
- Local Agency roadways were analyzed separately from CDOT roadways to account for the higher number of crashes and different crash trends on DOT roadways.



HRN Process

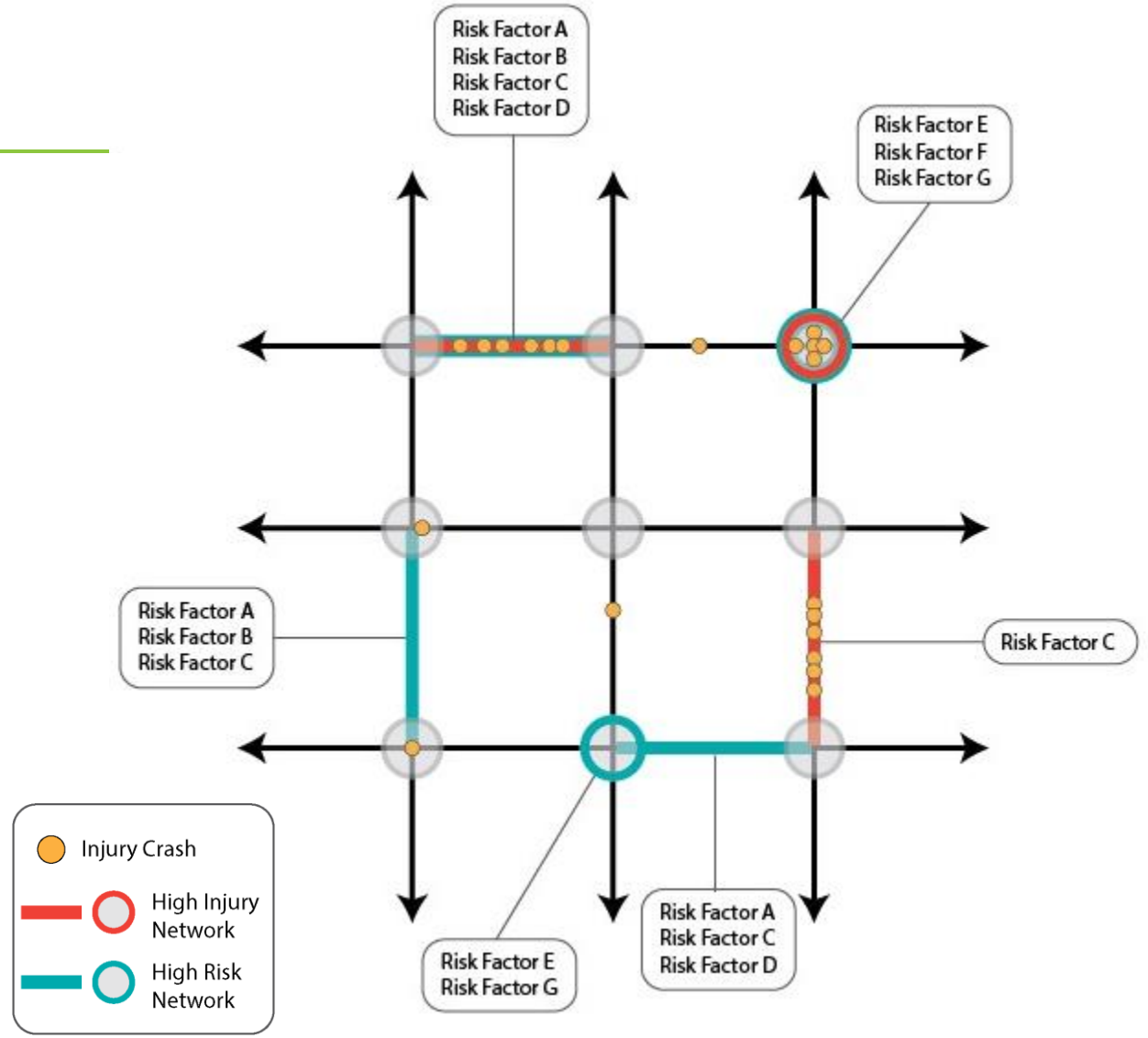
- Identified common roadway characteristics of the serious injury, fatal, and vulnerable user crashes to select risk factors



HRN Process

Example Risk Factors:

- Number of travel lanes
- Speed limit
- Roadway classification
- Intersection control
- Presence of sidewalks
- Presence of bicycle facility
- Proximity to school
- Land use
- And more….



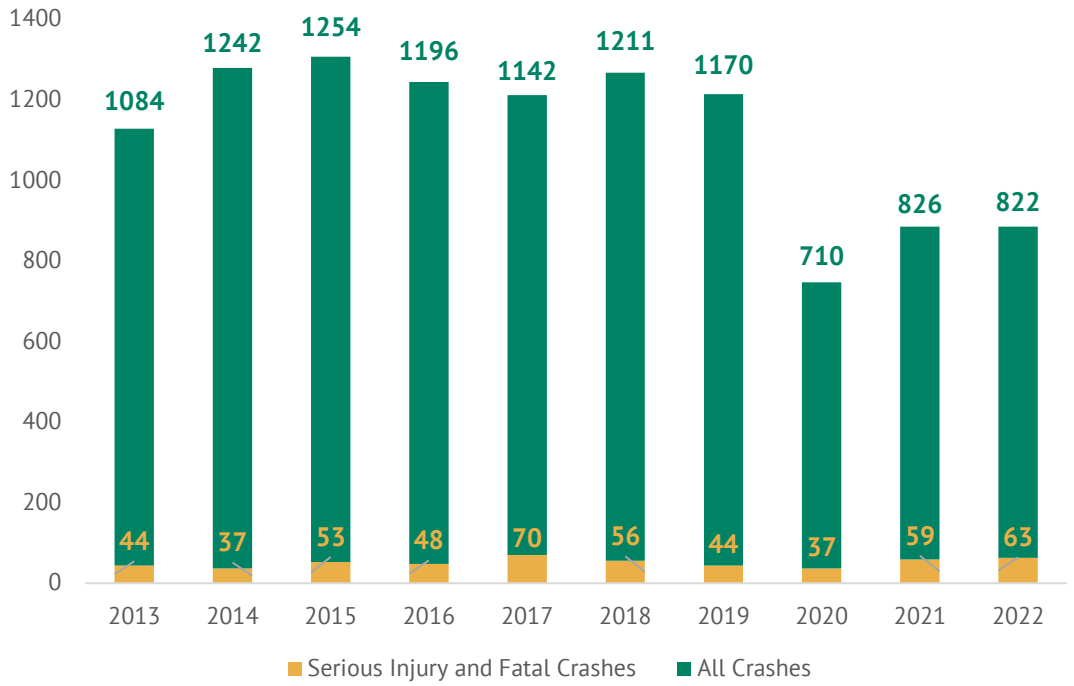
HRN Example

95th Street & Lookout Road
(HIN Intersection)

95th Street & Mineral Road
(Potential HRN Example)

Questions?

Boulder County: Safety Analysis

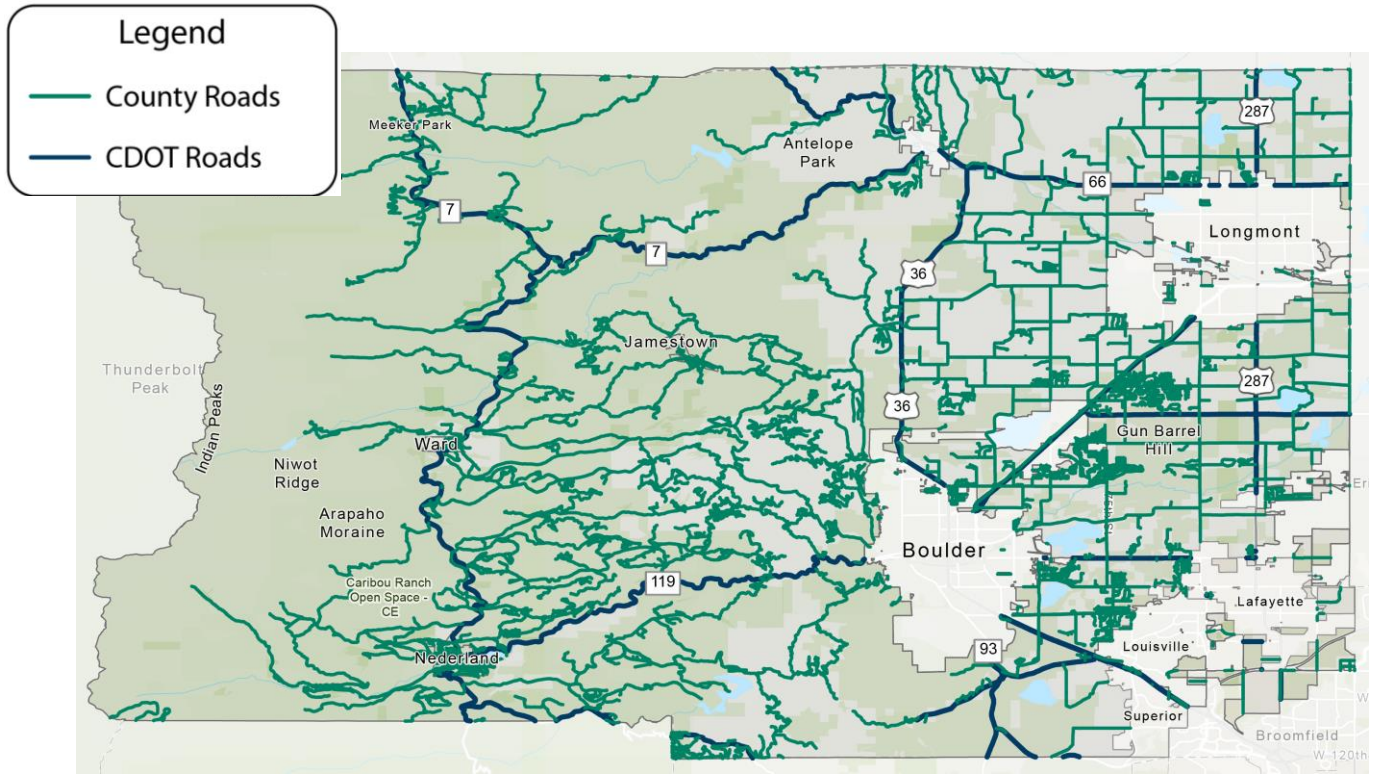


Over 10 years, **135** people died in traffic crashes in the Project Area

Although the number of crashes has decreased in recent years, **the percent of serious injury and fatal crashes has increased** since 2020

Source: Colorado Department of Transportation (CDOT) crash data

Boulder County Safety Analysis



County Roads

86% of roadway centerline miles

30% of serious injury and fatal crashes

CDOT Roads

14% of roadway centerline miles

70% of serious injury and fatal crashes

Boulder County Safety Analysis

Boulder County Roads

All Crashes

25% *Fixed Object*

23% *Rear-end*

9% *Overturning*

Serious Injury & Fatal Crashes

22% *Bicycle*

20% *Fixed Object*

15% *Overturning*

Bicycle crashes are over-represented.

CDOT Roads

All Crashes

41% *Rear-end*

13% *Fixed Object*

10% *Sideswipe*

Serious Injury & Fatal Crashes

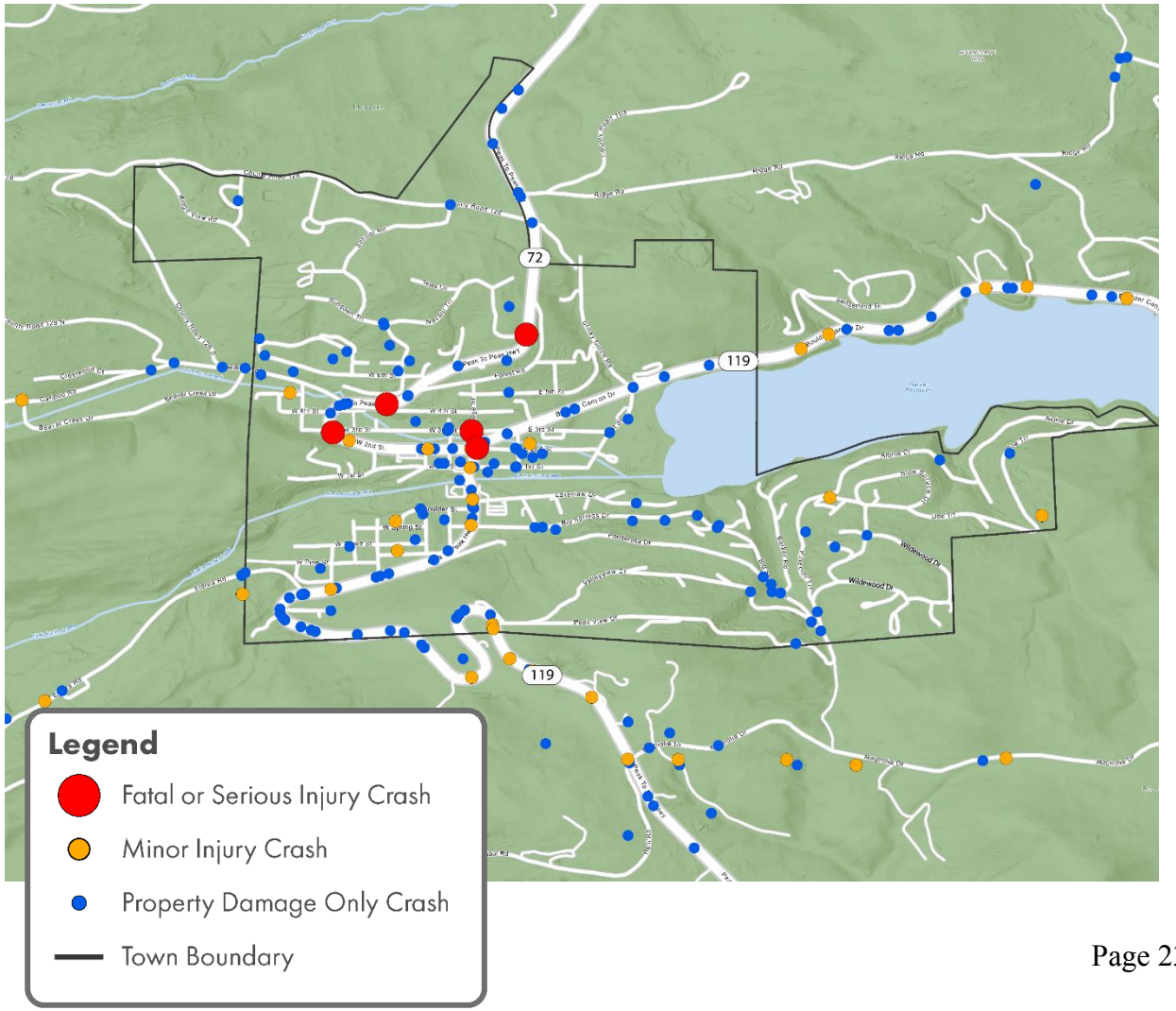
16% *Overturning*

13% *Head-on*

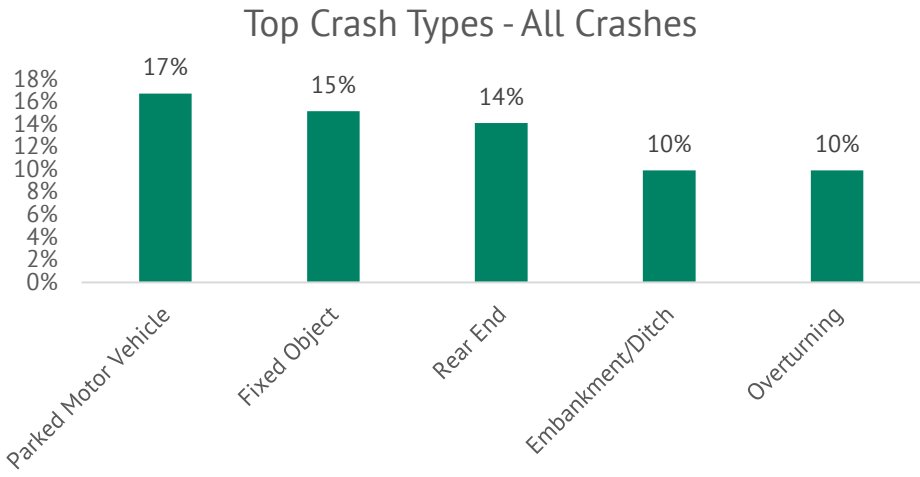
12% *Broadside*

Rear-end crashes are common, but are less likely to result in serious injury or fatality.

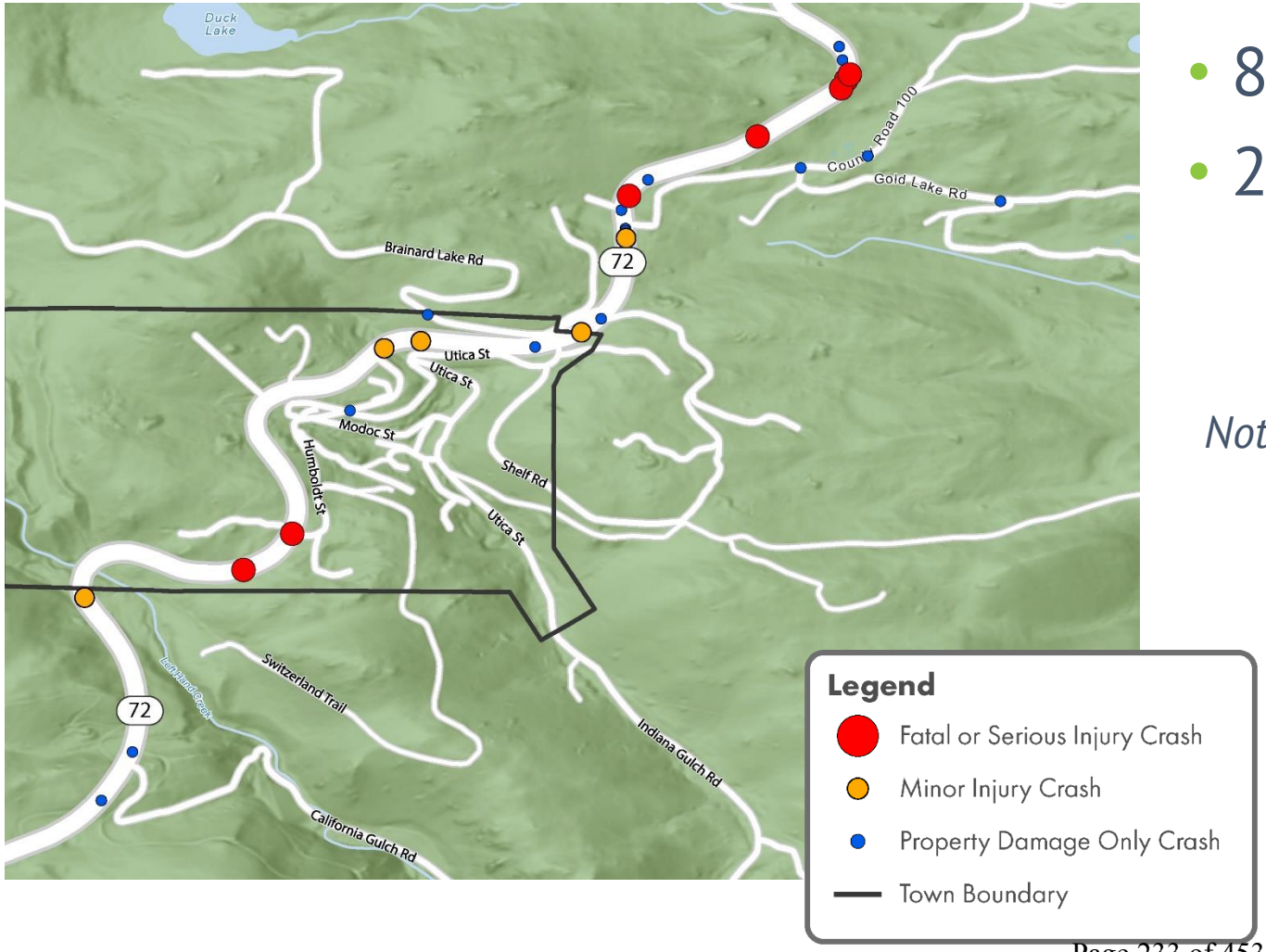
Mountain Town Zoom-in - Nederland



- 191 crashes
- 5 serious injury & fatal crashes:
  - 1 Broadside
  - 1 Pedestrian
  - 2 Head-on (1 fatal involving motorcycle)
  - 1 Fixed Object



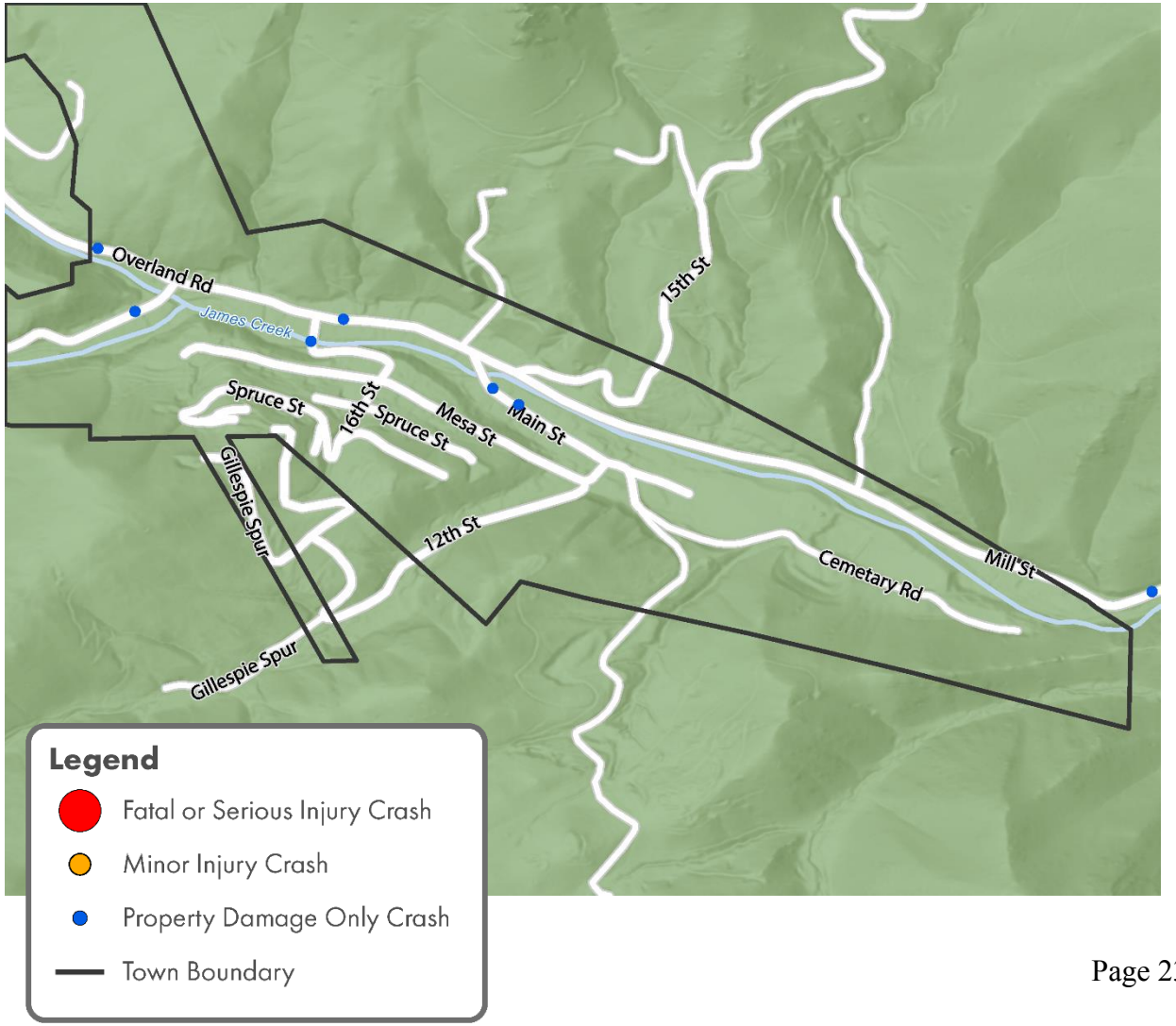
Mountain Town Zoom-in - Ward



- 8 crashes
- 2 serious injury crashes:
  - Guard Rail
  - Overturning

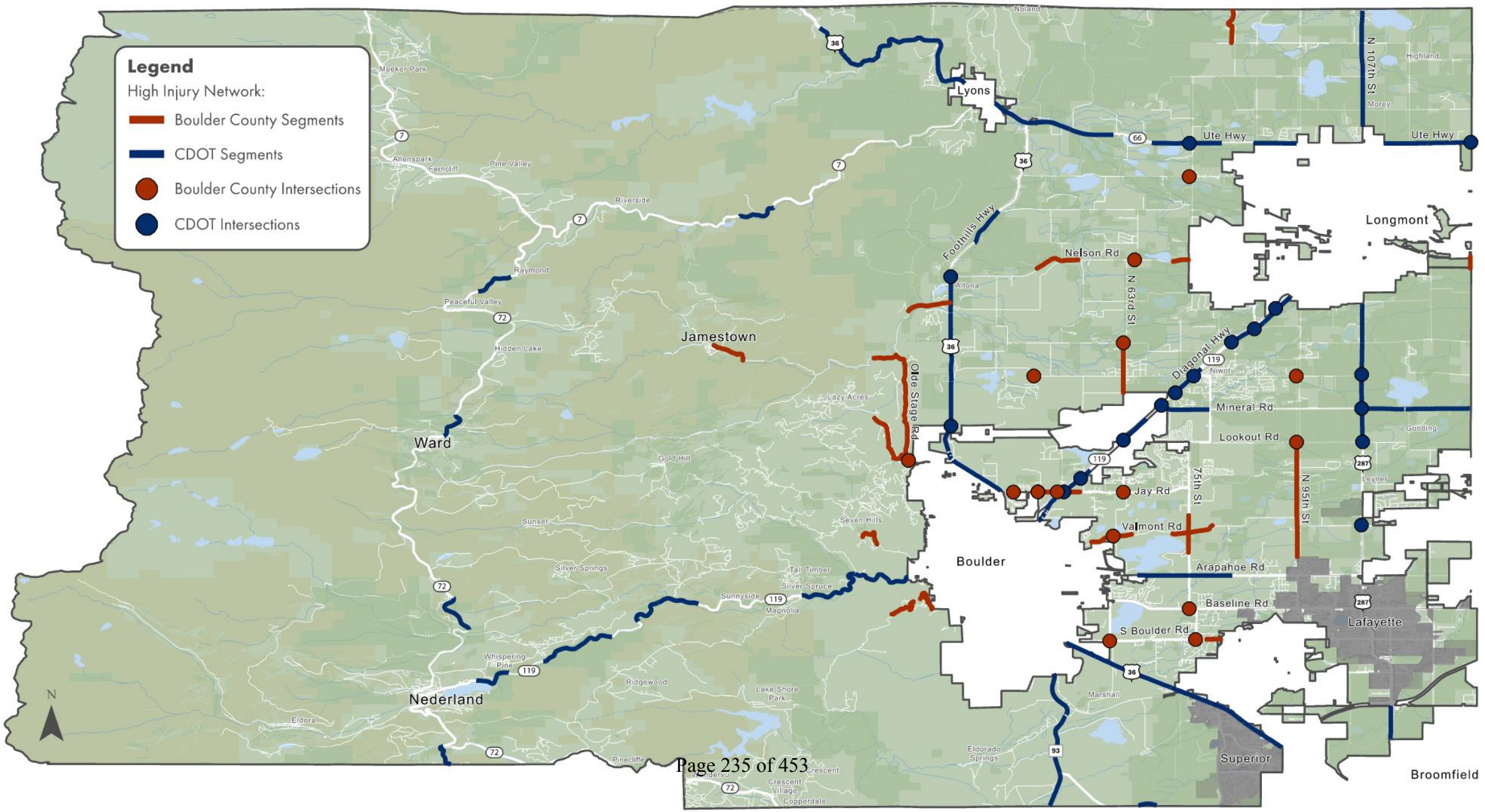
Note: Summary includes only crashes within Ward

Mountain Town Zoom-in - Jamestown



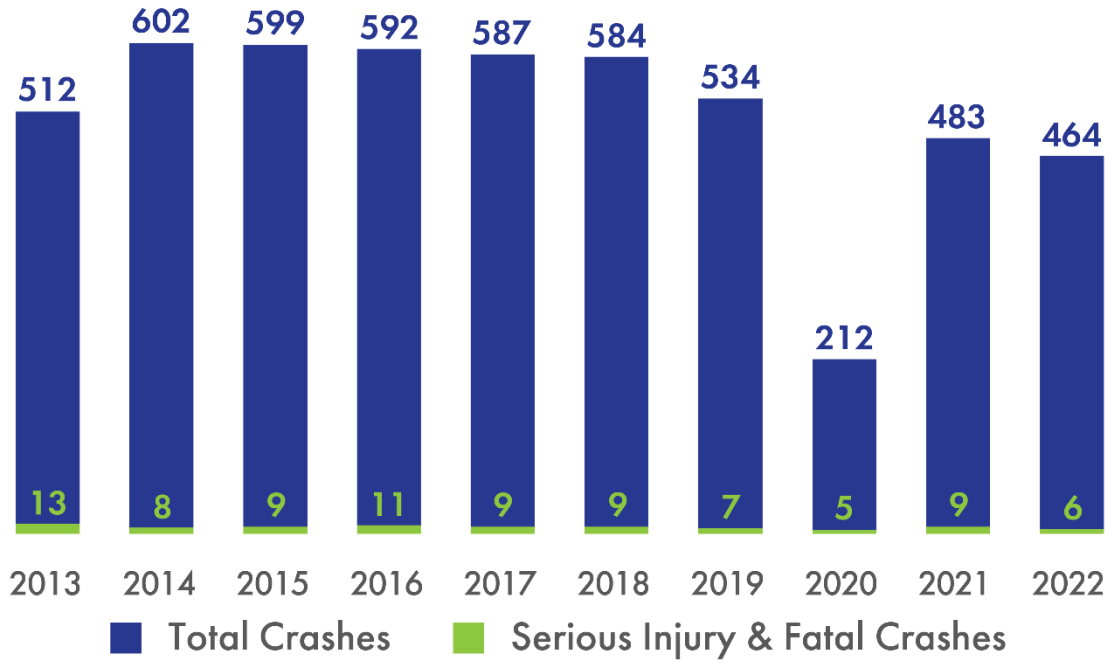
- 10 crashes
- No serious injuries or fatalities

Boulder County: High Injury Network



Lafayette: Safety Analysis

Over 10 years, there were **67** serious injury crashes and **19** fatal crashes in Lafayette



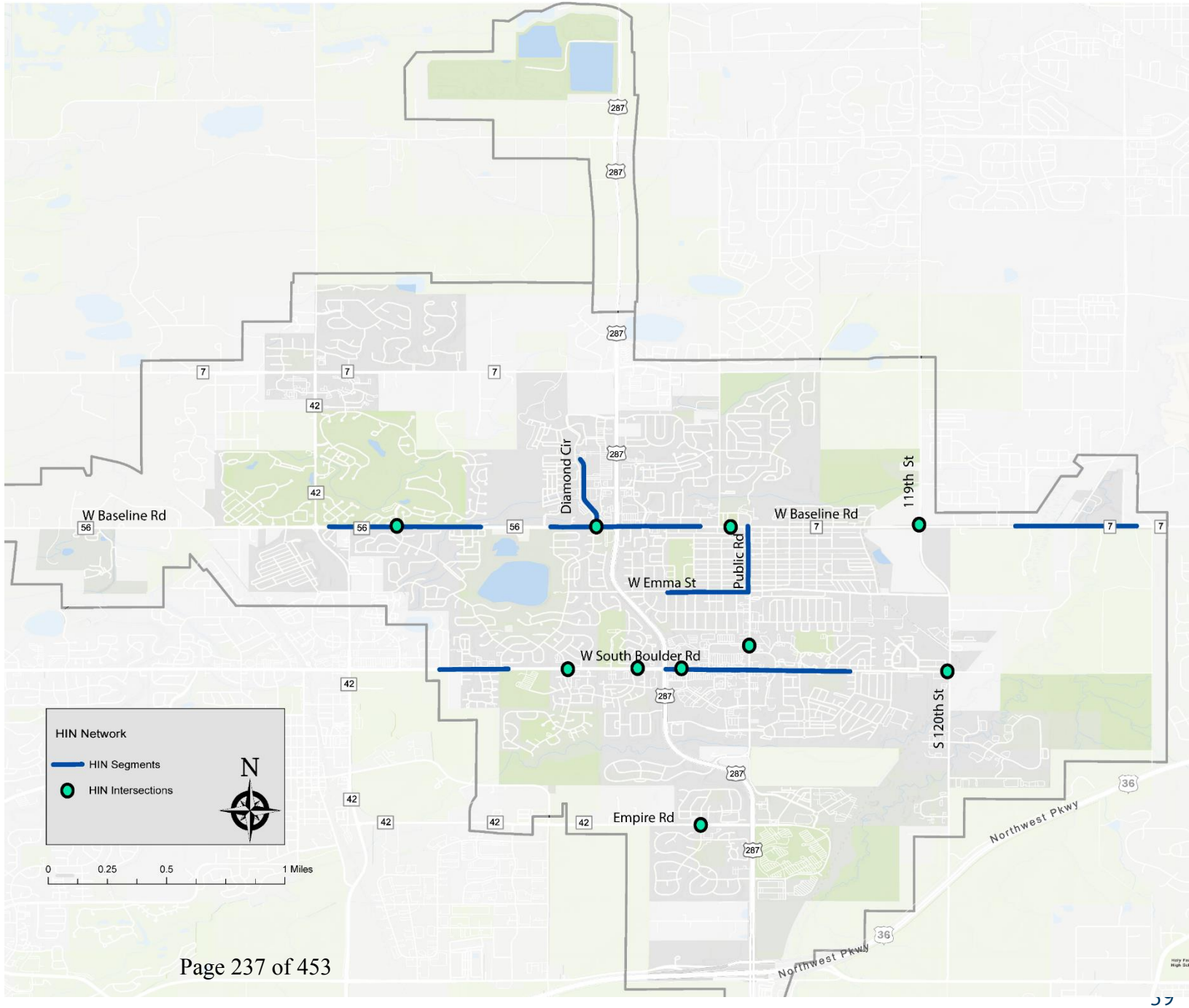
Source: Colorado Department of Transportation (CDOT) crash data

Top Four Serious Injury & Fatal Crash Types:

Broadside	20%
Approach Turn	18%
Rear-End	16%
Sideswipe	12%

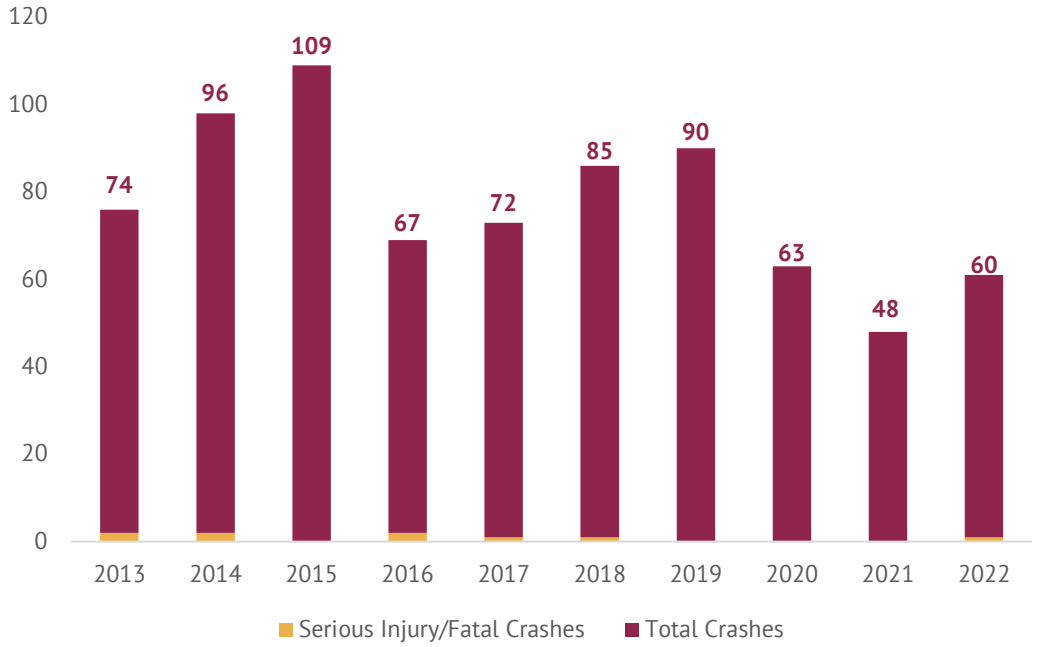
Though total crashes have decreased since 2019, the percentage of serious injury and fatal crashes has remained consistent.

Lafayette: High Injury Network

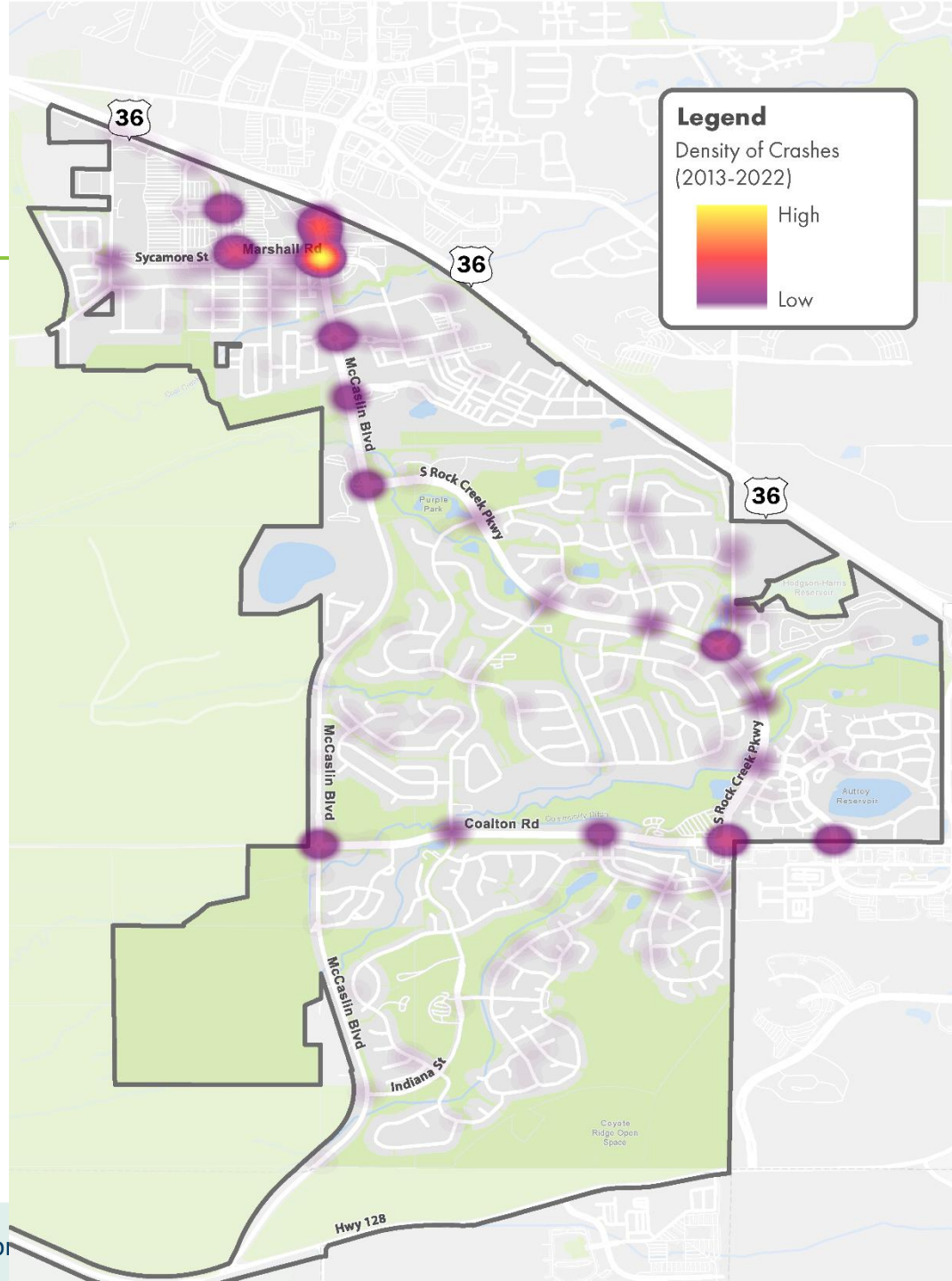


Superior: Safety Analysis

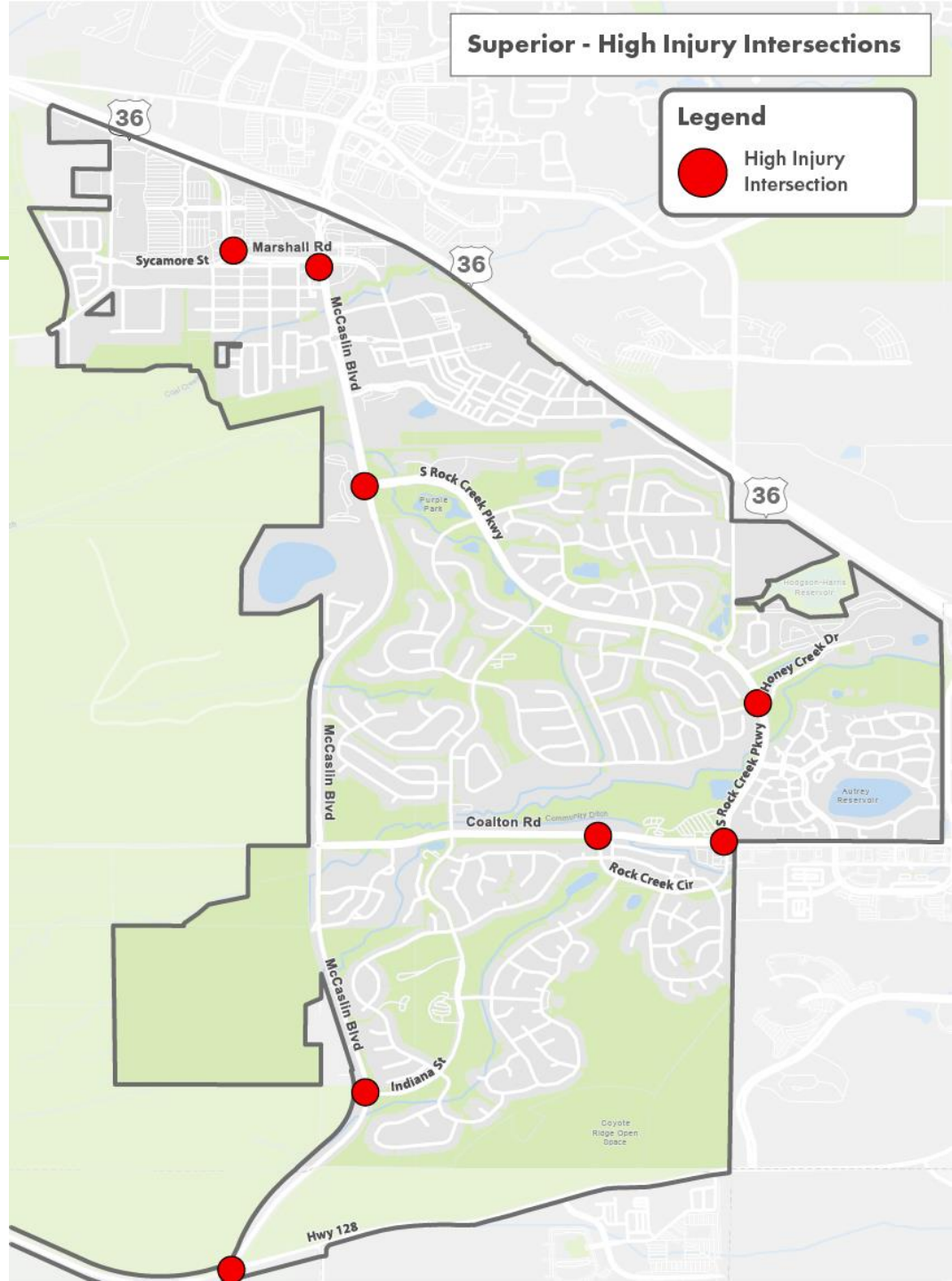
Over 10 years, there were 8 serious injury crashes and 1 fatality in Superior



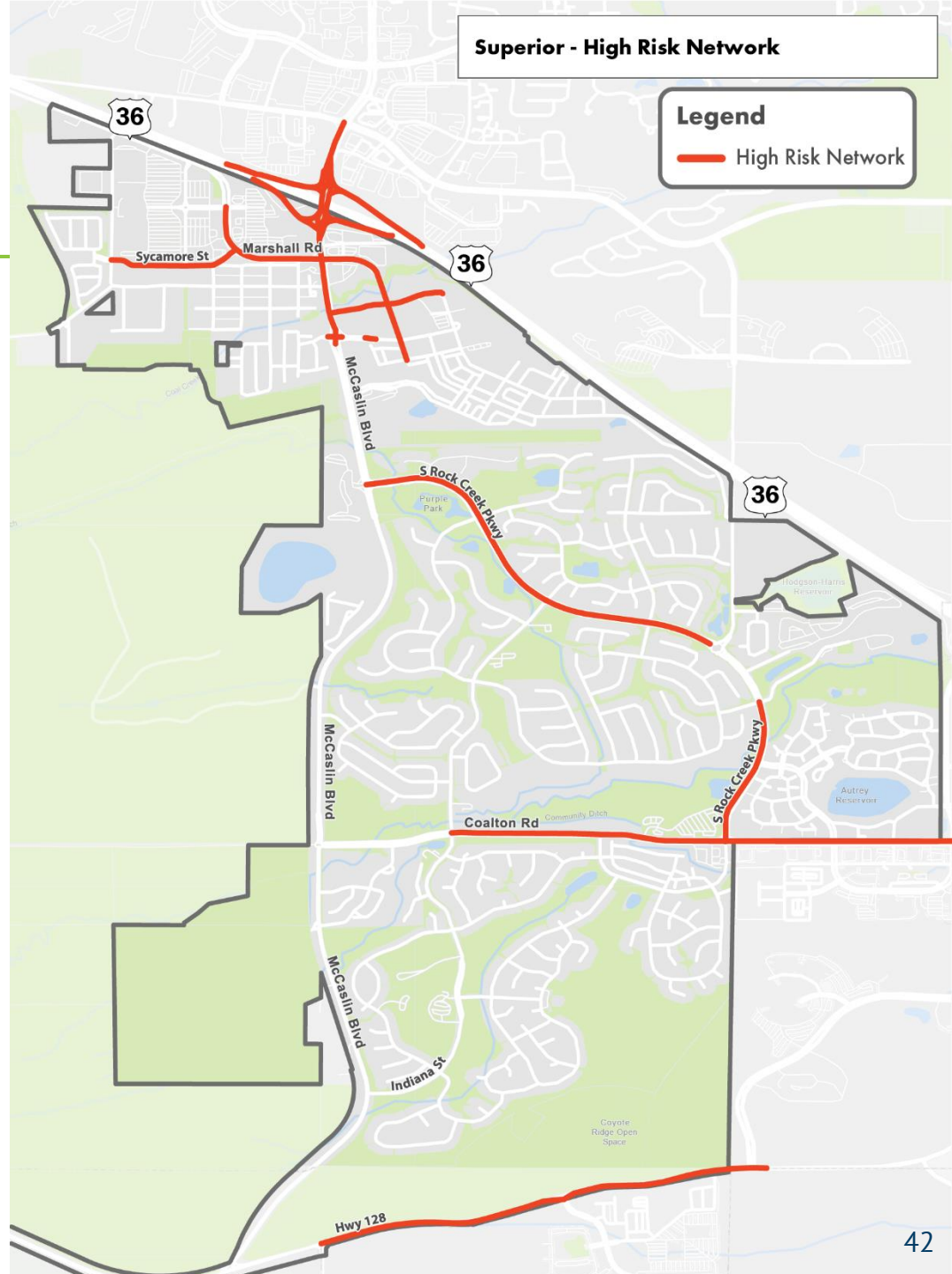
Source: Colorado Department of Transportation (CDOT) crash data



Superior: High Injury Network



Superior: High Risk Network



Discussion

- Do the results of the crash analysis, HIN, or HRN resonate with you? Are there any that are surprising?

Where We're Going: Working Towards the Action Plans

Action Plan Development

Develop Safety Strategies and Initial Recommended Actions

- Variety of Types: Infrastructure & Non-Infrastructure
- Different Applications: location based, systemic, programmatic

Public Input

Finalize Recommended Actions

- Near-term
- Mid-term
- Long-term

Action Plans

Includes additional detail/plans for priority, near-term actions

Next Steps

How You Can Help

Actions

- **Upcoming Phase 2 Outreach**
  Goal: Present initial recommended actions to Community
- Promote public outreach events, website, and survey
- Attend/participate!
- **Do you know of upcoming events that can help promote this outreach?**

Calendar

- **December 2024 – Early 2025:**
  Phase 2 Outreach
  - **December:** Superior Pop-up at Winter Fest
  - **January/February:** All other Partners pop-ups and public meetings
- **December:** Project Update (likely email)

Boulder County, Lafayette, & Superior Vision Zero Action Plans Steering Committee #2

October 30, 2024 | 10 am – 11:30 am

LOCATION: Virtual (Zoom)

Project Management Team (PMT) Members:

Liv Lewin, Boulder County, VZAP PM		Nikki Riemer, Consor
Alex Hyde-Wright, Boulder County		Emma Knisley, Consor
Mark Shisler, Boulder County		Geoffrey Weathers, Superior
Alex Bullen, Superior		George Eveleth, Boulder County
Michelle Melonakis, Lafayette		

Steering Committee Members:

Matthew Muir, Coalition 4 Cyclists		Rachel Plessing, *Superior resident*
Clark Chapman, *Boulder/Nederland area resident*		Landon Hillard, Boulder County, *Boulder resident*
Bryce Reeves, CDOT Bike/Ped Coordinator & ADA Coordinator, *Windsor resident*		Rachel Arndt, Boulder County Public Health *Nederland resident*
Craig Towler, Center for People with Disabilities, *Boulder resident*		Denice Walker, Mobility for All Ambassador *Lafayette resident*
Stephanie Walton, former DRCOG board *Lafayette resident*		Katrina Harms, Peak to Peak Housing & Human Services Alliance, Peak to Peak Scenic Byway Board member, *Nederland resident*
Alexandra Phillips, Boulder County *South Boulder resident*		Krista Nordback, Community Cycles *Boulder resident*
Cammie Edson, City of Longmont Vision Zero *Longmont resident*		John Flora, JM Flora Law Group *Superior resident*
Frank Phillips, Lafayette Planning Commission *Lafayette resident*		Amy Thompson, SRTS Boulder County School District *Gunbarrel resident*
Nick Aguilera, Boulder County		Cass Grady, Town of Nederland Sustainability Coordinator
Tierney Maris, Nederland Board of Trustees		Erik Braaten, DRCOG Senior Safety Planner

Areas with participant discussion are marked in orange text

MEETING NOTES

1. **Introductions**
2. **Meeting Goals**
    a. Review Project Background & Schedule
    b. Discuss Where We've Been

1. Phase 1 Community Outreach
2. Safety Analysis

c. Discuss Where We're Going
1. Working Towards the Action Plan
2. Next Steps

3. **Project Background**
a. What is Vision Zero?
1. Definition: Vision Zero is a transportation strategy to eliminate all traffic fatalities and serious injuries for people using all modes of transportation. Vision Zero recognizes that humans make mistakes and therefore the transportation system should be designed to minimize the consequences of human error.

b. Safe System Approach
1. Principals of Safe Systems:
a. Humans Make Mistakes
b. Humans are Vulnerable
c. Responsibility is Shared
d. Safety is Proactive
e. Redundance is critical
2. Elements
a. Safer People
b. Safer Vehicles
c. Safer Speeds
d. Safer Roads
e. Post-Crash Care
3. "Swiss Cheese Model"
a. Redundancy in elements of the Safe System Approach elements creates layers of protection
b. Death and serious injury only happen when all layers fail

c. Action Plan Development
1. Deliver three standalone Vision Zero Action Plans:
a. Boulder County – includes unincorporated, State Highways, Jamestown, Nederland, and Ward
b. City of Lafayette
c. Town of Superior
2. Create list of specific actions, noting responsibility and potential funding sources for implementation.

d. Schedule
1. Phase 1 engagement occurred in July/August
2. Phase 2 engagement will occur in Winter 2024/2025
3. Draft action plan by late early 2025
4. Final action plan April 2025

e. What We Covered at June Meeting
1. Project Background
2. Promotion of Phase 1 Outreach
3. Listening Session
a. Questions:
1. What does Success Mean to you? What would a successful Vision Zero Action Plan look like to you?

2. What are your ideas for roadway safety in Boulder County? Please add your ideas for how the Vision Zero Action Plan can advance transportation safety outcomes under the topic areas below.

b. Input from these questions will be used as our team is developing recommendations and the action plan

4. **Where We've Been: Phase 1 Community Outreach**
    a. How We Collected Input for Each Partner (July and August 2024)
        1. In-person Pop-up Events
        2. Virtual Public Meetings
        3. Online Input Map & Survey
    b. Summary of What We Heard
        1. Online Survey Responses
            a. Boulder County: 196 survey responses, 309 map pins
            b. Lafayette: 378 survey responses, 463 map pins
            c. Superior: 78 survey responses, 83 map pins
    c. What We Heard: Boulder County & Mountain Towns
        1. 196 survey responses
        2. Majority (62%) of survey respondents live in Unincorporated Boulder County and Mountain Towns
        3. 94% of respondents drive as their primary travel mode, with 3% biking, 2% walking, and 1% taking transit
    d. What We Heard: Boulder County
        1. 31% of respondents or someone they know were involved in a crash in unincorporated Boulder County in the past 5 years
        2. Very few respondents indicated that they use transit or a mobility device as their primary mode
        3. Driving: 43% feel safe, 39% feel unsafe, 18% feel neutral
        4. Walking: 34% feel safe, 46% feel unsafe, 21% feel neutral
        5. Biking: 76% feel unsafe, 17% feel safe, 7% feel neutral
    e. What We Heard: Boulder County Map Survey (309 pins)
        1. Heard the most feedback on US 287, SH 119, and US 36 north of boulder
    f. What We Heard: Lafayette
        1. 378 survey responses
        2. 463 map pins
        3. Majority (76%) of survey respondents live in Lafayette
        4. 86% of respondents drive as their primary travel mode, with 7% biking, 6% walking, 1% taking transit, and 1% using a mobility device
    g. What We Heard: Lafayette
        1. 22% of respondents or someone they know were involved in a crash in Lafayette in the past 5 years
        2. Very few respondents indicated that they use transit or a mobility device as their primary mode
        3. Driving: 55% feel safe, 31% feel unsafe, 14% feel neutral
        4. Walking: 47% feel safe, 37% feel unsafe, 15% feel neutral
        5. Biking: 38% feel safe, 51% feel unsafe, 11% feel neutral
        6. Heard the most feedback on US 287, Baseline Road, South Boulder Road, Emma Road, Public Road

h. What We Heard: Superior
    1. 78 survey responses
    2. 83 map pins
    3. 29% of survey respondents live in Superior while most respondents (67%) live elsewhere in Boulder County or in Lafayette
    4. 81% of respondents drive as their primary travel mode, with 13% biking, 3% walking, 3% other (electric scooter, motorcycle), and 1% taking transit
i. What We Heard: Superior
    1. 7% of respondents or someone they know were involved in a crash in Superior over the last 5 years
    2. Very few respondents indicated that they use transit or a mobility device as their primary mode
    3. Driving: 51% feel safe, 31% feel unsafe, 18% feel neutral
    4. Walking: 38% feel safe, 42% feel unsafe, 19% feel neutral
    5. Biking: 26% feel safe, 62% feel unsafe, 13% feel neutral
    6. Heard most feedback on McCaslin Blvd and S Rock Creek Pkwy

5. **Where We've Been: Safety Analysis**
    a. Safety Analysis Process
        1. Detailed analysis for Unincorporated Boulder County & the Mountain Towns, Lafayette, and Superior
        2. Analyzed 10 years of CDOT crash data (January 2013 to December 2022)
        3. For each study area, developing:
            a. Crash Analysis (understand crash trends)
            b. High Injury Network (understand where injury crashes have occurred)
            c. High Risk Network (understand where injury crashes may happen in the future)
        4. Overlaying Phase 1 Community Input with this analysis to make sure we're not missing anything and to give us more context on the human behavior and human comfort
    b. HIN & HRN: What's the Difference?
        1. High Injury Network: Addressing Crashes Today
            a. Identifies locations where the top injury crashes are occurring based on historical crash data
        2. High Risk Network: Preventing Crashes Tomorrow
            a. Identifies locations where there is high risk for potential crashes based on roadway characteristics
    c. HIN Process
        1. Serious and fatal injury crashes weighted higher than minor injury crashes
            a. Minor injury = 1 point; serious injury=2 points; fatal=4 points
        2. Local Agency roadways were analyzed separately from CDOT roadways to account for the higher number of crashes and different crash trends on DOT roadways
            a. Thinking towards implementation and responsible parties

        b. Different types of crash trends on CDOT roads versus local roads
    3. Weighted Injury crashes were split into local agency roadway crashes and CDOT roadway crashes, then separated into intersection and segment crashes to determine the High Injury Network Results.
d. HRN Process
    1. Identified common roadway characteristics of the serious injury, fatal, and vulnerable road user crashes to select risk factors
    2. Identifying the elements of the roadways where injury crashes are currently occurring to understand where they might happen in the future
e. HRN Example
    1. 95th St & Lookout Rd is flagged as a HIN Intersection
    2. 95th St & Mineral Road – has similar context in terms of signalization, roadway width, has potential to be on HRN

6. **Q&A**
    a. Matt Muir: How is this weighted against the Boulder County Transportation Master Plan? The TMP seems to predict these same conditions.
        1. Nikki: Bike crashes are the top serious injury and fatal crash type on County roadways. We are developing a Bike/Ped HIN, as well as including roadways with subpar bicycle facilities as a risk on the HRN.
        2. We will also make sure recommendations and priorities align with the TMP.
    b. Stephanie Walton: How are we factoring in future development? In the list of risk factors, are we considering facilities that accommodate older adults?
        1. Nikki: We are looking at destination types (libraries, senior centers, transit facilities, etc) and determining if there are trends within the crash data in proximity to these destinations to be potential risk factors. We are also considering planned or recently completed improvements when considering locations for recommended improvements.
    c. Frank Phillips: Once we have all the recommendations assembled, do we see this moving forward into a funding phase?
        1. Nikki: Our goal is to deliver a plan to each agency that is focused on implementation, so prioritizing actions and determining high level planning cost as well as implementation responsibility and potential funding sources.
7. **Safety Findings**
    a. Boulder County: Safety Analysis
        1. The total number of crashes has decreased in recent years (following the pandemic in 2020), but the number of serious injury and fatal crashes has remained consistent, so the percentage of these crashes has increased.
        2. Over 10 years, 135 people died in traffic crashes in the project area.
        3. County roadways make up 86% of roadway centerline miles, but only 30% of serious injury and fatal crashes. CDOT roadways make up only 14% of roadway centerline miles, but 70% of serious injury and fatal crashes.

        a. Given this distribution, the project team analyzed CDOT and county roadways separately.
    4. On Boulder County roads, the top crash types were fixed object, rear-end, and overturning. However, the top serious injury and fatal crash types were bicycle, fixed object, and overturning. The disproportionate amount of serious injury and fatal bicycle crashes compared to all crashes emphasizes the vulnerability of this road user.
    5. On CDOT roads, the top crash types were rear-end, fixed object, and sideswipe. The top serious injury and fatal crash types were overturning, head-on, and broadside. Rear-end crashes are common, but they are less likely to result in serious injury and fatality.

b. Mountain Town Zoom-in – Nederland
    1. 191 crashes occurred within the Nederland boundary, including 5 serious injury and fatal crashes consisting of:
        a. 1 broadside crash
        b. 1 pedestrian crash
        c. 2 head-on crashes (1 fatal involving motorcycle)
        d. 1 fixed object crash
    2. The top crash types in Nederland were Parked motor Vehicle, Fixed Object, Rear End, Embankment/Ditch, and Overturning.

c. Mountain Town Zoom-in – Ward
    1. 8 crashes occurred within the Ward boundary, including 2 serious injury crashes consisting of
        a. 1 guard rail crash
        b. 1 overturning crash

d. Mountain Town Zoom-in – Jamestown
    1. 10 crashes occurred within the Jamestown boundary, with no serious injuries or fatalities.

e. Boulder County: High Injury Network (HIN)
    1. The HIN consists of segments and intersections broken down into county and CDOT-owned roadways with the highest concentrations of injury crashes
    2. Splitting out county-owned roadways allows us to identify segments with a high concentration of injury crashes compared to other county roadways, without being skewed by the proportionally higher CDOT roadways

f. Lafayette: Safety Analysis
    1. Similarly to Boulder County, total crashes have declined in the past few years, but the number of serious injury and fatal crashes has remained consistent.
    2. Over 10 years, there were 67 serious injury crashes and 19 fatal crashes in Lafayette.
    3. The top serious injury and fatal crash types in Lafayette were broadside, approach turn, rear-end, and sideswipe.

g. Lafayette: High Injury Network (HIN)
    1. The HIN consists of the segments and intersections with the highest concentrations of injury crashes. Some state highways (US 287, Arapahoe w/o US 287, 95th St s/o Arapahoe Road) were removed from the analysis due to having recently completed planning studies, with a desire to have a complete sense of where the most impact can be had on areas that haven't been studied yet
h. Superior: Safety Analysis
    1. Over 10 years, there were 8 serious injury crashes and 1 fatality in Superior (which occurred on Hwy 128).
    2. The majority of crashes occurred at intersections, with a hotspot of crashes at McCaslin and Marshall.
    3. Due to this concentration of crashes at intersections and the lack of concentrated injury crashes on segments, the High Injury Network consists only of intersections.
    4. The High Risk Network was developed using known risk factors such as speed limit and number of lanes. High risk segments appear around the US 36 interchange, as well as along Rock Creek Pkwy, Coalton, and Hwy 128.

8. **Discussion: Do the results of the crash analysis, HIN, or HRN resonate with you? Are there any that are surprising?**
    a. Stephanie Walton: Is there any way to break out how roadways or transportation infrastructure is being used for recreation versus commuting/non-recreation?
        1. Nikki: One thing might be able to do is look at where bicycle/pedestrian crashes are occurring, such as trail crossings, to try and determine trip purpose.
        2. Alexandra: What is the purpose of breaking down the data that way?
            a. Stephanie: assumptions and priority of investment might be different
        3. Katrina Harms: Agree with Stephanie about difference between work and recreation, especially for communities like Nederland and Ward that experience high volumes of tourists in the summertime.
        4. Michelle: Lafayette has had some conversations about using Strava data to determine locations of recreation rides, but there is concern that it may not be equitable. Also, can consider looking at exposure during peak commuting times.
        5. Krista: Wary of the danger of diving into recreation vs commuters, given that this is data we don't have and may not need. Is this data relevant for other things, such as when people are traveling? We could get this data from counts. Caution against going down that rabbit hole unless we have a better clearer reason for it. Would also like to hear more about the bike crashes as we dive into it and have maps for that specifically.
            a. Nikki: As part of our crash analysis we are looking at a variety of factors, which includes time of day and day of week, so can potentially break

down by crash type, etc. to understand more specifically when crashes are occurring.

b. Nikki: We are working on developing a bike/ped specific HIN for Boulder County, as well as diving into the locations with bike/ped crashes in Lafayette and Superior.

b. Rachel: There are places on Strava that are hot and are used a lot, which introduces potential for collisions. There are also areas that show up as gaps where there is no one riding, which can be used of evidence of where areas do not feel safe. Is the project team looking at that?
   1. Nikki: We haven't specifically driven into the Strava data, but if we do go down that path it would be a combination of looking at hotspots and gaps to understand the whole picture.
   2. Liv: Community input was specifically about where people don't feel safe, so we do have input from the community about where people don't feel safe biking and why, which we can use to fill in the gaps of the crash data.

c. Krista: Wanted to mention project by Portland State University, which fused Strava data with the bicycle counts provided by Boulder County, so we have an estimate across the County to try to overcome some of the bias inherent with the Strava data. It is the researchers' best estimate of where bicyclists are traveling across the County.
   1. https://nitc.trec.pdx.edu/research/project/1269/Exploring_Data_Fusion_Techniques_to_Estimate_Network-Wide_Bicycle_Volumes
   2. https://jbroachpdx-map-share.nextgis.com/resource/21/display?panel=none

9. **Where We're Going: Working Towards the Action Plans**
   a. Action Plan Development
      1. Develop Safety Strategies and Initial Recommended Actions
         a. Variety of Types: Infrastructure & Non-Infrastructure
         b. Different Applications: Location based, systemic, programmatic
      2. Public Input
      3. Finalize Recommended Actions
         a. Near Term
         b. Mid Term
         c. Long Term
      4. Action Plans
         a. Includes additional detail/plans for priority, near-term actions

10. **Next Steps**
   a. Actions
      1. Upcoming Phase 2 Outreach
         a. Goal: Present initial recommended actions to community
      2. Promote public engagement events, website, and survey
      3. Attend/participate
      4. Do you know of upcoming events that can help promote this outreach?

b. Calendar
    1. December 2024 – Early 2025: Phase 2 Outreach
        a. December: Superior Pop-up at Winter Fest
        b. January/February: All other Partners pop-ups and public meetings
    2. December: Project Update (likely via email)
c. Katrina: there are a handful of pop-up events in December, but can keep an eye out for events early next year
d. Stephanie: Is the Lafayette Chamber continuing Oatmeal Festival in January?
    1. Frank: Yes, Saturday January 13th
        a. Note: Post-meeting research showed that the actual date for 2025 is Tue., Jan. 14.
    2. https://festivalnet.com/27257/Lafayette-Colorado/Lifestyle-Healthy-Living-Events/Lafayette-Quaker-Oatmeal-Festival
e. Stephanie: CDOT grant was awarded to do safety improvements on US 287 as part of NAMS projects, congratulations to anyone who was involved in making that happen.

Boulder County Vision Zero Action Plan
Steering Committee December 2024 Update

Project Overview: Create Vision Zero Action Plans for Boulder County, Lafayette, and Superior to address roadway safety, with a Vision Zero goal of eliminating all traffic fatalities and serious injuries by 2035.

Study Area*:

The Boulder County plan includes county roads and Colorado Department of Transportation (CDOT) highways in unincorporated Boulder County and in the mountain towns of Jamestown, Nederland, and Ward.

Community Input Summary:

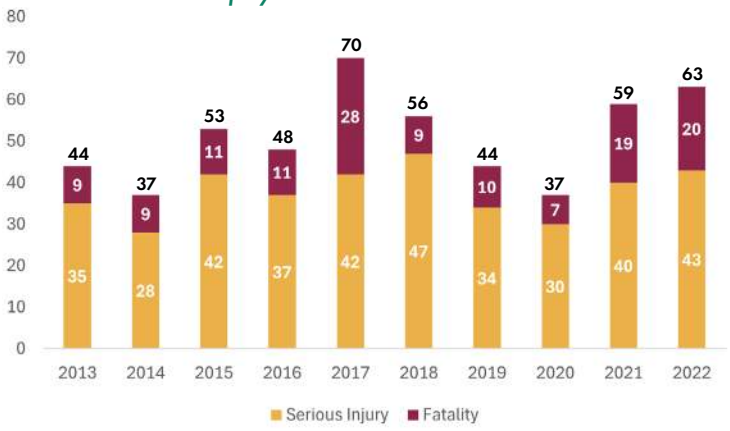
Top concerns that emerged from a community survey (Summer 2024):

- Lack of infrastructure for cyclists and pedestrians
- Speeding and reckless driving
- Dangerous intersections

Safety Analysis Findings:

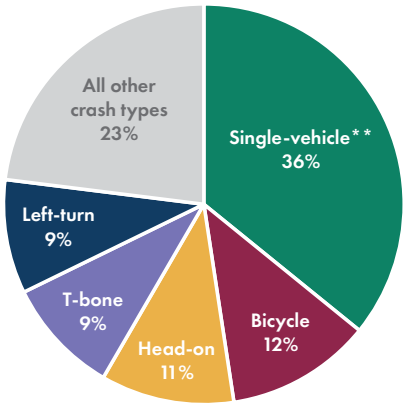
- Over the ten-year analysis period (2013 –2022), 125 people died in traffic crashes, and the **number of serious injury and fatal crashes has fluctuated and has been increasing since 2020.**
- **Top crash types** include:
  - Single-vehicle crashes**
  - Crashes involving bicyclists
  - Head-on crashes
  - T-bone crashes
  - Left-turn crashes
- **Speeding makes all of the above crash types more likely and more severe.**
- A **high-injury network (HIN)** based on historical crash data has been identified that includes **7% of the centerline miles** but accounts for **66% of the serious injury and fatal crashes**. Safety improvements will be focused on the HIN (see next page for map).

Serious Injury and Fatal Crashes Over Time



Top Serious Injury and Fatal Crash Types

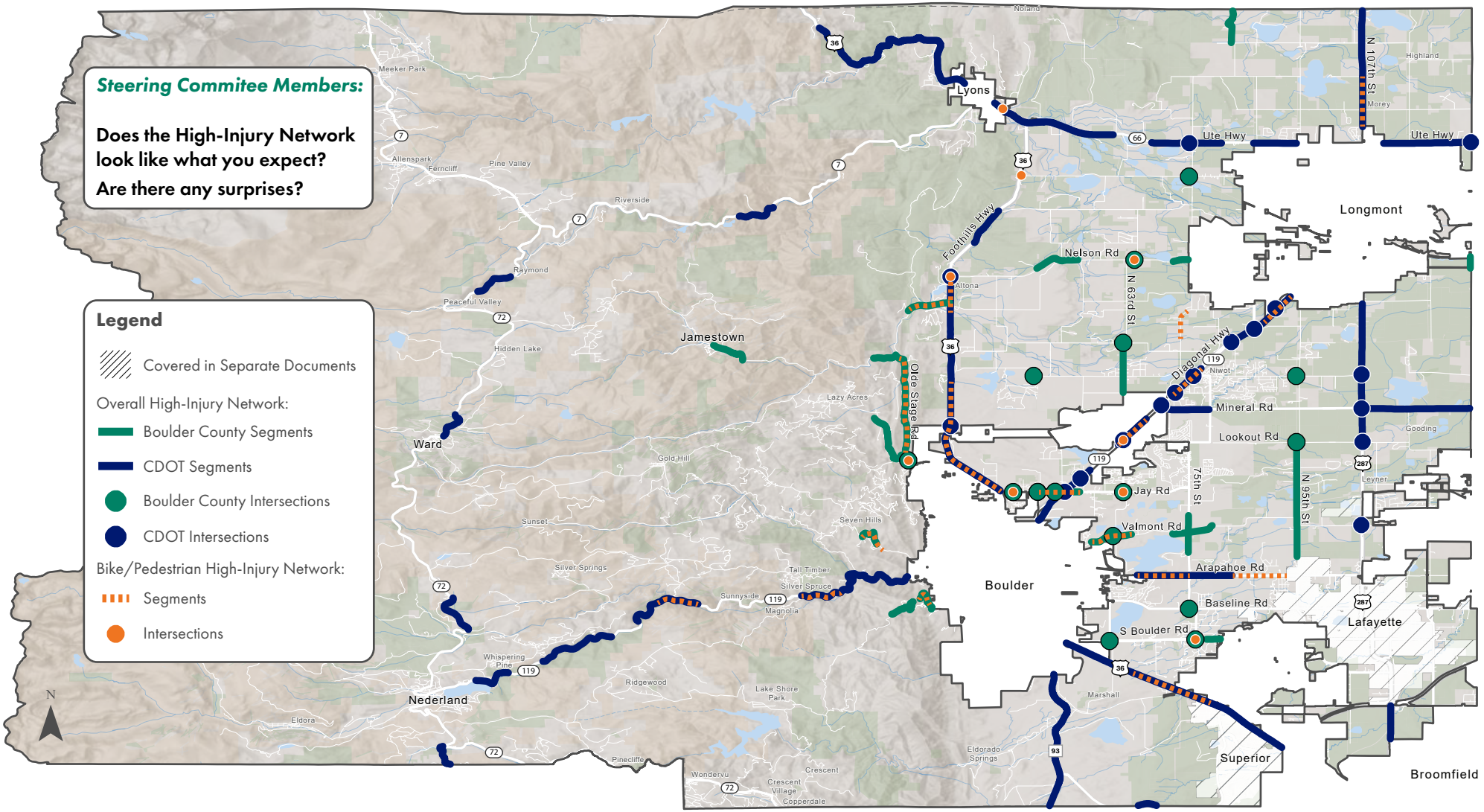
The top five serious injury and fatal crash types account for 77% of the serious injury and fatal crashes.



*Lafayette and Superior Vision Zero Action Plan updates are covered in separate documents.
**Examples of single-vehicle crashes include departing the road, colliding with fixed objects, collisions with animals, and overturning vehicles.

Boulder County Vision Zero Action Plan
Steering Committee December 2024 Update

Draft High-Injury Network for Steering Committee Review - December 2024



Boulder County Vision Zero Action Plan
Steering Committee December 2024 Update

Recommended Actions:

The plan will follow the FHWA's Safe System Approach and will primarily focus recommendations for Engineering, Enforcement, Education, and Evaluation actions in the following areas:

- Safer Roads
- Safer Speeds
- Safer People

Recommended actions will be developed and prioritized by considering factors such as being in the HIN, risk for future crashes, crash reduction potential, proximity to disadvantaged populations, community input, and planning-level costs. The actions will be categorized for phased implementation over the next several years, with progress tracked and evaluated.

Examples of the types of recommended actions that will be explored include:

Focus Area	Action	Type
Safe Roads	Add rumble strips to 'Example Corridor' from 'Street A' to 'Street B'	Engineering
	Update 'Example Intersection' to protected left-turn phasing during the AM and PM peak periods	Engineering
Safe Speeds	Pilot automated enforcement, such as red-light cameras and speed cameras	Enforcement
Safe People	Implement targeted education campaigns that align with "back-to-school" to raise awareness of increased school-aged children traveling on the roadways	Education
	Implement targeted education campaigns about driving under the influence	Education
All	Create a public-facing annual report that tracks the Boulder County Vision Zero Action Plan progress	Evaluation

Next Steps:

- Q4 2024-Q1 2025: **Participate in and help promote the next round of community outreach.** Stay tuned for more details!
- Q1 2025: Steering Committee meeting to discuss draft recommended actions; Draft Action Plan available for review
- Q2 2025: Final Action Plan

Appendix B: Pop-up Materials

Boulder County Vision Zero Action Plan

Vision Zero Action Plans (VZAPs) identify specific, prioritized strategies to comprehensively improve transportation safety for all roadway users with the goal of eliminating serious and fatal traffic crashes. **The vision is zero traffic deaths.**

Boulder County, along with the City of Lafayette, and the Town of Superior are all working on VZAPs funded through a single federal grant. The project started in spring 2024 and is expected to wrap up in summer 2025. The first step was to analyze historic and potential crash activity on roadways and to gather community input about perceptions of roadway safety.

We've drafted solutions for improving traffic safety through Boulder County's Vision Zero Action Plan, and we need your feedback! Help us prioritize solutions to make our streets safer for everyone!

Visit the project website to learn more and take our survey by March 2, 2025!

boco.org/VisionZeroActionPlan

Condado de Boulder
Plan de Acción de *Vision Zero*

Los Planes de Acción Visión Cero (VZAP, por sus siglas en inglés) identifican estrategias específicas y priorizadas para mejorar de manera integral la seguridad del transporte para todos los usuarios de las carreteras, con el objetivo de eliminar los accidentes de tráfico graves y fatales. La visión o meta es reducir a cero las muertes por accidentes de tráfico.

El condado de Boulder, junto con la ciudad de Lafayette y la ciudad de Superior están trabajando en VZAP, financiados a través de una sola subvención federal. El proyecto comenzó en la primavera de 2024 y se espera que concluya en el verano de 2025. El primer paso fue analizar la actividad histórica y potencial de accidentes en las carreteras, y recopilar las opiniones de la comunidad sobre las percepciones de seguridad vial.

Hemos elaborado soluciones para mejorar la seguridad vial a través del Plan de Acción *Vision Zero* del Condado de Boulder, ¡y necesitamos su opinión! Ayúdenos a priorizar soluciones para hacer que nuestras calles sean más seguras para todos.

Visite el sitio web del proyecto para obtener más información y completar nuestra encuesta antes del Marzo 2, 2025!

boco.org/VisionZeroActionPlan

Boulder County
Vision Zero Action Plan

Vision Zero Action Plans (VZAPs) identify specific, prioritized strategies to comprehensively improve transportation safety for all roadway users with the goal of eliminating serious and fatal traffic crashes. **The vision is zero traffic deaths.**

Boulder County, along with the City of Lafayette, and the Town of Superior are all working on VZAPs funded through a single federal grant. The project started in spring 2024 and is expected to wrap up in summer 2025. The first step was to analyze historic and potential crash activity on roadways and to gather community input about perceptions of roadway safety.

Learn More About the Plan:

boco.org/VisionZeroActionPlan

Traffic Safety Analysis

Crash Trends in Boulder County:

77% of all injury crashes in Boulder County include the following crash types:

Single-Vehicle: This crash type includes only one vehicle and can involve vehicles departing from the road, colliding with a fixed object or animal, and overturning vehicles.

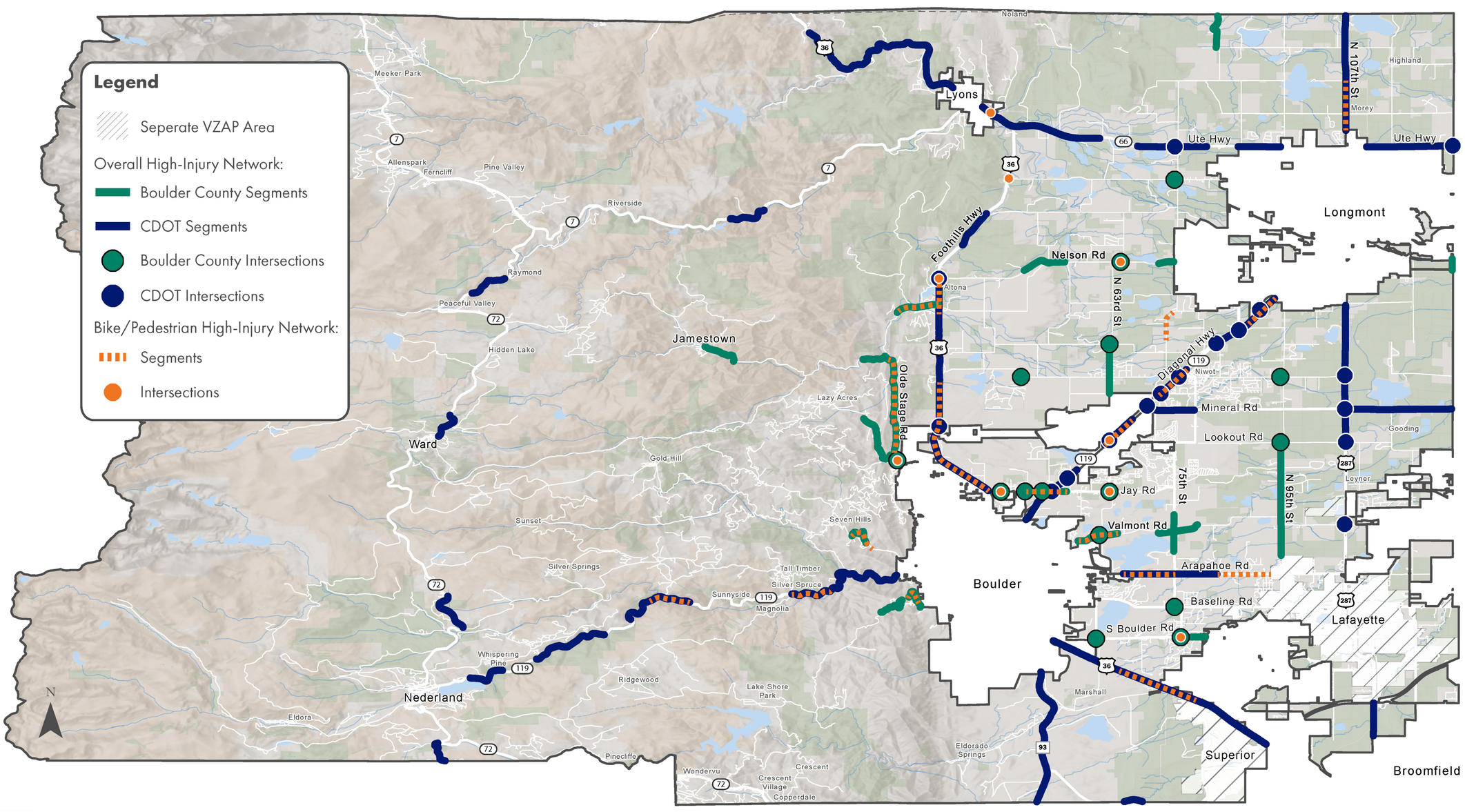
Bicycle Involved: This crash type involves a motor vehicle and at least one person who is biking.

Head-on: This crash type occurs when two vehicles traveling in opposite directions hit each other with the front ends of each vehicle.

T-Bone: Also known as a broadside crash or an angle collision, this crash type occurs when the front end of one car crashes into the side of another car.

Left-Turn: This crash type occurs when someone turns left in front of oncoming traffic without yielding the right-of-way.

High Injury Network: A high-injury network (HIN) identifies locations where the highest number of injury crashes are occurring based on historical crash data. The project improvements in the plan will largely focus on the HIN.



Condado de Boulder
Plan de Acción de *Vision Zero*

Los Planes de Acción *Vision Zero* (VZAP, por sus siglas en inglés) identifican estrategias específicas y priorizadas para mejorar de manera integral la seguridad del transporte para todos los usuarios de las carreteras, con el objetivo de eliminar los accidentes de tráfico graves y fatales. **La visión o meta es reducir a cero las muertes por accidentes de tráfico.**

El condado de Boulder, junto con la ciudad de Lafayette y la ciudad de Superior están trabajando en VZAP, financiados a través de una sola subvención federal. El proyecto comenzó en la primavera de 2024 y se espera que concluya en el verano de 2025. El primer paso fue analizar la actividad histórica y potencial de accidentes en las carreteras, y recopilar las opiniones de la comunidad sobre las percepciones de seguridad vial.

Learn More About the Plan:

boco.org/VisionZeroActionPlan

Análisis de Seguridad Vial

Tendencias de accidentes

Cinco tipos de accidentes representan el **77%** de todos los accidentes con lesiones graves y aquellos que resultan en muertes en el condado de Boulder:

Accidente de un solo vehículo: Este tipo de accidente incluye solo un vehículo y puede implicar la salida del vehículo de la carretera, la colisión con un objeto fijo o un animal, y que el vehículo se vuelque.

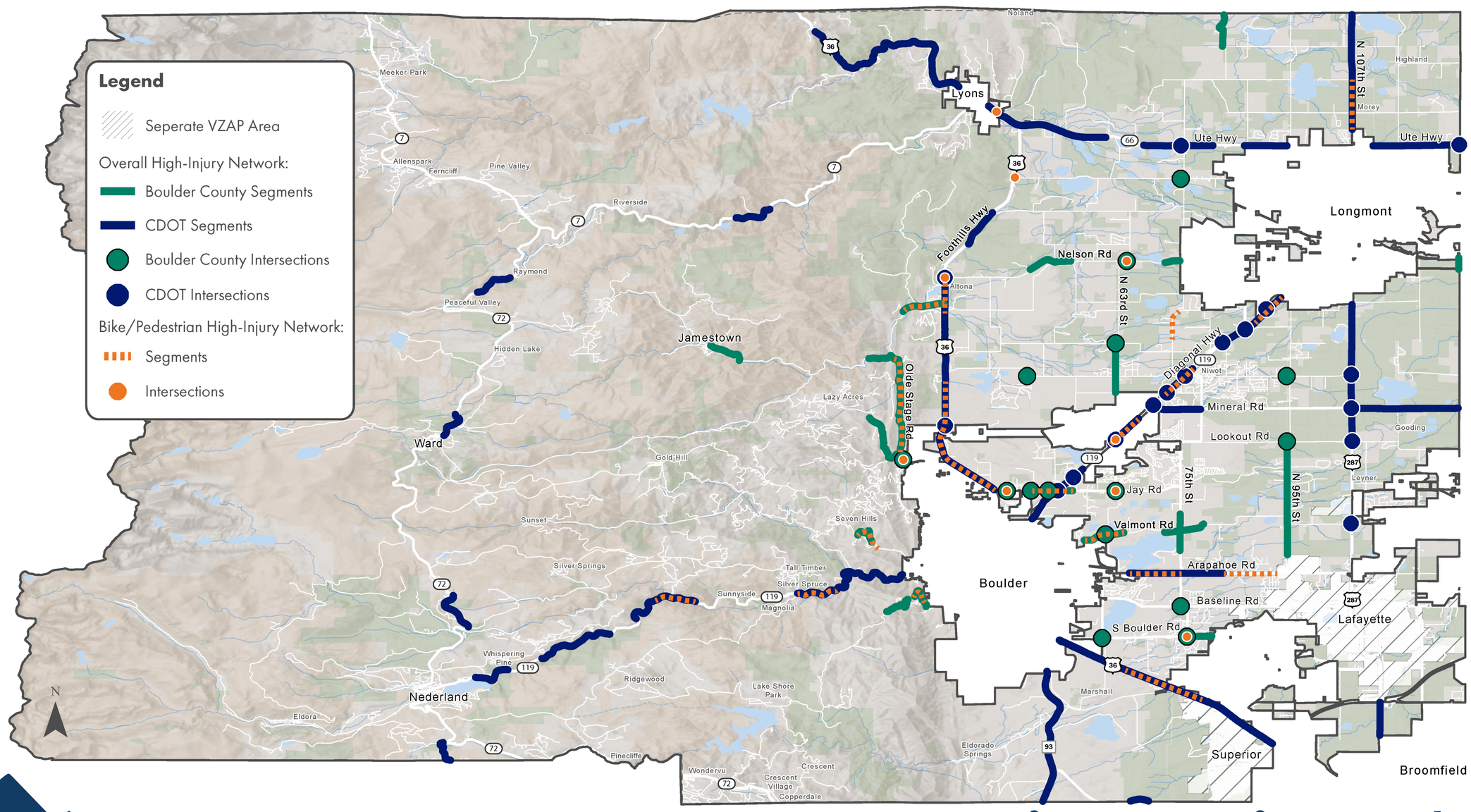
Accidente con ciclistas: Este tipo de accidente involucra un vehículo motorizado y al menos una persona que va en bicicleta.

Choque frontal: Este tipo de accidente ocurre cuando dos vehículos que viajan en direcciones opuestas chocan entre sí con los extremos delanteros de cada vehículo.

Choque en forma de T: También conocido como choque lateral o colisión en ángulo, este tipo de choque ocurre cuando la parte delantera de un automóvil choca contra el costado de otro automóvil.

Choque por giro a la izquierda: Este tipo de accidente ocurre cuando alguien gira a la izquierda frente al tráfico que se aproxima sin ceder el derecho de paso.

Una red de carreteras con una alta incidencia de accidentes con lesiones Una red de carreteras con una alta incidencia de accidentes con lesiones (High-Injury Network, HIN) identifica las ubicaciones donde ocurren la mayor cantidad de accidentes con lesiones, basándose en datos históricos de accidentes. Las mejoras del proyecto en el plan se centrarán principalmente en la HIN.



Boulder County, Lafayette, y Superior

PLANES DE ACCIÓN DE *VISION ZERO*

Boulder County Safety Countermeasures: We Want Your Input!

Input Key:

- Very Supportive
- Supportive with some concerns
- Not Supportive

The proposed safety solutions directly address the top five crash types, reducing the frequency and/or severity of traffic crashes. Please review these preliminary safety solutions and indicate your level of support. Based on technical analysis and public input others will also be identified in the plan.

Rumble Strips on the Shoulder/Centerline

Alert drivers when they are departing a travel lane. Rumble strips can be placed at the shoulder/ edgeline to minimize run-off-the-road crashes or in the centerline to reduce crossover/ head-on crashes. If implemented, to minimize noise impacts, rumble strips would not be installed within 300 feet of residences or businesses.

Crash Type(s) Addressed:
Single-Vehicle crashes
Head-On crashes

Crash Reduction Potential: 25%

Shoulder:

Centerline:

Bicycle Safety Improvements

Bicycle improvements could include, but are not limited to, formalizing bicycle facilities and providing physical separation between bicycles and vehicles, widening shoulders to accommodate more space for bicycles, and signing and striping treatments to enhance the visibility of bicycles crossing an intersection.

Crash Type(s) Addressed:
Crashes involving bicyclists

Crash Reduction Potential:
Varies depending on treatment/facility

On-Street Bicycle Facilities:

Separate Bicycle Facilities:

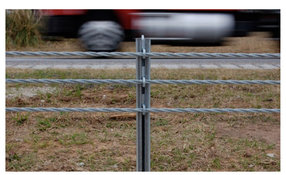
Protected Left-turns

"Protected-only" phasing provides a separate phase for left-turning traffic and allowing left-turns to be made only on a green left arrow signal indication. Separate left-turn motor vehicle movements prevent turning vehicles from overlapping with the pedestrian walk phase or conflicting with oncoming vehicles.

Crash Type(s) Addressed:
Pedestrian and bicycle crashes
Left-turn crashes

Crash Reduction Potential: 99%

Median Barriers



Provides a physical barrier to restrict vehicles from traveling outside of the travel lane for crash types such as head-on crashes with vehicles in the opposing direction and off-road crashes. Median barriers sometimes restrict turning access in some locations.

Crash Type(s) Addressed:
Head-on crashes
Sideswipe (opposite direction) crashes

Crash Reduction Potential: 97% (on rural 4-lane roads)

Roundabouts

A roundabout is a circular intersection designed to improve traffic flow and safety by reducing conflict points, lowering vehicle speeds, and minimizing the severity of crashes. Roundabouts decrease the likelihood of high-speed collisions and improve overall roadway efficiency.

Crash Type(s) Addressed:
Head-on crashes | T-bone crashes
Left-turn crashes

Crash Reduction Potential:
78% (conversion from a signalized intersection)
82% (conversion from an intersection with 2 stop signs)

At Signalized Intersections:

At Stop-Controlled Intersections:

Red Light Cameras & Speed Cameras

Red light cameras and speed cameras are an automated system that photograph drivers and vehicles that run red lights and that are traveling faster than the legal speed limit on the roadway. Drivers are ticketed for the violation, holding them accountable for dangerous behavior

Crash Type(s) Addressed:
T-bone crashes (at traffic signal)
Speed-related crashes
Rear End crashes

Crash Reduction Potential:
Red light camera – 25%
Speed camera – 54%

Red Light Cameras:

Speed Cameras:

Soluciones de seguridad del condado de Boulder: ¡Queremos su opinión!

Clave de opinión:

- Muy a favor
- A favor, con algunas inquietudes
- No estoy a favor

Las soluciones de seguridad propuestas abordan directamente los cinco tipos principales de accidentes, reduciendo la frecuencia y/o la gravedad de los accidentes de tráfico. Por favor, revise las soluciones de seguridad e indique su nivel de apoyo. Con base en el análisis técnico y el aporte del público, también se identificarán otras en el plan.

Bandas sonoras o franjas de vibración en el arcén (zona lateral de la carretera), línea de borde o línea central

Alertan a los conductores cuando se están saliendo de un carril de circulación. Las bandas sonoras o franjas de vibración se pueden colocar en el arcén o en la línea de borde para minimizar los accidentes ocasionados por salirse de la carretera, o en la línea central para reducir los choques cruzados o frontales. Si se implementan, para minimizar los impactos del ruido, las bandas sonoras no se instalarían a menos de 300 pies de residencias o negocios.

En los arcenes y en las líneas de borde:

En la línea central:

Tipo de accidente que aborda:
Accidentes de un solo vehículo
Choques frontales

Potencial de reducción de accidentes:
25%

Mejoras en la seguridad para las bicicletas

Las mejoras para las bicicletas podrían incluir, entre otras, la formalización de las instalaciones para bicicletas y la provisión de separación física entre bicicletas y vehículos, el ensanchamiento de los arcenes para ofrecer más espacio a las bicicletas, y los tratamientos de señalización y rayado para mejorar la visibilidad de las bicicletas que cruzan una intersección.

Instalaciones para bicicletas en la calle:

Instalaciones para bicicletas separadas:

Tipo de accidente que aborda:
Accidentes que involucran a ciclistas

Potencial de reducción de accidentes:
Varía según el tratamiento o la instalación

Giros a la izquierda protegidos

La fase de los semáforos de 'solo protección' proporciona una fase separada para el tráfico que gira a la izquierda, permitiendo que los giros a la izquierda se realicen únicamente con una indicación de la señal de flecha verde. Los movimientos separados de vehículos motorizados que giran a la izquierda evitan que los vehículos que giran se superpongan con la fase de cruce peatonal, o entren en conflicto con los vehículos que vienen en sentido contrario.

Tipo de accidente que aborda:
Accidentes de peatones y bicicletas
Accidentes de giro a la izquierda

Potencial de reducción de accidentes:
99%

Barreras centrales

Proporcionan una barrera física para restringir que los vehículos transiten fuera del carril de circulación en casos de accidentes como choques frontales con vehículos en sentido contrario y colisiones fuera de la carretera. Las barreras centrales a veces restringen el acceso a los giros en algunos lugares.

Tipo de accidente que aborda:
Choques frontales
Choques laterales (en los que los vehículos involucrados viajan en direcciones opuestas)

Potencial de reducción de accidentes:
97% (en autopistas rurales de 4 carriles)

Rotondas

Una rotonda es una intersección circular diseñada para mejorar el flujo del tráfico y la seguridad al reducir los puntos de conflicto, disminuir la velocidad de los vehículos y minimizar la gravedad de los accidentes. Al eliminar los giros a la izquierda y las paradas controladas por señales, las rotondas disminuyen la probabilidad de colisiones a alta velocidad y mejoran la eficiencia general de la carretera.

En las intersecciones señalizadas:

En las intersecciones controladas por señales de alto:

Tipo de accidente que aborda:
Choques frontales | Choques en forma de T
Accidentes de giro a la izquierda

Potencial de reducción de accidentes:
78% (conversión a partir de una intersección señalizada)
82% (conversión a partir de una intersección con 2 señales de alto)

Cámaras de semáforo en rojo y radares de velocidad

Las cámaras de semáforo en rojo y los radares de velocidad son un sistema automatizado que fotografía a los conductores y vehículos que se saltan los semáforos en rojo y que viajan más rápido que el límite de velocidad legal en la carretera. Los conductores reciben una multa por la infracción, lo que los hace responsables de su comportamiento peligroso.

Cámaras de luz roja:

Radares de velocidad:

Tipo de accidente que aborda:
Choques en forma de T (en un semáforo)
Choques relacionados con la velocidad
Choques por detrás

Potencial de reducción de accidentes:
Cámara de luz roja: 25%
Radar de velocidad: 54%

Boulder County will consider several factors when deciding how to prioritize implementation of recommended projects on the High Injury Network in the Action Plan.

How important is each of these factors to you when it comes to prioritizing safety projects? Please drop in your tokens.

(more tokens = higher priority)

El condado de Boulder considerará varios factores al decidir cómo priorizar la implementación de los proyectos recomendados en el Plan de Acción.

¿Cuál de los siguientes factores cree que debería tener más peso? Por favor, ingrese sus fichas.

(más fichas = mayor prioridad)

VULNERABLE POPULATIONS

(for example: elderly, young children, low income)

MORE KNOWN / HISTORICAL CRASHES

SAFER FOR WALKING / BIKING

WHERE PEOPLE FEEL UNSAFE

(based on Summer 2024 community feedback)

LAS POBLACIONES VULNERABLES

(por ejemplo: personas ancianas, niños pequeños, de bajos ingresos, etc.)

LUGARES DONDE HAY MÁS ACCIDENTES CONOCIDOS O HISTÓRICOS

LUGARES QUE HACEN QUE SEA MÁS SEGURO CAMINAR Y ANDAR EN BICICLETA

DONDE LAS PERSONAS SE SIENTEN INSEGURAS

(según los comentarios de la comunidad en el verano de 2024)

Appendix C: Survey Questions

Overview

Vision Zero Action Plans (VZAPs) identify specific, prioritized strategies to comprehensively improve transportation safety for all roadway users with the goal of eliminating serious and fatal traffic crashes. The vision is zero traffic deaths.

Boulder County, along with the City of Lafayette, and the Town of Superior are all working on VZAPs funded through a single federal grant. The project started in spring 2024 and is expected to wrap up in summer 2025. The first step was to analyze historic and potential crash activity on roadways and to gather community input about perceptions of roadway safety.

This survey presents a summary of the safety analysis for unincorporated Boulder County and the mountain towns of Jamestown, Nederland, and Ward, and asks for your input on proposed solutions to address the top crash types, as well as on factors to use in the process to prioritize projects.

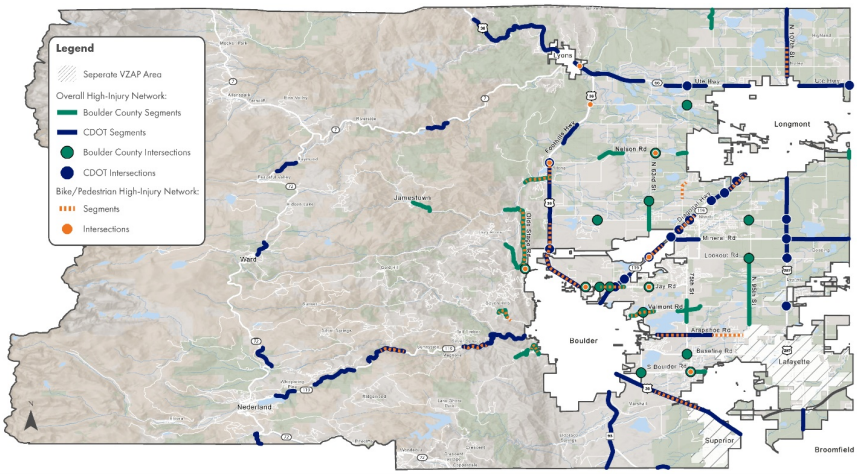
Your feedback is extremely important and will influence the recommendations that will be included in the final safety action plan.

High-Injury Network

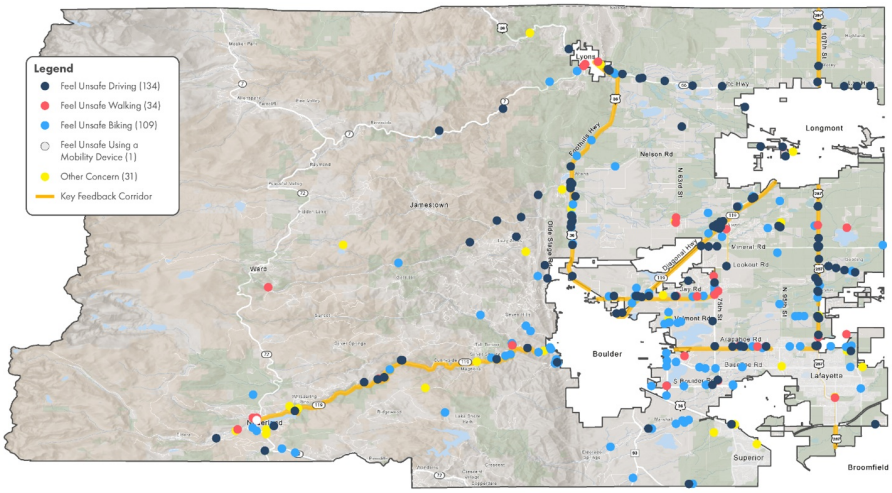
A high-injury network (HIN) identifies locations where the highest number of injury crashes are occurring based on historical crash data. The project improvements in the plan will largely focus on the HIN.

The maps below show the HIN for Boulder County along with the locations where community members indicated having safety-related concerns. Community input displayed on the map below was collected over the summer of 2024 through an online survey and interactive map, virtual public meeting, and through tabling at the Nederland Farmers Market. Sixty-two percent of the public input aligned with the HIN.

Boulder County High Injury Network (HIN)



Boulder County Community Input (Summer 2024)



Crash Trends

Five crash types account for 77% of all serious injury and fatal crashes in Boulder County: single-vehicle crashes, crashes involving bicyclists, head-on crashes, T-bone crashes, or left-turn crashes. Each type is described in more detail below.

Single-Vehicle Crash: This crash type includes only one vehicle and can involve vehicles departing from the road, colliding with a fixed object or animal, and overturning vehicles.

Bicycle Involved: This crash type involves a motor vehicle and at least one person who is biking.

Head-on Crash: This crash type occurs when two vehicles traveling in opposite directions hit each other with the front ends of each vehicle.

T-Bone Crash: Also known as a broadside crash or an angle collision, this crash type occurs when the front end of one car crashes into the side of another car.

Left-Turn Crash: This crash type occurs when someone turns left in front of oncoming traffic without yielding the right-of-way.

Safety Solutions

The proposed safety solutions directly address the top five crash types, reducing the frequency and/or severity of traffic crashes. The crash reduction potential of each solution is the expected reduction in crashes if that treatment is implemented, based on the Federal Highway Administration's (FHWA) Crash Modification Factors Clearinghouse.

Below is a preliminary list of safety solutions, and based on technical analysis and public input others will also be identified in the plan. Please review the safety solutions and indicate your level of support.

Rumble Strips on the Shoulder/ Edgeline or Centerline

Alert drivers when they are departing a travel lane. Rumble strips can be placed at the shoulder/ edgeline to minimize run-off-the-road crashes or in the centerline to reduce crossover/head-on crashes. If implemented, to minimize noise impacts, rumble strips would not be installed within 300 feet of residences or businesses.

Crash Types it Addresses:

- Single-vehicle crashes
- Head-on crashes

Crash Reduction Potential

- 25%

* 1. How supportive are you of implementing **shoulder/ edgeline** rumble strips?

◯ Very supportive

◯ Supportive with some concerns

◯ Not supportive

* 2. How supportive are you of implementing **centerline** rumble strips?

◯ Very supportive

◯ Supportive with some concerns

◯ Not supportive

3. Do you have any other comments or feedback on rumble strips? If you have concerns or are not supportive of rumble strips, please share why.

Safety Solutions (continued)
Bicycle Safety Improvements

Bicycle improvements could include, but are not limited to, formalizing bicycle facilities and providing physical separation between bicycles and vehicles, widening shoulders to accommodate more space for bicycles, and signing and striping treatments to enhance the visibility of bicycles crossing an intersection.

Crash Type it Addresses:
- Crashes involving bicyclists

Crash Reduction Potential:
- Varies depending on treatment/facility

* 4. How supportive are you of implementing **On-Street Bicycle Facilities** such as shoulders and/or bike lanes?

- ◯ Very supportive
- ◯ Supportive with some concerns
- ◯ Not supportive

* 5. How supportive are you of implementing **Separate Bicycle Facilities** such as multi-use paths and/or commuter bikeways?

- ◯ Very supportive
- ◯ Supportive with some concerns
- ◯ Not supportive

6. Do you have any other comments or feedback on bicycle safety improvements? If you have concerns or are not supportive of bicycle safety improvements, please share why.

Safety Solutions (continued)

Protected Left-Turns

“Protected-only” phasing provides a separate phase for left-turning traffic and allowing left turns to be made only on a green arrow signal indication. Separate left-turn motor vehicle movements prevent turning vehicles from overlapping with the pedestrian walk phase or conflicting with oncoming vehicles.

Crash Type it Addresses:
- Pedestrian and bicycle crashes
- Left-turn crashes

Crash Reduction Potential:
- 99%

* 7. How supportive are you of implementing protected left-turns?

◯ Very supportive

◯ Supportive with some concerns

◯ Not supportive

8. Do you have any other comments or feedback on protected left-turns? If you have concerns or are not supportive of protected left-turns, please share why.

Safety Solutions (continued)
Median Barriers

Provides a physical barrier to restrict vehicles from traveling outside of the travel lane for crash types such as head-on crashes with vehicles in the opposing direction and off-road crashes. Median barriers sometimes restrict turning access in some locations.

Crash Type it Addresses:
- Head-on crashes
- Sideswipe (opposite direction) crashes

Crash Reduction Potential:
- 97% (on rural 4-lane roads)


* 9. How supportive are you of implementing median barriers?

◯ Very supportive

◯ Supportive with some concerns

◯ Not supportive

10. Do you have any other comments or feedback on median barriers? If you have concerns or are not supportive of median barriers, please share why.

Safety Solutions (continued)

Roundabouts

A roundabout is a circular intersection designed to improve traffic flow and safety by reducing conflict points, lowering vehicle speeds, and minimizing the severity of crashes. By eliminating left-turns and signal-controlled stops, roundabouts decrease the likelihood of high-speed collisions and improve overall roadway efficiency.

Crash Types it Addresses:
- Head-on crashes
- T-bone crashes
- Left-turn crashes

Crash Reduction Potential:
- 78% (conversion from a signalized intersection)
- 82% (conversion from an intersection with 2 stop signs)

* 11. How supportive are you of implementing roundabouts at **signalized intersections**?

- ◯ Very supportive
- ◯ Supportive with some concerns
- ◯ Not supportive

* 12. How supportive are you of implementing roundabouts at **intersections controlled by stop signs**?

- ◯ Very supportive
- ◯ Supportive with some concerns
- ◯ Not supportive

13. Do you have any other comments or feedback on roundabouts? If you have concerns or are not supportive of roundabouts, please share why.

Safety Solutions (continued)

Red Light Cameras and Speed Cameras

Red light cameras and speed cameras are an automated system that photograph drivers and vehicles that run red lights and that are traveling faster than the legal speed limit on the roadway. Drivers are ticketed for the violation, holding them accountable for dangerous behavior.

Crash Types it Addresses:
- T-bone crashes (at traffic signal)
- Speed-related crashes
- Rear end

Crash Reduction Potential:
- 25% (red light camera)
- 54% (speed camera)

* 14. How supportive are you of implementing **red light cameras**?

◯ Very supportive

◯ Supportive with some concerns Not

◯ supportive

* 15. How supportive are you of implementing **speed cameras**?

◯ Very supportive

◯ Supportive with some concerns Not

◯ supportive

16. Do you have any other comments or feedback on red light cameras or speed cameras? If you have concerns or are not supportive of red light or speed cameras, please share why.

Project Prioritization

Boulder County will consider several factors when deciding how to prioritize implementation of recommended projects in the Action Plan.

* 17. How important is each of these factors to you when it comes prioritizing safety projects?

	Not important	Somewhat not important	Neutral	Somewhat important	Very important
Places where there are more known/historical crashes	◯	◯	◯	◯	◯
Prioritizing vulnerable populations (for example: elderly, young children, low income, etc.)	◯	◯	◯	◯	◯
Locations that make it safer for walking and biking	◯	◯	◯	◯	◯
Locations where people feel unsafe based on Summer 2024 community feedback	◯	◯	◯	◯	◯

Safety Solutions Wrap-Up

18. Do you have any other comments or feedback on safety solutions or prioritization?

Demographic Questions (optional)

19. Please identify your gender:

- ◯ Male
- ◯ Female
- ◯ Nonbinary
- ◯ Transgender
- ◯ Prefer not to answer

20. Please select one (or more) of the following to describe your race/ethnicity. Please select all that apply.

- ☐ African American or Black
- ☐ American Indian or Alaskan Native
- ☐ Asian American
- ☐ Cuban
- ☐ Puerto Rican
- ☐ White
- ☐ Native Hawaiian or Pacific Islander
- ☐ Latino/Latina/Latinx, Mexican, Mexican American, Chicana
- ☐ Other, please specify:

Boulder County
Vision Zero Action Plan
Phase 3 Engagement Summary

June 2025

Contents

Introduction 1
Project Outreach Set-up & Promotion Information 1
Website 1
Social Media 2
Stakeholder Engagement 2
Steering Committee Meeting #3 2
Community Engagement 2
Online Survey 2
Next Steps 4
Appendices 5
Appendix A: Steering Committee Meeting Materials
Appendix B: Survey Questions

Introduction

Recognizing the importance of implementing a regional approach to road safety, Boulder County, Lafayette, and Superior (the Partners) joined forces to apply for 2023 Safe Streets and Roads for All (SS4A) grant funding. The Partners were awarded the SS4A grant funding which enables each Partner to develop a Vision Zero Action Plan (VZAP) of their own. The VZAP will be a detailed analysis of traffic crashes and risk factors in the county or jurisdiction, and provide specific recommendations to comprehensively improve transportation safety in the coming years. The Boulder County Vision Zero Action Plan is being developed using community engagement to supplement the data-driven safety analysis completed for the project. Three phases of community outreach were planned in the form of public meetings, online surveys, and pop-up events:

- Phase 1 served as a listening session to learn from the public about traffic safety attitudes and location-specific feedback.
- Phase 2 informed the public by presenting draft content from the Vision Zero Action Plan, including high-priority recommendations.
- Phase 3 solicited public comments on the full draft Vision Zero Action Plan.

In spring 2025, the project team implemented Phase 3 of outreach. During this phase, the community was asked to review the full draft Vision Zero Action Plan and provide feedback regarding the Plan's effectiveness. The community and stakeholder engagement efforts included an online survey. The community feedback collected in Phase 3 will be used to refine the overall Vision Zero Action Plan.

Project Outreach Set-up & Promotion Information

Understanding that outreach and communication with the community was a top priority, the project team created a variety of content to promote and encourage participation in the engagement efforts for this project. Diversifying the outreach platforms allowed Boulder County to reach a wider array of community members for more comprehensive engagement.

Website

During Phase 1, the project team worked closely with the Partners to develop a Vision Zero Action Plan project website hosted on Boulder County's webpage. The website contains static information including project overview, project schedule, to-date safety progress in each of the jurisdictions, an opportunity to sign up for project updates, FAQs, and program contact information. It also includes information that is updated regularly including public engagement opportunities, upcoming public meetings, and past public meeting recordings and presentations. The Partners promoted the project website with their constituents, and the project team included the website address and QR code on all promotional and engagement materials.

The website can be accessed by QR code, by the abbreviated weblink, or by the full weblink:

QR Code: Abbreviated weblink: https://boco.org/visionzeroactionplan

Full weblink: https://bouldercounty.gov/transportation/multimodal/vision-zero-action-plan/

Social Media

The project team assembled a social media calendar to promote the Draft Plan and online survey completion. The project team worked with the Boulder County communications teams to push content out through their social media channels. Each social media calendar included text content, images, and outlined the platforms for distribution (Twitter [X], Facebook, Instagram, Nextdoor, LinkedIn) for each post.

Newsletter

The project team drafted a news release to be distributed to residents explaining the Vision Zero Action Plan project and how residents can get involved and provide feedback. The newsletter content was emailed to website subscribers of Boulder County News, Cyclist News, Media Only, Transportation News, or Vision Zero (13,328 recipients).

Stakeholder Engagement

A Steering Committee was formed to help foster and shape the development of the Vision Zero Action Plan. The Steering Committee consisted of members from Boulder County, Lafayette, Superior, Nederland, Colorado Department of Transportation (CDOT), and advocacy agencies. Throughout the project duration, the team facilitated meetings with the Steering Committee, and targeted meetings as needed. The Steering Committee convened once during Phase 3.

Steering Committee Meeting #3

On April 23, 2025, the project team hosted a virtual meeting with members of the Steering Committee. The team reviewed information about the project scope, background, and schedule, then provided an overview of the Strategy and Action development process. For each Draft Plan, the Steering Committee members were invited to visit an interactive online board presenting the draft Strategies and Actions. As the project team reviewed the draft content, participants placed sticky notes with comments or questions. Steering Committee members were also prompted to identify actions that their organization could actively support or implement, as well as any potential gaps or key actions that were missing. The Steering Committee Meeting presentation and results of the interactive activity are available in Appendix A.

Community Engagement

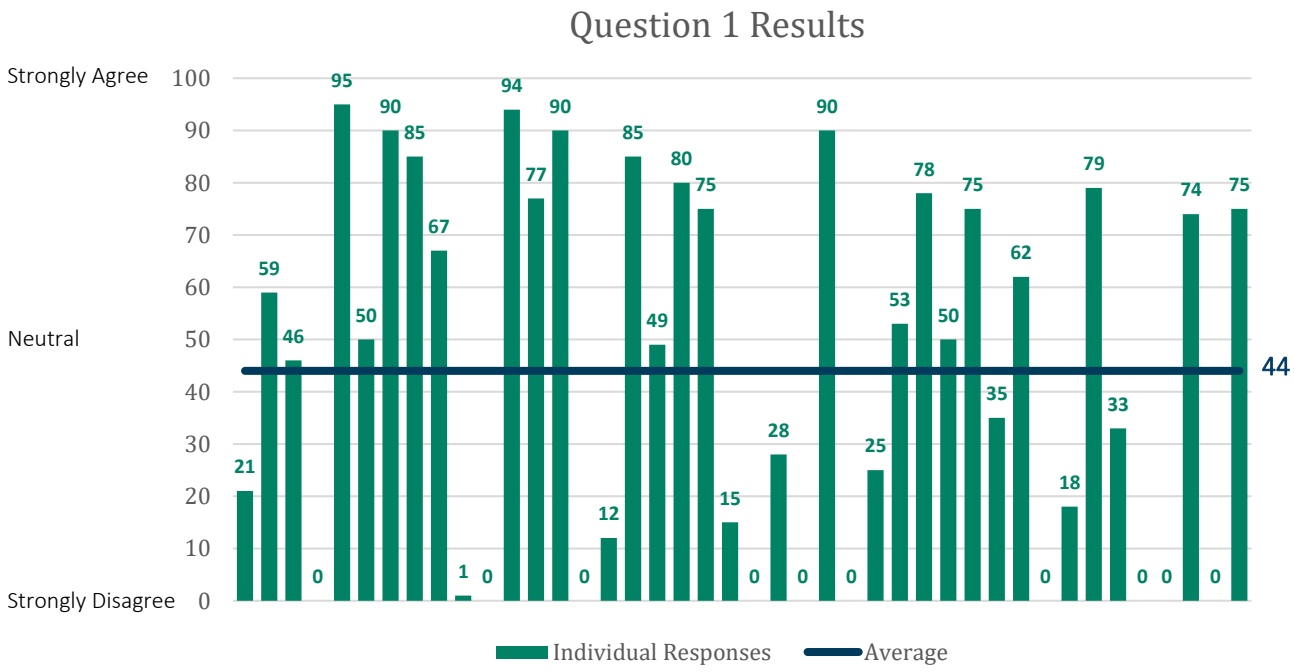
Community engagement strategies included an online survey referencing the digital version of the Draft Plan.

Online Survey

An online survey was shared with the public on SurveyMonkey and was open from May 27, 2025 through June 15, 2025 in both English and Spanish. The survey invited participants to review the full Draft Plan, then provide feedback about whether the Plan is effective in providing a roadmap to achieve Vision Zero. Participants were also able to provide open-ended comments relating to the Draft Plan. The full online survey can be viewed in Appendix B. There were 42 online survey results.

Question 1: Do you feel that this plan will be effective in providing a roadmap to achieve Vision Zero?

Participants were asked to indicate on a scale from 0 – 100 whether they agree that the plan will be effective in providing a roadmap to achieve Vision Zero, with a score of 0 equating to strongly disagree and a score of 100 equating to strongly agree. Within the 42 responses, scores were scattered along the full range of possible scores from 0 to 100. The average score was 44. The distribution of responses is indicated in the chart below.



Question 2: Please provide any additional thoughts related to Question 1 or other comments on the plan.

Participants were invited to share any additional thoughts on their answer to Question 1 or general feedback about the plan. Of the 42 participants, 33 provided open-ended comments. Additionally, detailed feedback from two community members was received through email communication to the project team and included in the analysis. Common themes from community feedback included:

- **Desire for enhanced enforcement (29% of open-ended responses)**, focused on speeding and other unsafe driver and cyclist behaviors.
- **Support for the plan (20% of open-ended responses),** including recognition that the plan is a step in the right direction towards addressing crash trends and eligibility for future funding opportunities.
- **Desire for additional educational measures (14% of open-ended responses)**, focusing on safe travel behavior for all users and current laws and regulations.
- **Request for more specific actions (14% of open-ended responses),** with concerns that the identified Strategies and Actions may not result in direct change.

Additional individual responses centered on feedback such as a desire for secure bike storage, consideration of roundabouts, concern about a lack of focus on rural roads, and the importance of detailed evaluation as implementation occurs.

Next Steps

The project team will use the Phase 3 outreach results to refine the final Vision Zero Action Plan, which is anticipated to be formally adopted in August 2025.

Appendices

Appendix A: Steering Committee Meeting Materials

Boulder County, Superior, & Lafayette

VISION ZERO ACTION PLANS

Steering Committee Meeting #4

April 23, 2025

Please Introduce Yourself in the Chat

- Name
- Organization
- What Action Plan you are interested in today?
  - Boulder County
  - Lafayette
  - Superior
  - Combination of two of them (list which two)
  - All of them

Meeting Goals and Format Overview

Meeting Goals

- Share draft Strategies & Actions with the Steering Committee.
- Gather feedback on how Strategies & Actions meet the goal of achieving Vision Zero.
- Understand how the represented groups in the Steering Committee can support and assist with completion of Strategies & Actions.





Meeting Agenda

- Introductions (1:05 – 1:10)
- Agenda & Background (1:10 – 1:15)
- Strategy and Action Development & Review (1:15 – 2:15)
  - Boulder County Overview (1:15 - 1:35)
  - Lafayette Overview (1:35-1:55)
  - Superior Overview (1:55-2:15)
- Group Discussion (2:15-2:25)
- Next Steps (2:25-2:30)





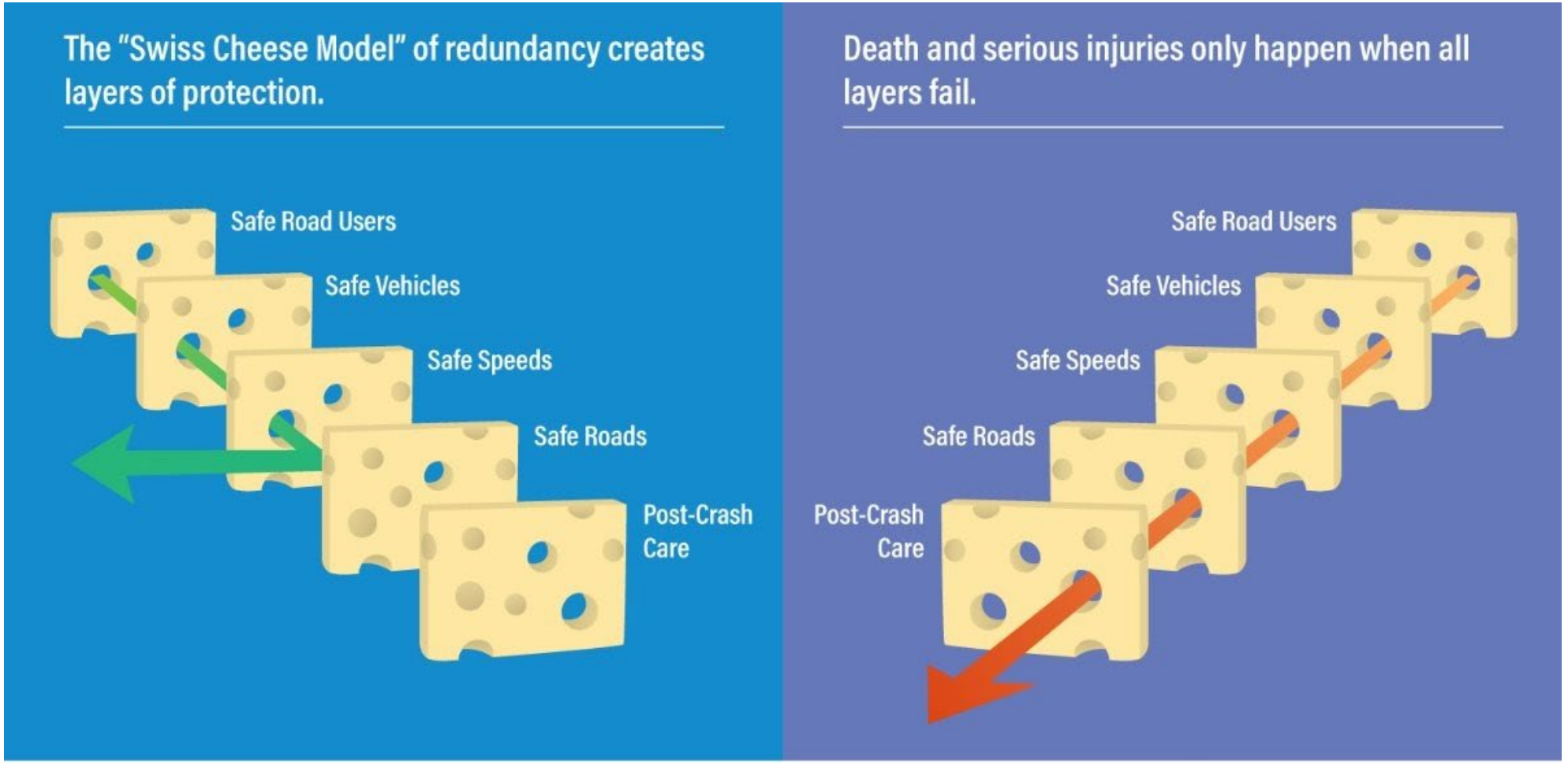
Vision Zero & Safe System Approach

Goal: Eliminate all traffic fatalities and serious injury crashes

TRADITIONAL APPROACH		VISION ZERO
Traffic deaths are **INEVITABLE**		Traffic deaths are **PREVENTABLE**
PERFECT human behaviour	VS	Integrate **HUMAN FAILING** in approach
Prevent **COLLISIONS**		Prevent **FATAL AND SEVERE CRASHES**
INDIVIDUAL responsibility		**SYSTEMS** approach
Saving lives is **EXPENSIVE**		Saving lives is **NOT EXPENSIVE**

Source: Vision Zero Network

Vision Zero & Safe System Approach



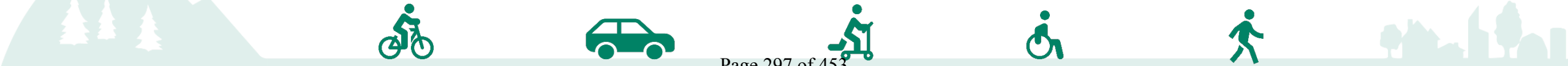
The Safe System Approach

CAMBRIDGE SYSTEMATICS

GHSA Governors Highway Safety Association

Action Plan Development

- Deliver three standalone Vision Zero Action Plans:
  1. **Boulder County** – includes unincorporated, State Highways, Jamestown, Nederland, and Ward
  2. **City of Lafayette**
  3. **Town of Superior**
- Create list of specific actions, noting responsibility and potential funding sources for implementation.



Schedule

Draft Recommendations for Review

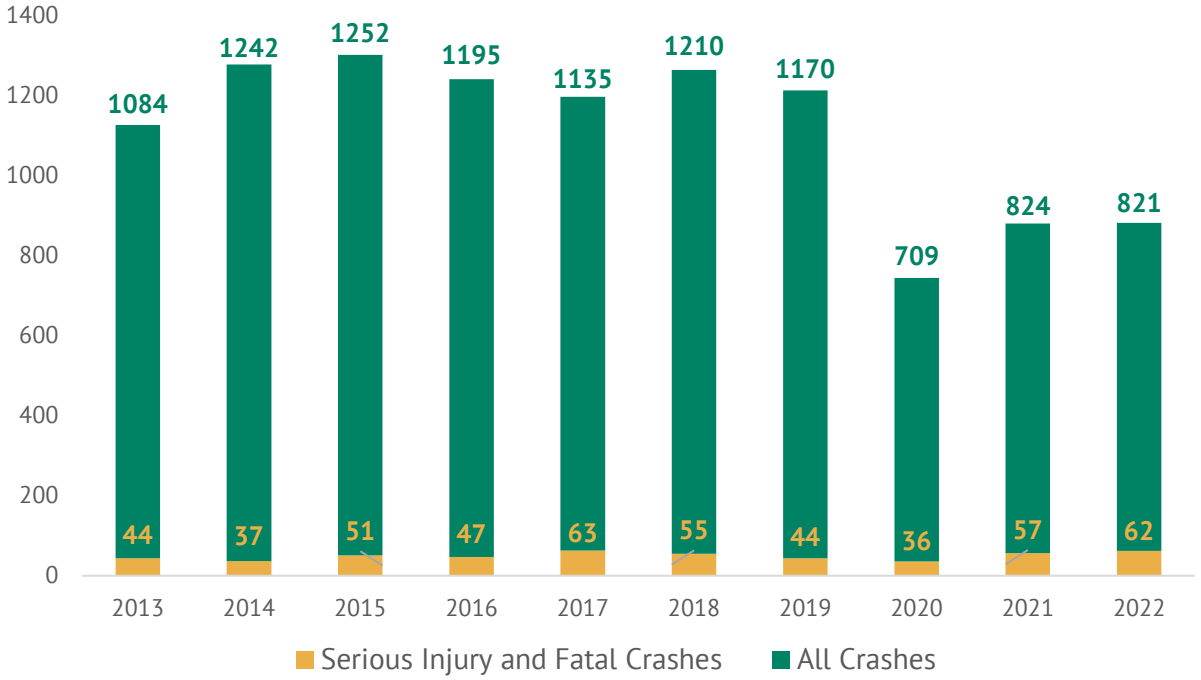
March-April 2025	*April 2025*	*May 2025*	*May/June 2025*	*Summer 2025*
Stakeholder Engagement	Finalize Draft Plans	Community Review of Draft Plans	Finalize Action Plans	Adoption
• Meet with: Emergency Services, Elected Officials, Steering Committee	• Based on feedback from Stakeholder engagement	• Plans open to the public for review & comment	• Finalize plans based on public comment	• Adoption will occur for each agency

Overview of Strategy & Action Development

- Organized by Safe System Focus Areas
- Designed to address the top crash types resulting in serious injuries or fatalities
- Overarching strategies with tangible actions

Boulder County Action Plan Update (1:15 – 1:35)

Boulder County: Safety Analysis

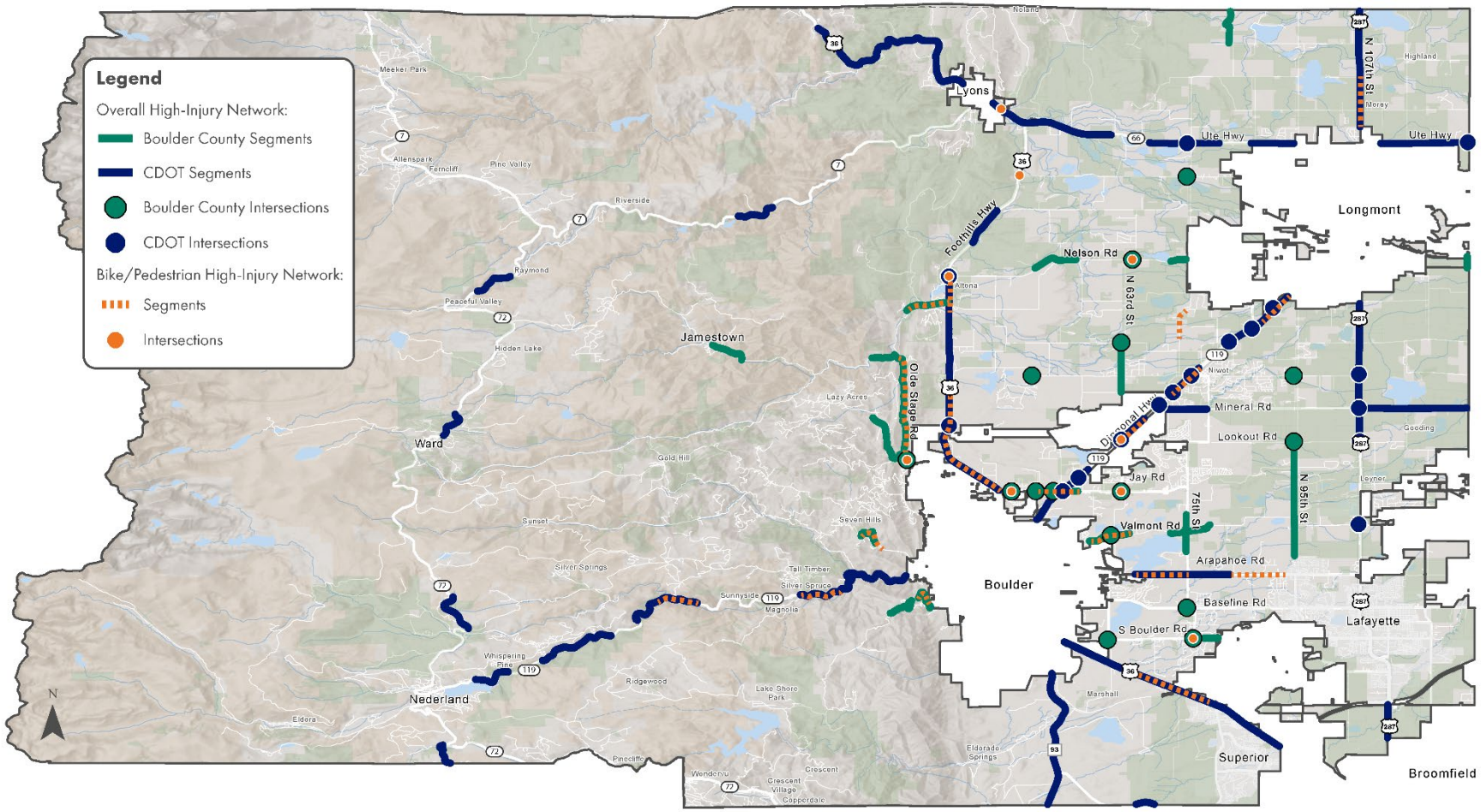


Over 10 years, **123** people died in traffic crashes in the Project Area

Although the number of crashes has decreased in recent years, **the percent of serious injury and fatal crashes has increased** since 2020

Source: Colorado Department of Transportation (CDOT) crash data

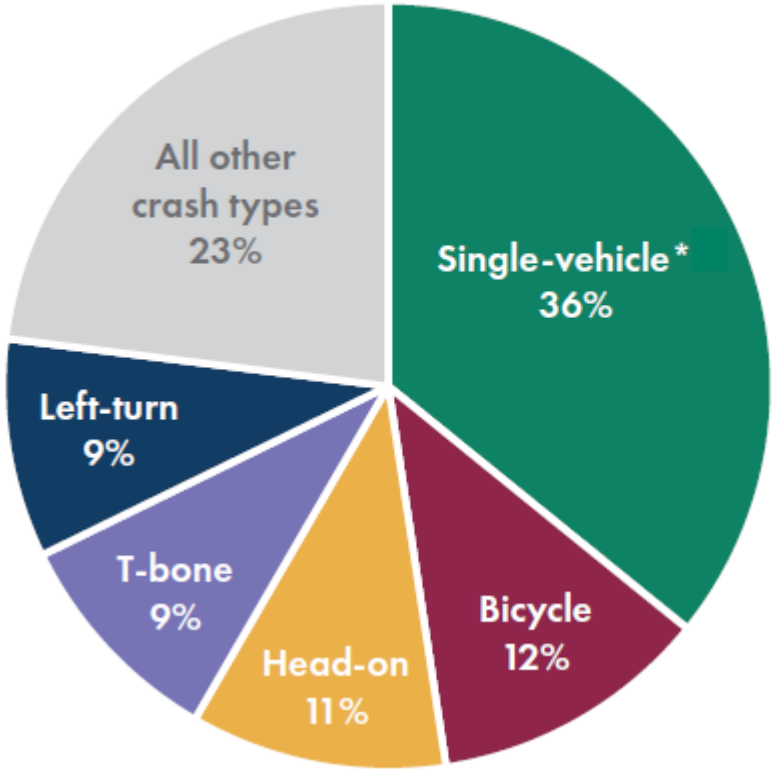
Boulder County: High Injury Network



Boulder County: Top 5 Crash Types

Top Serious Injury and Fatal Crash Types

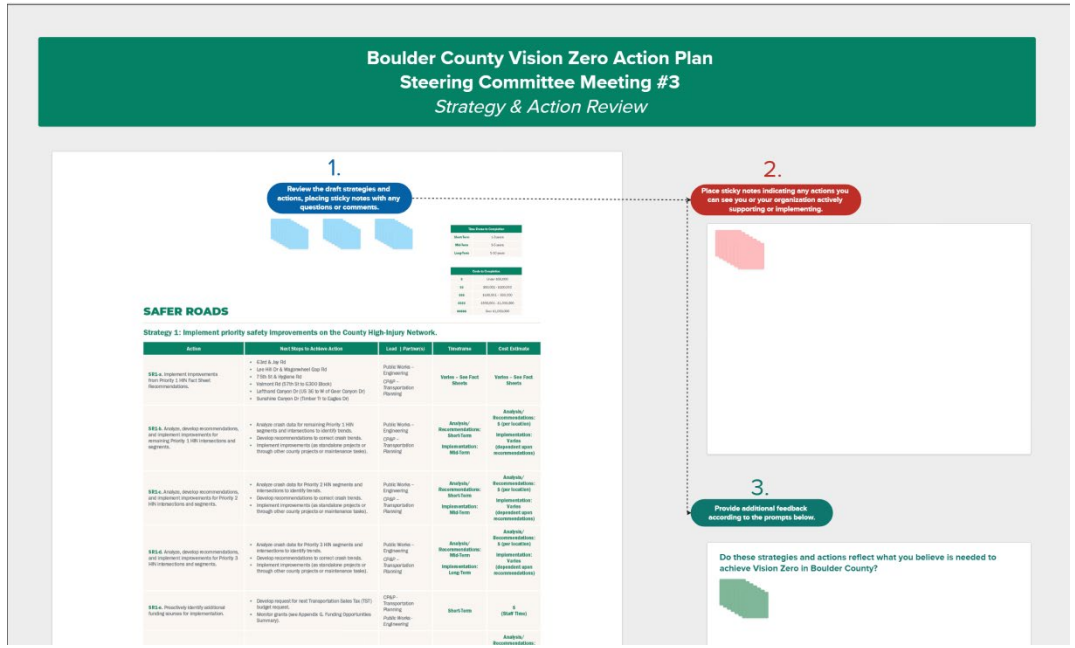
The top five serious injury and fatal crash types account for 77% of the serious injury and fatal crashes.



**Examples of single-vehicle crashes include departing the road, colliding with fixed objects, and overturning vehicles.*

Boulder County Strategy / Action Review

- Mural Board Activity



Boulder County Vision Zero Action Plan
Steering Committee Meeting #3
Strategy & Action Review

1.

Review the draft strategies and actions, placing sticky notes with any questions or comments.

2.

Place sticky notes indicating any actions you can see you or your organization actively supporting or implementing.

3.

Provide additional feedback according to the prompts below.

Time Frame to Completion	
Short-Term	1-3 years
Mid-Term	3-5 years
Long-Term	5-10 years

Costs to Completion	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 - 500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

SAFER ROADS

Strategy 1: Implement priority safety improvements on the County High-Injury Network.

I must admit, this mural is a little confusing to me. Where is the HIN fact sheet? Here are some thoughts: action SR1-a make it more clear that you are talking about intersections at Lee Hill and Wagonwheel in particular to avoid the public thinking we are planning a major project on all of Lee Hill. Alexandra

where is the fact sheet?

the lead/partner column might be a little confusing for the public- this is a plan produced by the county, PW and CP&P are part of the county. Maybe make that more clear. Also, not sure why it says Public Works-Engineering. Are you trying to differentiate between engineering and road maintenence? Alexandra

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR1-a. Implement improvements from Priority 1 HIN Fact Sheet Recommendations.	• 63rd & Jay Rd • Lee Hill Dr & Wagonwheel Gap Rd • 75th St & Hygiene Rd • Valmont Rd (57th St to 6300 Block) • Lefthand Canyon Dr (US 36 to W of Geer Canyon Dr) • Sunshine Canyon Dr (Timber Tr to Eagles Dr)	Public Works – Engineering *CP&P – Transportation Planning*	Varies – See Fact Sheets	Varies – See Fact Sheets
SR1-b. Analyze, develop recommendations, and implement improvements for remaining Priority 1 HIN intersections and segments.	• Analyze crash data for remaining Priority 1 HIN segments and intersections to identify trends. • Develop recommendations to correct crash trends. • Implement improvements (as standalone projects or through other county projects or maintenance tasks).	Public Works – Engineering *CP&P – Transportation Planning*	Analysis/ Recommendations: Short-Term Implementation: Mid-Term	Analysis/ Recommendations: $ (per location) Implementation: Varies (dependent upon recommendations)
SR1-c. Analyze, develop recommendations, and implement improvements for Priority 2 HIN intersections and segments.	• Analyze crash data for Priority 2 HIN segments and intersections to identify trends. • Develop recommendations to correct crash trends. • Implement improvements (as standalone projects or through other county projects or maintenance tasks).	Public Works – Engineering *CP&P – Transportation Planning*	Analysis/ Recommendations: Short-Term Implementation: Mid-Term	Analysis/ Recommendations: $ (per location) Implementation: Varies (dependent upon recommendations)
SR1-d. Analyze, develop recommendations, and implement improvements for Priority 3 HIN intersections and segments.	• Analyze crash data for Priority 3 HIN segments and intersections to identify trends. • Develop recommendations to correct crash trends. • Implement improvements (as standalone projects or through other county projects or maintenance tasks).	Public Works – Engineering *CP&P – Transportation Planning*	Analysis/ Recommendations: Mid-Term Implementation: Long-Term	Analysis/ Recommendations: $ (per location) Implementation: Varies (dependent upon recommendations)
SR1-e. Proactively identify additional funding sources for implementation.	• Develop request for next Transportation Sales Tax (TST) budget request. • Monitor grants (see Appendix G. Funding Opportunities Summary).	CP&P - Transportation Planning *Public Works - Engineering*	Short-Term	$ (Staff Time)
SR1-f. Implement already planned, ongoing, or upcoming county safety projects.	• 61st St/Valmont Rd Intersection Improvement Project • 95th St/Lookout Rd Intersection Improvements Project • LoBo Trail - Jay Rd Connections Project	Public Works – Engineering *CP&P – Transportation Planning*	Analysis/ Recommendations: Mid-Term Implementation: Long-Term	Analysis/ Recommendations: $ (per location) Implementation: Varies (dependent upon recommendations)

or a fee instead of tax?

Strategy 2: Partner with CDOT to implement priority safety improvements on the CDOT High-Injury Network.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR2-a. Provide CDOT HIN intersection data and priorities to CDOT for the next Intersection Prioritization Study.	• Assemble crash data and rankings/priorities for CDOT HIN intersections. • Send data to CDOT.	CP&P – Transportation Planning *CDOT*	Short-Term	$
SR2-b. Provide CDOT HIN segment data and priorities to CDOT for consideration for future projects.	• Assemble crash data and rankings/priorities for CDOT HIN segments. • Send data to CDOT.	CP&P – Transportation Planning *CDOT*	Short-Term	$
SR2-c. Coordinate and collaborate with CDOT on relevant grant applications for CDOT HIN roadways.	• Monitor grants (see Appendix G. Funding Opportunities Summary).	CP&P – Transportation Planning *CDOT*	Ongoing	Varies (dependent upon project application / local match)
SR2-d. Continue supporting CDOT and teams in key regional safety corridors and implementing recommendations from studies.	• US 287 • CO 119 • US 36 - North Foothills Highway	CDOT *CP&P – Transportation Planning*	Ongoing	$ (Staff Time)

CO 7

Strategy 3: Implement priority safety improvements on the Bicycle/Pedestrian High-Injury Network.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR3-a. Complete safety analysis, identify recommendations, and implement improvements at county locations that are in the Bike/Ped HIN.	• Complete at the following locations: • Olde Stage Rd (Lefthand Canyon Rd to Lee Hill Dr) • 65th Street & Nelson Road • Sunshine Canyon Rd (Timber Trail to Eagles Dr) • Valmont Rd (57th St to 6300 block) • Flagstaff Rd (Gregory Ln to Mile Marker 1) • Lefthand Canyon Rd (US 36 to W of Geer Canyon Dr) • 73rd St (E of Plateau Rd to N of Nimbus Rd) • S Boulder Rd & 76th St • Jay Rd (30th St to 63rd St)	Public Works – Engineering *CP&P – Transportation Planning*	Short- to Mid-Term	$$$ – $$$$$
SR3-b. Provide Bike/Ped HIN data and priorities to CDOT for the next Bike and Pedestrian Safety Study.	• Locations include: • Boulder Canyon Dr (Mile Marker 33-34 and Mile Marker 37-38) • US 36 (Broadway to 26th St) • Arapahoe Rd (Arapahoe Ridge High School to Boulder County Boundary) • Foothills Hwy (US 36) (Longhorn Rd to Nelson Rd) • Foothills Hwy (US 36) and Hygeine Rd • US 36 (Jay Rd to Longhorn Rd) • US 287 (County Rd 4 to S of Mile Marker 319) • US 66 & Stone Canyon Dr	CP&P – Transportation Planning *CDOT*	Short-Term	$

Strategy 4: Proactively implement systemwide priority safety improvements.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SR4-a. Add reflective traffic signal backplates at signalized intersections.	• Identify signalized intersections in the county that do not have reflective traffic signal backplates and identify funding for implementation.	Public Works – Engineering	Short-Term	$ (per location)
SR4-b. Add tubular reflectors to sign posts and stop signs.	• Identify number of sign posts/stop signs and identify funding for implementation.	Public Works – Engineering *CP&P – Transportation Planning*	Short-Term	$ (per location)
SR4-c. Evaluate intersection controls, identify recommendations, and implement improvements (including potential conversion to roundabouts).	• Utilize the CDOT Intersection Control Assessment Tool (ICAT) tool.	Public Works – Engineering *CP&P – Transportation Planning*	Short-Term	$ (per location)
SR4-d. Implement flashing yellow arrows at signalized intersections.	• Identify signalized intersections with "doghouse" style left-turn signal heads. • Confirm traffic signal cabinets are able to accommodate new traffic signal head infrastructure • Identify funding for upgrading traffic signal heads and cabinets, if updated infrastructure is necessary.	Public Works – Engineering	Short-Term	$ – $$ (per location)
SR4-e. Identify intersections and pedestrian/bicycle crossings with no roadway lighting and install intersection lighting.	• Identify intersections that do not have intersection lighting and pedestrian/bicycle crossings that do not have lighting within 100 feet of the crossing. • Identify funding oppurtunties for installation of new lighting and prioritize locations that are on the HIN.	Public Works – Engineering	Mid-Term	$$ – $$$ (per location)
SR4-f. Develop Signal Operation Guidelines addressing left-turn operations, Leading Pedestrian/Bike Intervals, No Right Turn on Reds at signalized intersections.	• Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering	Mid-Term	$$$
SR4-g. Develop Boulder County Pedestrian Crossing Treatment Installation Guidelines to guide where to install marked crossings and pedestrian signals.	• Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering *CP&P – Transportation Planning*	Mid-Term	$$$
SR4-h. Implement safety improvements for culverts that don't meet clear zone requirements	• Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering *CP&P – Transportation*	Mid- to Long-Term	$$$$
SR4-i. Analyze, develop recommendations, and implement improvements that address the top crash types, using Appendix E. Countermeasure Toolkit.	• Prioritize crash types. • Identify if will be developed in-house or through a consultant. • Develop scope. • Obtain funding (if needed).	Public Works – Engineering *CP&P – Transportation Planning*	Short- to Long-Term	Analysis/ Recommendations: $ (per crash type) Implementation: Varies (dependent upon recommendations)

these should be protected intersections, not permissive!

SAFER SPEEDS

Strategy 1: Implement automated speed enforcement to reduce speeding.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SS1-a. Work with the BOCC and CDOT to implement automated speed enforcement on CDOT roads.	• Initial priorities: • US 36 (Boulder's northern city limits to CO 66) • US 287 (Lafayette's northern city limits to the southern city limits of Longmont) • US 287 (Longmont's northern city limits to Boulder County's northern limits)	Public Works – Engineering	Short-Term	$$
SS1-b. Analyze, develop recommendations, and implement automated speed enforcement on county roads.	• Propose roads to the BOCC for consideration.	Public Works – Engineering	Mid- to Long-Term	$$$

Strategy 2: Implement engineering solutions to reduce speeding.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SS2-a. Review, update, and implement the county's speed limit setting and signing practices.	• Coordinate a project team to outline areas in existing practices that require further review and research. • Prioritize actions and roadways for implementing changes and secure funding.	Public Works – Engineering	Mid- to Long-Term	$$
SS2-b. Incorporate speed-related design elements (e.g. traffic calming) into the upcoming update to the county's Multimodal Transportation Standards.	• Work with County Engineer to identify timeline and scope.	Public Works – Engineering *CP&P – Transportation Planning*	Short-Term	$$
SS2-c. Identify county roads with a high number of speed-related crashes, and install traffic calming devices where appropriate.	• Develop a process to automate the identification of high-speed crashes with the Sheriff's Office and CSP and prioritize roadways based on analysis results.	Public Works – Engineering *Sheriff's Office* *Colorado State Patrol (CSP)*	Mid-Term	$ – $$$$$
SS2-d. Identify CDOT state highways with a high number of speed-related crashes, and work with CDOT to implement solutions.	• Develop a process to automate the identification of high-speed crashes with Sheriff's Office, CSP, and CDOT and prioritize roadways based on analysis results.	Public Works – Engineering *CDOT*	Mid-Term	$ – $$$$$

SAFER PEOPLE

Strategy 1: Empower Boulder County community members to be Vision Zero stewards.

Education, information campaign tied to SRTS VZAP, and potential SRTS Ambassador program?

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SP1-a. Expand and distribute roadway safety messaging and campaigns, building off messaging developed by partners (e.g., CDOT, CSP, DRCOG, NHSTA).	• Review existing programs and identify opportunities to collaborate.	CP&P – Transportation Planning *CP&P – Communications* *CDOT* *CSP* *DRCOG* *NHSTA*	Short-Term	$$
SP1-b. Explore the creation of an ambassador program to promote roadway safety.	• Work with Commuting Solutions to create, implement, and evaluate a pilot program.	CP&P – Transportation Planning *Commuting Solutions*	Mid-Term	$$
SP1-c. Continue convening the Vision Zero Community Partnership (VZCP).	• Continue developing content for and facilitating quarterly meetings.	CP&P – Transportation Planning	Short-Term	$
SP1-d. Create consistent countywide Vision Zero branding and messaging.	• Develop Vision Zero graphics that can be used by agencies countywide.	CP&P – Transportation Planning *CP&P – Communications*	Short-Term	$
SP1-e. Implement additional training for Boulder County staff related to vehicle operations.	• Research peer agency programs.	CP&P – Transportation Planning *Public Works – Fleet Services* *Public Works – Human Resources*	Mid-Term	$$$
SP1-f. Offer roadway safety training to the community through Mobility 4 All.	• Review existing training and develop scope.	CP&P – Transportation Planning	Short-Term	$

Strategy 2: Address red-light running crashes.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SP2-a. Evaluate and implement recommendations for county intersections, including but not limited to red-light cameras.	• Initial priorities: • South Boulder Road & Cherryvale Road • 75th Street & Valmont Road	Public Works – Engineering	Short-Term	$ – $$$ (per location)
SP2-b. Evaluate and implement recommendations for CDOT intersections, including but not limited to red-light cameras.	• Initial priorities: • US 287: Mineral Road, Isabelle Road • Secondary priorities (a few years after construction is complete): • CO 119: Niwot Road, 63rd Street, Mineral Road, and 55th Street	Public Works – Engineering *CDOT*	Short- to Mid-Term	$ – $$$ (per location)

SAFETY DATA AND REPORTING

Strategy 1: Track and report Vision Zero progress.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SD1-a. Report on Vision Zero progress annually.	• Develop a report template for the VZAP action items and metrics and create report annually.	CP&P – Transportation Planning *CP&P – Communications*	Short-Term	$
SD1-b. Monitor and analyze ongoing crashes.	• Update VZAP key charts and maps and analyze changes in trends.	CP&P – Transportation Planning	Short-Term	$
SD1-c. Develop a public-facing Vision Zero Dashboard.	• Determine scope and system requirements.	CP&P – Transportation Planning *CP&P – Communications* *CSP*	Mid-Term	$$

Strategy 2: Improve the quality and completeness of safety data.

DRCOG Crash Data Dashboard covers all of Boulder County - Erik Braaten

DRCOG has several devices for bike counts that could be used by local govs

Great idea! Particularlyy valuable if they have information about the location of these crashes

estimates are up to 25% of serious injuries are not on the PD reports

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
SD2-a. Implement a safety data tool to improve data quality and facilitate analysis of crash data.	• Research programs used by peer agencies (e.g., CDOT) and implement solution that best meets county needs and budget.	Public Works – Engineering *CP&P – Transportation Planning*	Short-Term	$$ – $$$
SD2-b. Research ways to obtain supplemental data for bicycle and pedestrian crashes/close calls.	• Review peer agency programs such as FHWA's Pedestrian and Bicycle Crash Analysis Tool (PBCAT). • Coordinate with hospitals and urgent care facilities to re data about vulnerable user injuries re fic crashes.	CP&P – Transportation Planning *Public Works – Engineering*	Mid-Term	$
SD2-c. Research ways to obtain more complete and accurate multimodal counts.	• Review count programs and related budgets of peer agencies.	CP&P – Transportation Planning *Public Works – Engineering*	Short-Term	$
SD2-d. Evaluate telematics data from other Boulder County departments related to safety.	• Coordinate with Parks & Open Space about ongoing implementation and Fleet Services' upcoming implementation (2025).	CP&P – Transportation Planning *Parks and Open Space* *Fleet Services* *Public Works – Engineering*	Short-Term	$

OTHER ACTIONS

Strategy 1: Evaluate Boulder County road maintenance practices to enhance safety.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA1-a. Analyze, develop recommendations, and implement improvements to the county's road sweeping practices.	• Research peer agency best practices and determine if adjustments to current practices are warranted.	Public Works – Engineering *CP&P – Transportation Planning*	Mid-Term	$ – $$$
OA1-b. Analyze, develop recommendations, and implement improvements to the county's snow removal practices.	• Research peer agency best practices and determine if adjustments to current practices are warranted.	Public Works – Engineering *CP&P – Transportation Planning*	Mid-Term	$ – $$$

Strategy 2: Collaborate with County school districts on Vision Zero.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA2-a. Develop a Safe Routes to School Vision Zero Action Plan (SRTS VZAP).	• Kick off project, including compiling project management team members, steering committee, and community outreach plan.	CP&P – Transportation Planning *Public Works – Engineering* *Boulder Valley and Saint Vrain School Districts (BVSD & SVSD)* *Other Boulder County Municipalities*	Short-Term	$$$
OA2-b. Implement recommendations from the SRTS VZAP short- and mid-term recommendations.	• Assign lead agencies/staff to short-term actions and secure funding.	CP&P – Transportation Planning *Public Works – Engineering* *Boulder Valley and Saint Vrain School Districts (BVSD & SVSD)* *Other Boulder County Municipalities*	Short- and Mid-Term	$ – $$$

Organization of "bike bus" programs?

Strategy 3: Honor the victims and families of those involved in traffic crashes.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA3-a. Develop a memorial sign program for victims of traffic crashes (at the request of the victim's family).	• Research peer city programs and review findings with families of past victims.	CP&P – Transportation Planning	Short-Term	$
OA3-b. Participate in World Day of Remembrance for Road Traffic Victims.	• Coordinate with VZCP and other partners to prepare for the upcoming commemoration on November 16, 2025. • Continue participation annually.	CP&P – Transportation Planning	Short-Term	$

Strategy 4: Collaborate with first responders.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA4-a. Continue the interdisciplinary crash analysis team (CAT) with Boulder County, CDOT, and first responders that analyzes ongoing fatal and serious injury crashes.	• Review current process and implement improvements if warranted.	CP&P – Transportation Planning *Public Works – Engineering* *CDOT* *CSP* *Sheriff's Office*	Ongoing	$
OA4-b. Explore collaboration with hospitals to learn more about post-crash care and injuries from unreported crashes.	• Coordinate with hospitals and urgent care facilities to share data about vulnerable user injuries resulting from traffic crashes.	CP&P – Transportation Planning	Short-Term	$

Strategy 5: Be active in Colorado transportation safety legislation.

Action	Next Steps to Achieve Action	Lead | *Partner(s)*	Timeframe	Cost Estimate
OA5-a. Continue advocating/participating in the development of relevant transportation safety legislation.	• Coordinate with the BOCC department on relevant state transportation safety legislation.	CP&P – Transportation Planning *BOCC*	Ongoing	$ (Staff Time)
OA5-b. Share clear messaging with the community about relevant transportation safety legislation, particularly new laws (e.g., Hands-Free Law, Bicycle Safety Stop, Automated Traffic Enforcement, etc.).	• Identify and distribute information through county channels.	CP&P – Transportation Planning *BOCC* *CP&P – Communications*	Ongoing	$ (Staff Time)

Do these strategies and actions reflect what you believe is needed to achieve Vision Zero in Boulder County?

Are there any major gaps or key actions that are noticeably missing?

Safe detours for bikes/ pedestrian through construction zones. Feasible detours.

May have missed it, but is Street Lighting included somewhere? And are there any connection pointwith trails?

Surprised to not see any goals for working w Fleet on safer vehicles

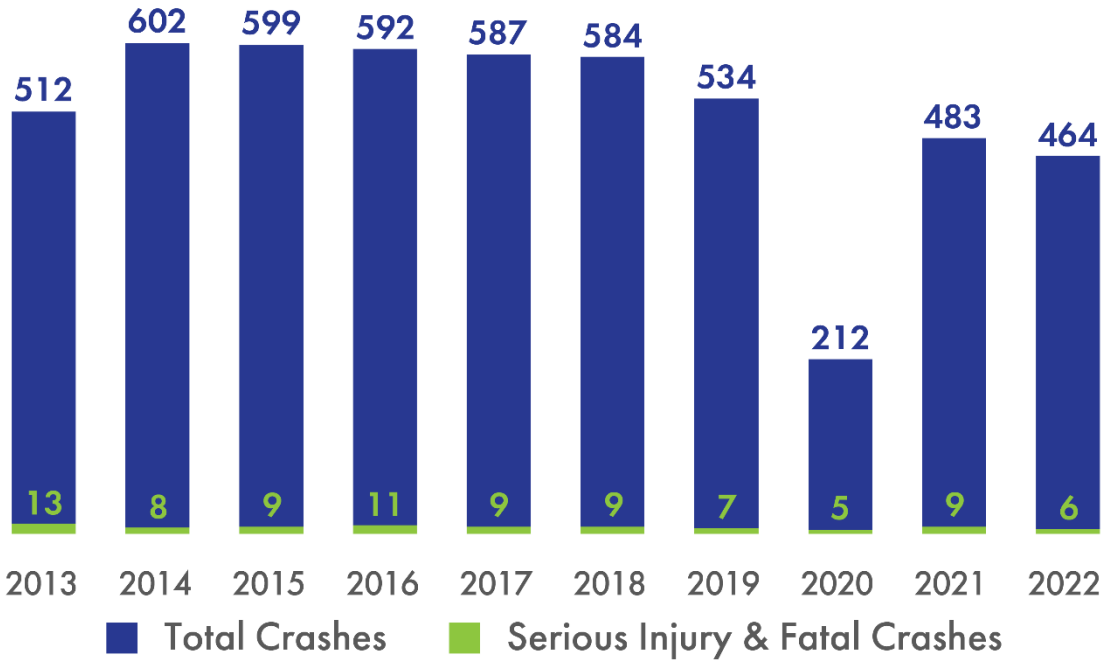
Great point about fleets. Transitioning public fleets trucks to "high vision" vehicles, or piloting. Like FHWA's recent webinar on "Ped Safety Through Vehicle Design."

State Highways seems to be a gap then?

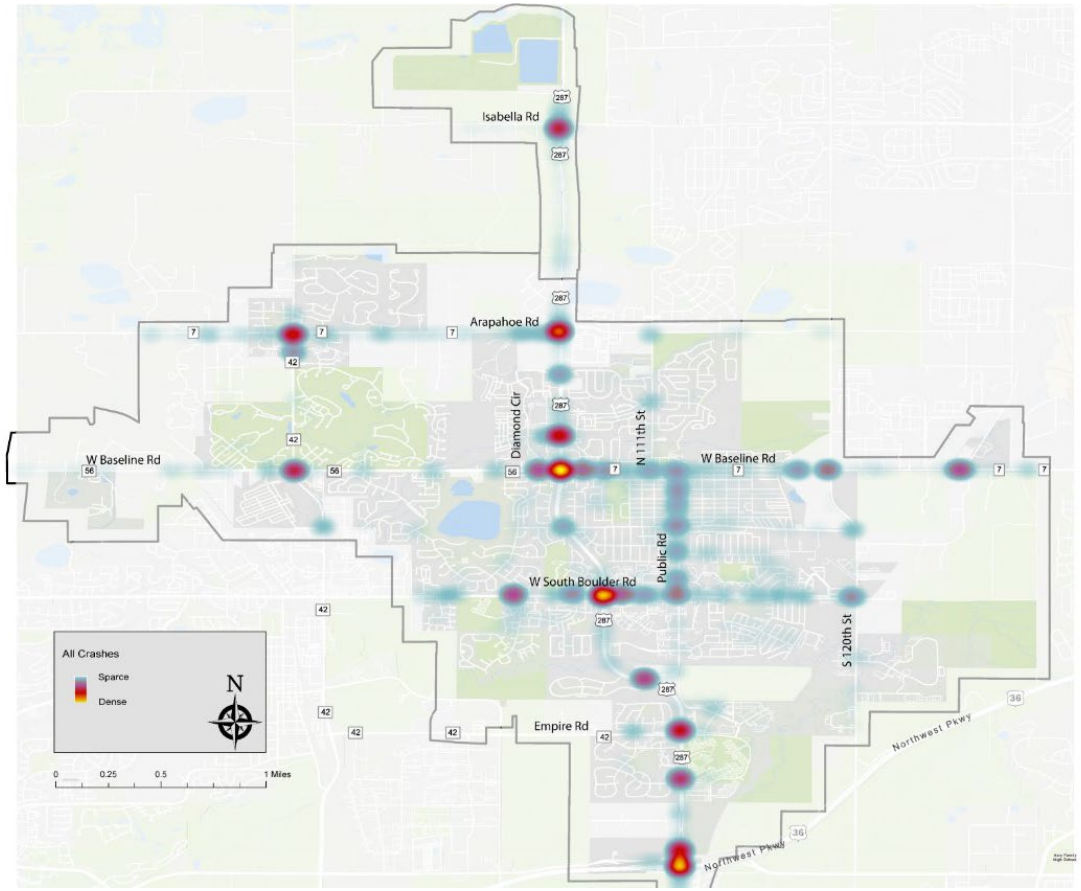
Lafayette Action Plan Update (1:35 – 1:55)

Lafayette: Safety Analysis

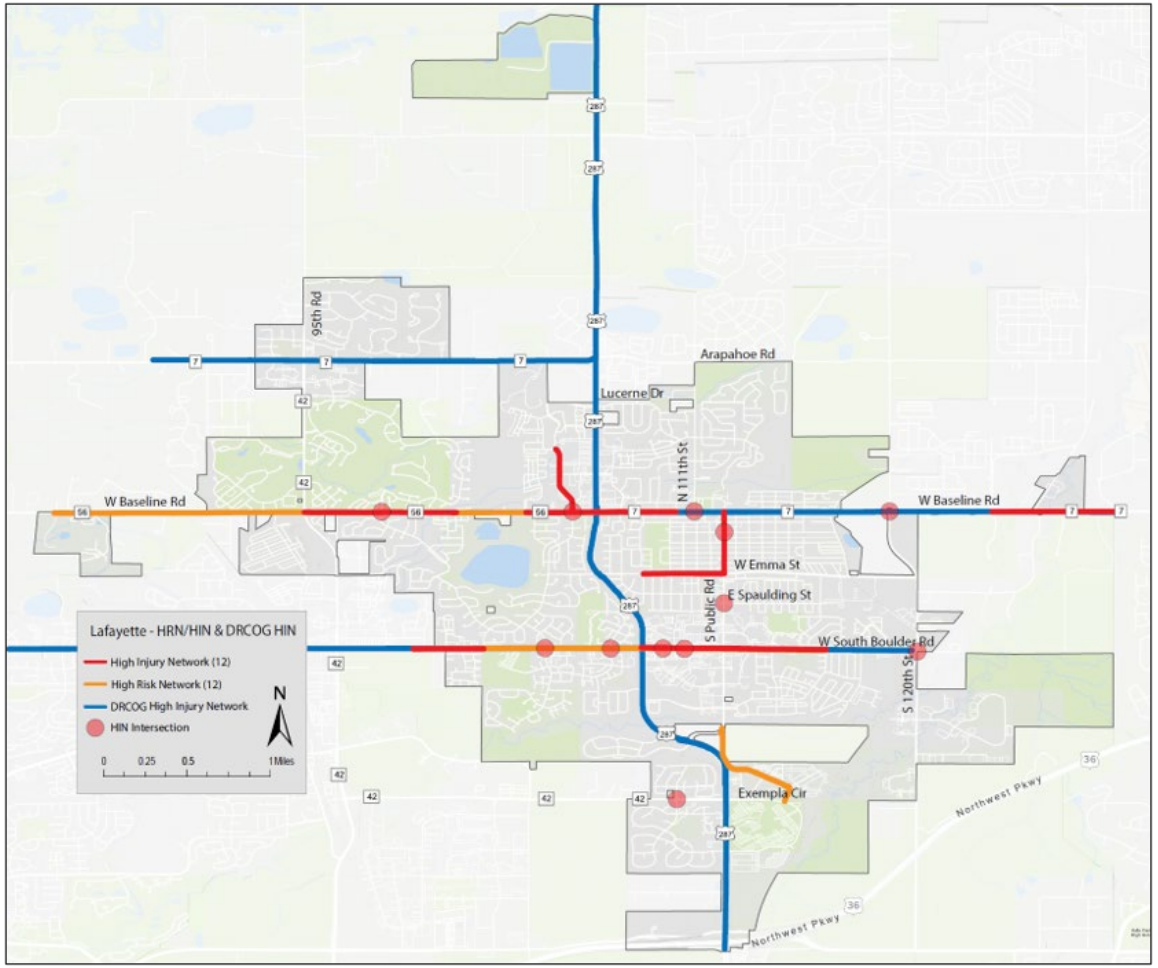
Over 10 years, there were **67** serious injury crashes and **19** fatal crashes in Lafayette



Source: Colorado Department of Transportation (CDOT) crash data

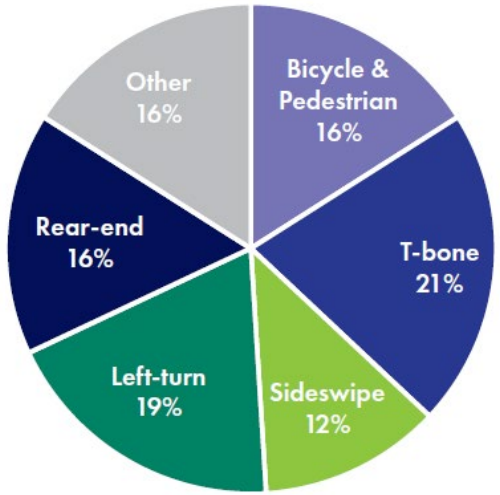


Lafayette: Comprehensive Safety Network



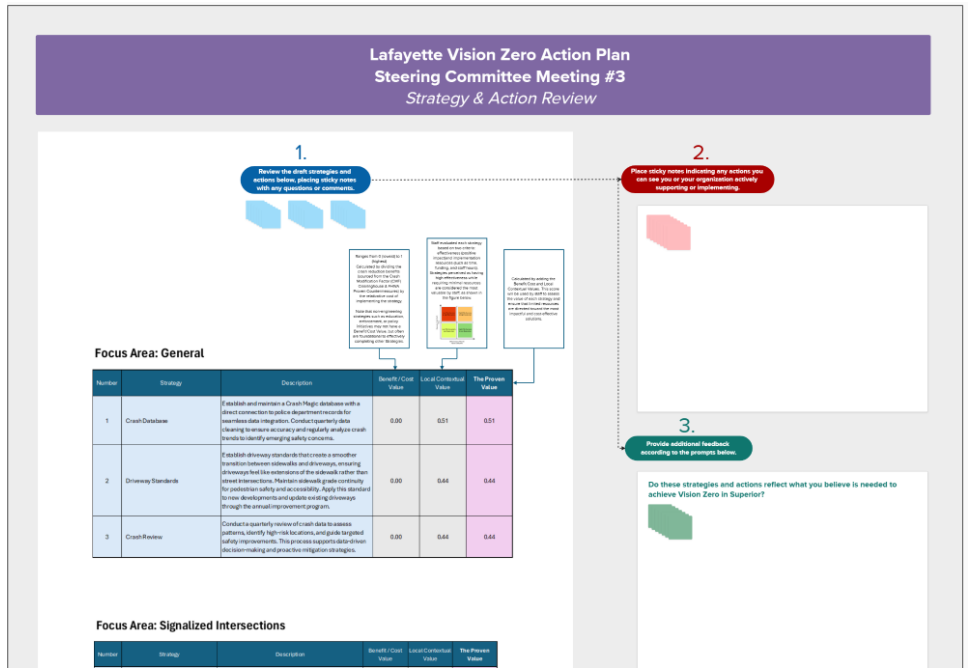
Top Serious Injury and Fatal Crash Types

The top five serious injury and fatal crash types account for 84% of the serious injury and fatal crashes.



Lafayette Strategy / Action Review

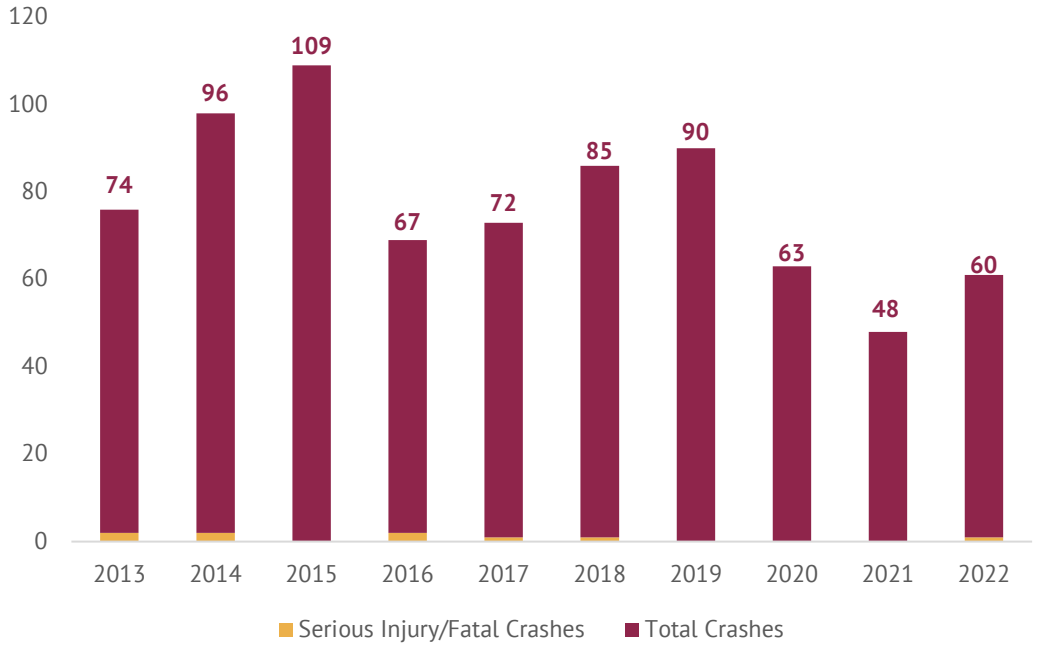
- Mural Board Activity



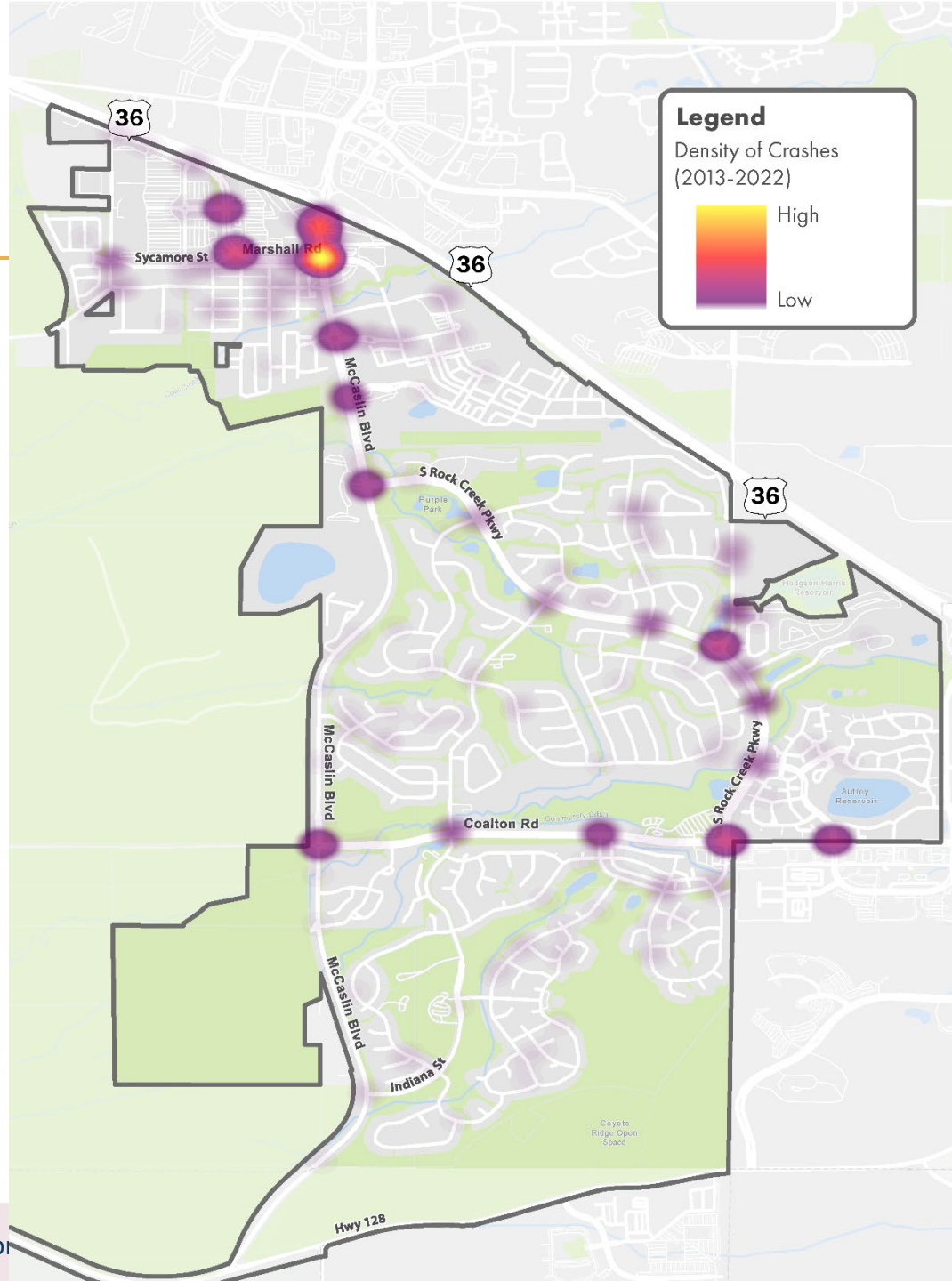
Superior Action Plan Update (1:55 – 2:15)

Superior: Safety Analysis

Over 10 years, there were 8 serious injury crashes and 1 fatality in Superior



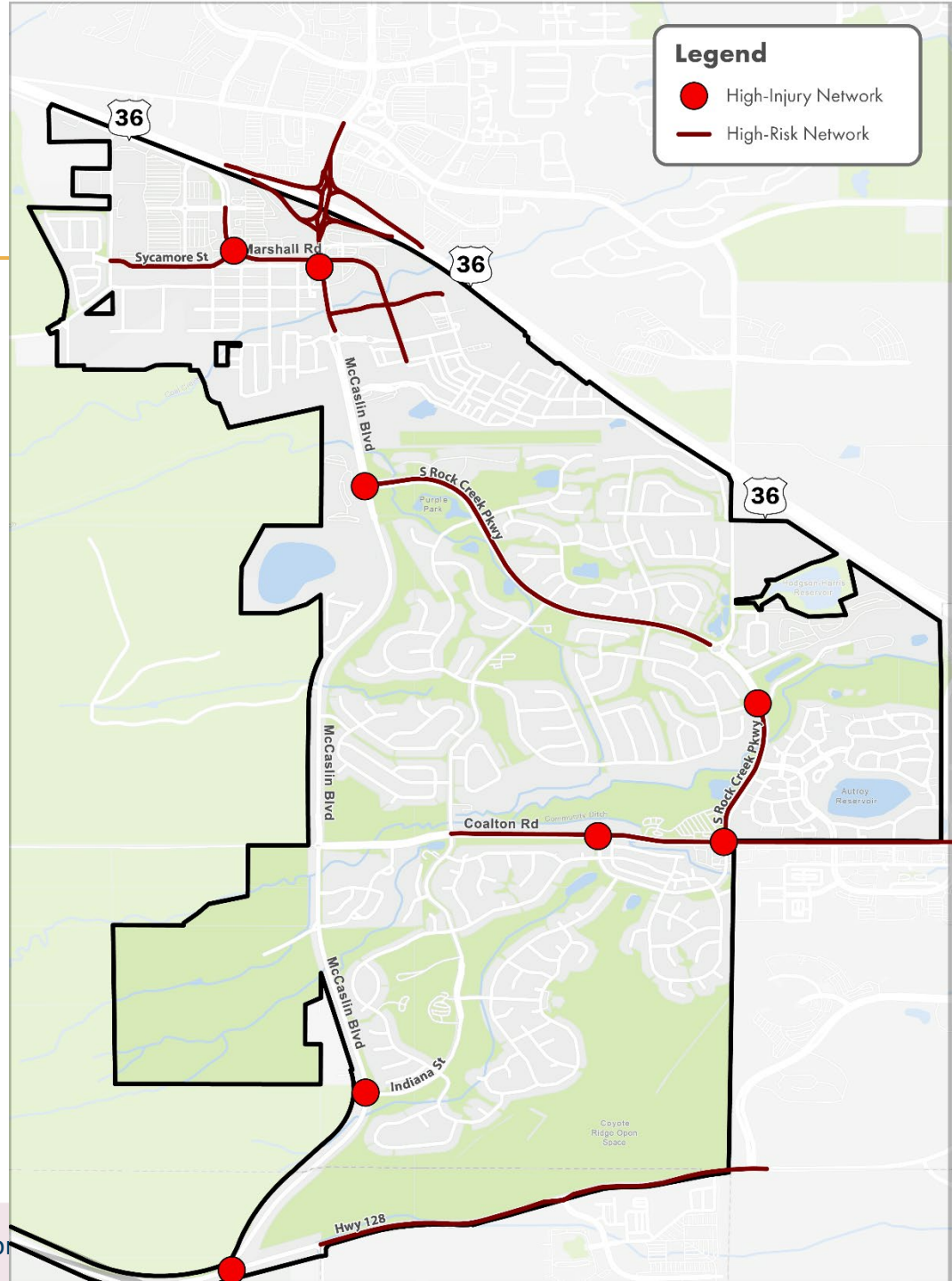
Source: Colorado Department of Transportation (CDOT) crash data



Superior: Comprehensive Safety Network

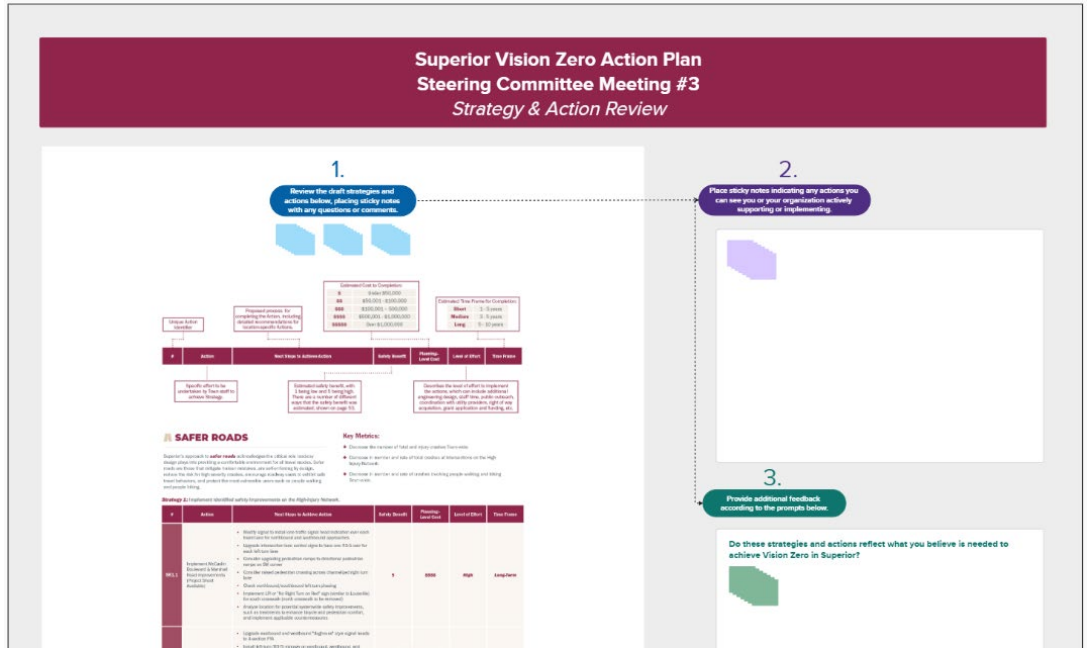
The most common crash types resulting in an injury in Superior were:

- ***Approach Turn*** (21% of all crashes)
- ***Bicycle Crashes*** (19% of all crashes)
- ***Broadside Crashes*** (13% of all crashes)
- ***Fixed-Object Crashes*** (11% of all crashes)
- ***Rear-End*** (9% of all crashes)
- ***Pedestrian*** (6% of all crashes)



Superior Strategy / Action Review

- Mural Board Activity



Group Discussion
(2:15 – 2:25)

Discussion – Share Out

- Is there anything that would be helpful for us to know as we consider implementing these Strategies & Actions?
- Are there specific strategies that you or your organizations can help champion?

Next Steps

Next Steps

- Revising Strategies & Actions based on discussion
  - Notes, PPT, and Strategies & Actions to follow; please provide additional input by 4/29
- May – Draft Plan Public Review Periods
  - We will send Steering Committee an update when draft Plans are available for review
- Summer 2025 – Plan Adoption!

Appendix B: Survey Questions

Boulder County Vision Zero Action Plan - Final Community Survey

Overview

The Boulder County Vision Zero Action Plan is a data-driven, community-informed strategy designed to eliminate serious injury and fatal crashes on roadways in Boulder County. The Vision Zero Action Plan was developed in partnership with the City of Lafayette and the Town of Superior and included community engagement opportunities throughout the process. The final plan incorporates feedback received, identifies key safety challenges, and outlines targeted actions and location-specific projects to create a safer and more connected multimodal transportation system.

Please review the Executive Summary or the full Action Plan, and then answer the following questions to let us know your thoughts about the plan.

Para acceder a la versión en español, haga clic aquí.

Boulder County Vision Zero Action Plan - Final Community Survey

Survey Questions

* 1. Do you feel that this plan will be effective in providing a roadmap to achieve Vision Zero?

Strongly Disagree Neutral Strongly Agree

2. Please provide any additional thoughts related to Question 1 or other comments on the plan.

Boulder County Vision Zero Action Plan - Final Community Survey

Thank you!

Thank you for participating in the development of the Boulder County Vision Zero Action Plan. If you'd like to receive updates on the Boulder County Vision Zero Action Plan progress, please sign up here.

APPENDIX B

SAFETY ANALYSIS TECHNICAL MEMORANDUM

Memorandum

Date: March 2025

To: Boulder County VZAP Team

From: Consor Engineers

Subject: Boulder County VZAP – Safety Analysis & HIN Methodology

Table of Contents

Introduction 5
Definitions 5
Methodology: Data Collection and Study Area 6
Safety Analysis Summary 6
County Roads versus CDOT Highways 10
Crash Type 12
Where Crashes Are Occurring 17
When Crashes Are Occurring 21
Who is Involved in Crashes 24
Crash Characteristics and Contributing Factors 27
High Injury Network (HIN) Development 29
Step 1: Prepare Network with Segmentation of Roads 30
Step 2: Define Weighting of Injury Crashes 30
Step 3: Intersection versus Road Segment Crashes 30
Step 4: Boulder County versus CDOT Segments and Intersections 30
Step 5: Developing a Threshold to Select HIN Segments and Intersections 31
Step 6: Refining the HIN 31
Bicycle & Pedestrian High Injury Network Development 32
Final Considerations 34
Appendix A: HIN Segments and Intersections - Ranked with Total Number of Weighted Crashes 35

Figures

Figure 1. All Crashes Over Time in Study Area 8
Figure 2. Severe and Fatal Crashes Over Time in Study Area 9
Figure 3. Boulder County roads versus CDOT Highways 11
Figure 4. Summary of Top All Crash Types and Serious Injury & Fatal Crash Types – All Roads 13
Figure 5. Summary of Top All Crash Types and Serious Injury & Fatal Crash Types – Boulder County Roads 14
Figure 6. Summary of Top All Crash Types and Serious Injury & Fatal Crash Types – CDOT Highways 14
Figure 7. Map of All Crashes in Study Area 18
Figure 8. Map of All Injury Crashes (Minor, Severe, Fatal) in Study Area 19
Figure 9. Map of All Serious Injury and Fatal Crashes in Study Area 20
Figure 10. Summary of Crash Location Description, All Crashes– Boulder County and CDOT Highways 21
Figure 11. All Crashes by Time of Day in Boulder County – All Roads 22
Figure 12. All Crashes and KSI Crashes by Month in Boulder County – All Roads 22
Figure 13. All Crashes Summary of Road Conditions – All Roads 23
Figure 14. All Crashes Summary of Lighting Conditions – All Roads 23
Figure 15. Summary of Vehicle Type at Fault - All Roads 24
Figure 16. Number of Bicycle and Pedestrian Crashes by Severity and Year 25
Figure 17. Number of Pedestrian and Bicycle Crashes by Month 25
Figure 18. Pedestrian, Bicycle, and Motorcycle Crashes Locations by Severity 26
Figure 19. High Injury Network Development Process 29
Figure 20. Boulder County High Injury Network 33

Tables

Table 1. Summary of Crashes by Area and CDOT Highways versus Boulder County Roads 7
Table 2. Summary of Crashes – CDOT Highways versus Boulder County Roads 12
Table 3. Number of All Crashes by Year and Crash Type in Boulder County 15
Table 4. Number of Serious Injury and Fatal by Year and Crash Type in Boulder County 16
Table 5. All Crashes Driver Action – All Roads 27
Table 6. All Crashes Human Contributing Factors – All Roads 27
Table 7. All Crashes 2021 and 2022 Alcohol Use Crashes – All Roads 28
Table 8: Boulder County HIN Intersections 35
Table 9: Colorado Department of Transportation HIN Intersections 36
Table 10: Boulder County HIN Roadway Segments 37
Table 11: Colorado Department of Transportation HIN Roadway Segments 39

Introduction

Recognizing the importance of implementing a regional approach to roadway safety, Boulder County, Lafayette, and Superior joined forces and successfully applied for Safe Streets and Roads for All (SS4A) grant funding to create a Vision Zero Action Plan for each agency. Specific to Boulder County, this project has analyzed historic crash activity on unincorporated Boulder County roads, Colorado Department of Transportation (CDOT) roads, and roads in the mountain towns of Jamestown, Nederland, and Ward. Identified safety trends and community input gathered in summer 2024 were combined to characterize roadway safety challenges and develop a vision and plan for improving safety in Boulder County. The Federal Highway Administration recommends that local agencies take a holistic view of Vision Zero plans to create a safe system that anticipates human mistakes and minimizes impact energy on human bodies so that a crash doesn't result in serious injury or death. The Boulder County Vision Zero Action Plan relies on a thorough understanding of motor vehicle, bicycle, and pedestrian crash trends to inform strategic investments in safety improvements aimed at decreasing fatal and severe injuries on roadways throughout the county. This memorandum documents the overview of historical crash trends and safety assessment within Boulder County and development of the High-Injury Network (HIN).

Definitions

The list below provides definitions for terms that are used throughout the memorandum.

First Harmful Event: The first harmful event is the first point of injury or damage in the sequence of events in a crash.

Approach Turn Crash: A crash that occurs when someone turns left in front of oncoming traffic without yielding the right-of-way.

Pedestrian and Bicycle Involved Crash: This crash type involves a motor vehicle and at least one person who is walking, rolling, or biking.

Broadside Crash: Also known as a T-bone crash, a broadside crash happens when the front end of one car crashes into the side of another car.

Fixed-Object Crash: This crash type involves a motor vehicle and a stationary object such as utility poles, guardrails, trees, or buildings

Rear-end Crash: This crash type occurs when the front of one vehicle collides with the back of another vehicle

High-Injury Network: A roadway network that identifies locations where the most injury crashes occur based on historical crash data.

High-Risk Network: Identifies contextual factors related to historical crashes to identify locations where there is a high risk for potential crashes in the future based on roadway characteristics.

Killed or Seriously Injured (KSI): Killed and serious Injury (KSI) crashes are crashes that resulted in one or more fatalities or serious injuries. Serious injuries are defined as broken extremities, severe lacerations, paralysis, etc. Fatal crashes are defined when one or more people die within 30 days of the crash as a result of the injuries sustained in the collision.

Centerline Mile: A measurement of roadway length along the centerline of the road, regardless of the number of lanes. It represents the total length of a roadway segment from start to end, measured along its central axis.

Injury Crash: A traffic crash that results in one or more individuals sustaining injuries, ranging from minor to severe.

Vulnerable Road User: A traffic crash that involves a pedestrian, bicyclist, or motorcyclist.

Crash Severity: Refers to the extent of injury and/or property damage resulting from a traffic crash. Crash severity is categorized as property damage only, possible injury, minor injury, serious injury, or fatality.

Methodology: Data Collection and Study Area

Crash data within Boulder County was obtained from January 1, 2013 to December 31, 2022 from crash data provided by Colorado Department of Transportation (CDOT). Crashes that occurred on private property or in parking lots were excluded from the data source. At the time of analysis, 2023 crash data was not available. The study area included an analysis of all unincorporated Boulder County roads and intersections, CDOT highways and intersections within unincorporated Boulder County, and roadways within the mountain towns of Jamestown, Nederland, and Ward. The data presented in this memorandum is the latest available, however, it is subject to change as new information is obtained in the years to come and traffic safety trends should be monitored in future years beyond the scope of this project. All crash data that was used as part of the analysis went through a cleaning process to provide quality assurance/quality control for the locations of the crash data points. Boulder County's crash cleaning process was followed and the cleaning process was documented in a separate memorandum.

Safety Analysis Summary

This section provides a summary of reported crashes within the ten-year period from January 2013 to December 2022 for all crashes in the study area using CDOT data. The primary goal of this analysis is to identify trends and high-risk factors that are associated with serious injury and fatal crashes. During the ten-year period, a total of 10,642 crashes occurred on all roadways in the study area, including CDOT (7,007 crashes) and Boulder County roadways (3,635 crashes). Of those crashes, 496 (4.6%) resulted in a serious injury or fatality. Table 1 summarizes the number of all crashes, serious injury, and fatal crashes by unincorporated Boulder County and each of the mountain towns within the study area by county roads, CDOT highways, and all roads. Most of the crashes occurred in unincorporated Boulder County.

Table 1. Summary of Crashes by Area and CDOT Highways versus Boulder County Roads

	County Road			CDOT Highways			All Roads		
	# of All Crashes	# of Serious Crashes	# of Fatal Crashes	# of All Crashes	# of Serious Crashes	# of Fatal Crashes	# of All Crashes	# of Serious Crashes	# of Fatal Crashes
Unincorporated	3,532	121	30	6,901	256	82	10,433	377	112
Nederland	91	1	0	100	3	1	191	4	1
Jamestown	10	0	0	0	0	0	10	0	0
Ward	2	0	0	6	2	0	8	2	0
Total (Sum)	**3,635**	**122**	**30**	**7,007**	**261**	**83**	**10,642**	**383**	**113**

Over the ten-year period, 123 people died in 113 traffic crashes in the project area. Figure 1 displays the number of crashes by severity for each year in the analysis period from 2013 to 2022. Overall, the total number of crashes has decreased since 2019. The traffic crashes in 2020 were likely lower than previous years due to the Covid-19 pandemic and decreased traffic on roadways. Figure 2 displays a summary by year of only the fatal and serious injury crashes. Although the number of total crashes has decreased since 2019, the number of serious and fatal crashes each year is increasing, meaning the serious injury and fatal crashes represent a greater percentage of the total crashes than previous years.

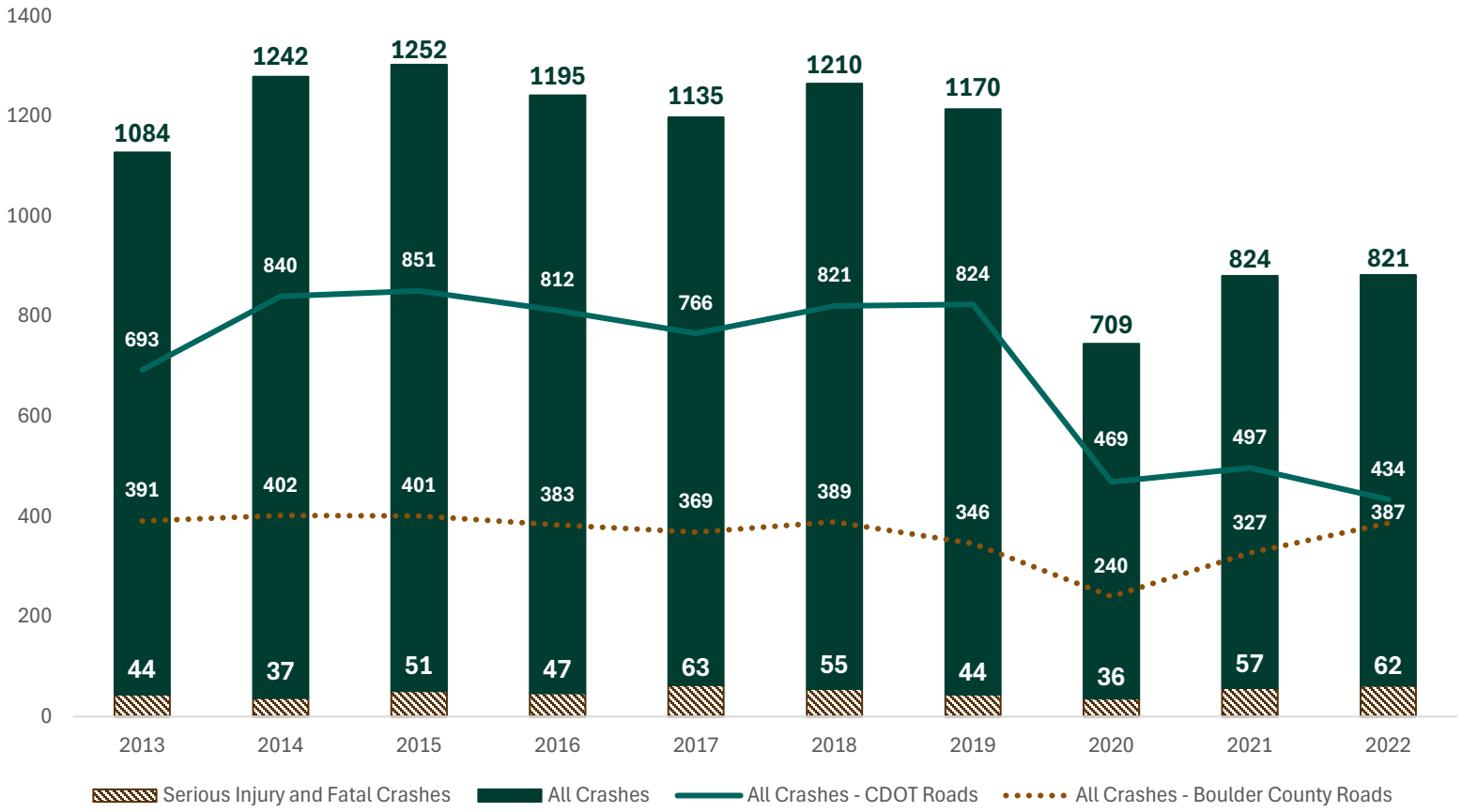


Figure 1. All Crashes Over Time in Study Area

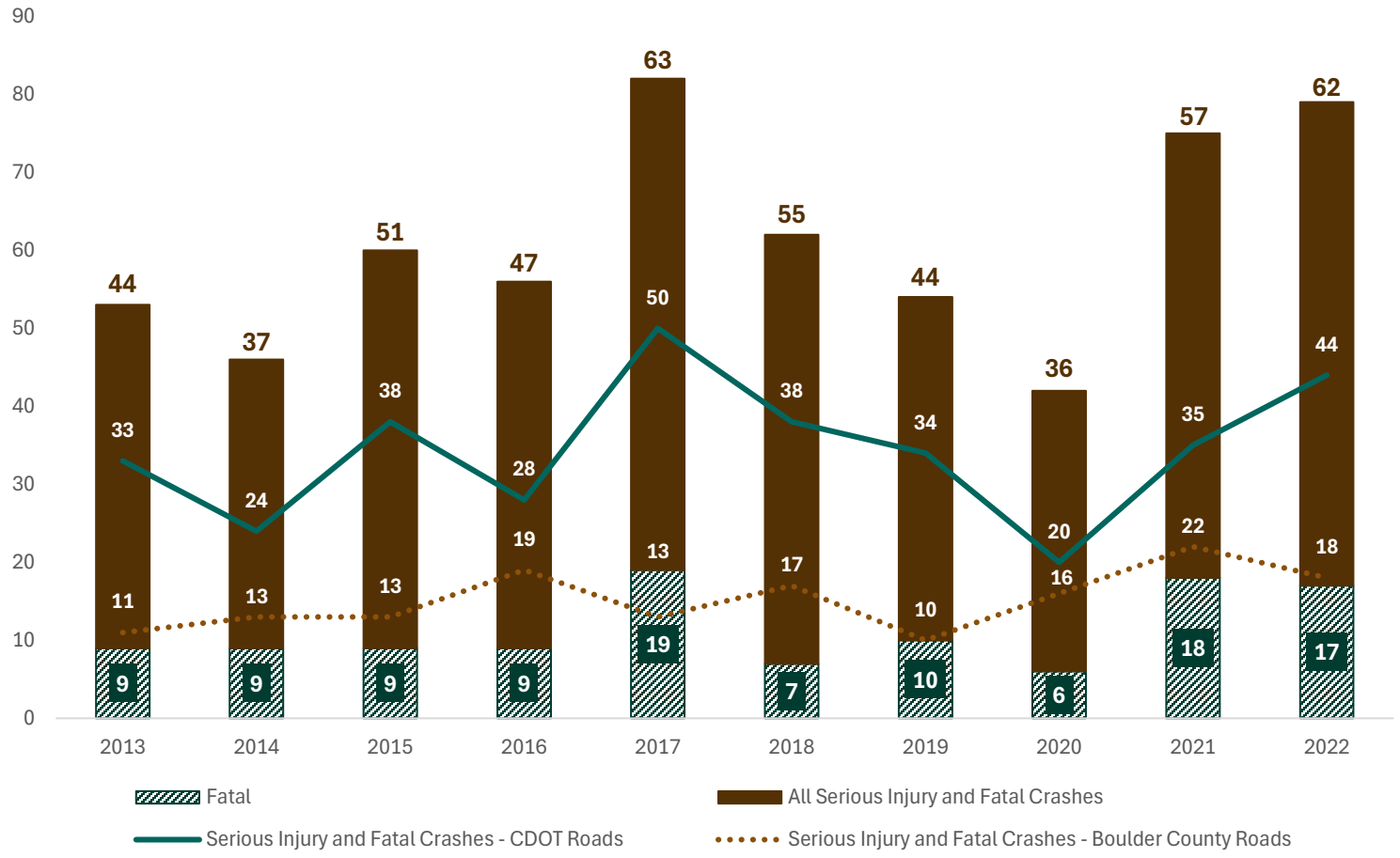


Figure 2. Severe and Fatal Crashes Over Time in Study Area

County Roads versus CDOT Highways

There are a mix of both Boulder County roads and CDOT highways within Boulder County. Figure 3 displays a map of roadways that are owned by Boulder County versus CDOT within the project area. Given the roadway context is different between roadway types and implementation of recommendations would be implemented by different agencies, analysis was completed for the full data set that included all roads (both Boulder County roads and CDOT highways), only Boulder County roads, and only CDOT highways to understand the different trends within the county versus on state highways.

Table 2 summarizes the number of crashes and percentages of all crashes and serious injury and fatal crashes distributed between Boulder County and CDOT highways within the study area. In the study area, 14% of the roadway centerline miles are CDOT highways, but these roadways account for 70% of the serious injury and fatal crashes in the study area. Boulder County roads make up 86% of the centerline miles, but only 30% of the serious injury and fatal crashes in the study area.

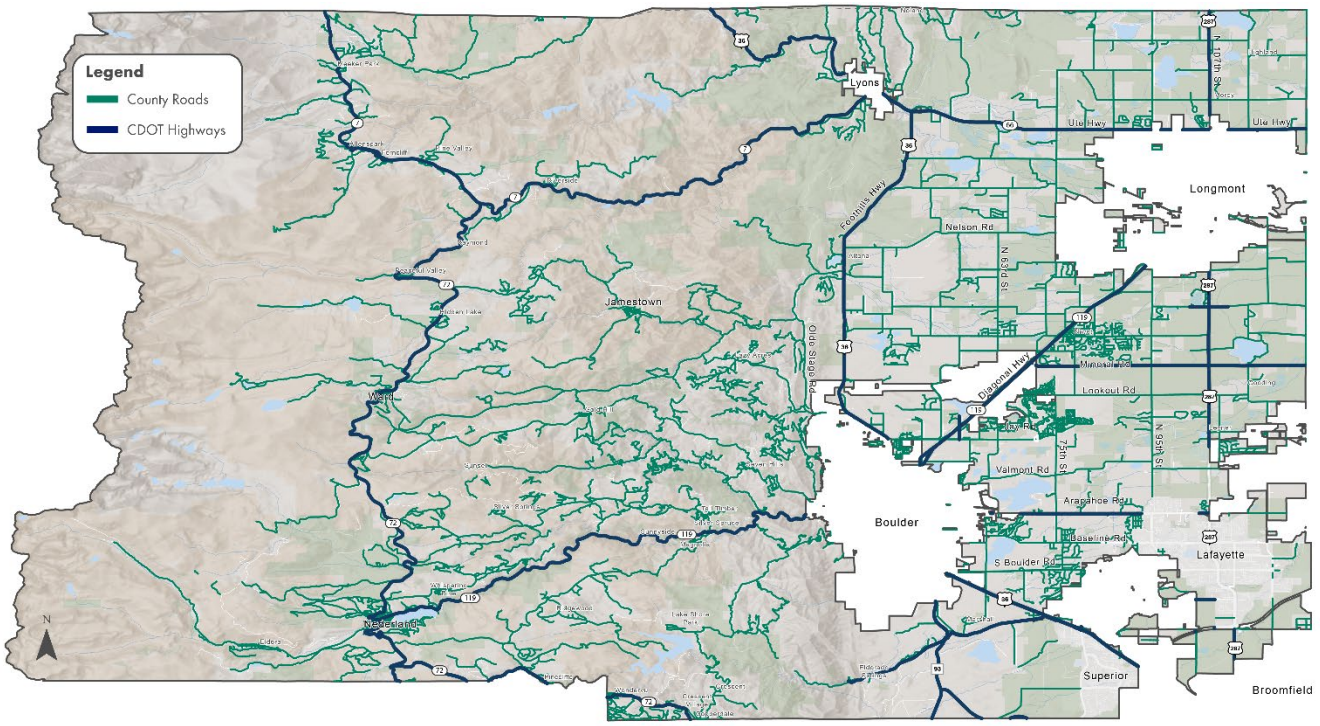


Figure 3. Boulder County roads versus CDOT Highways

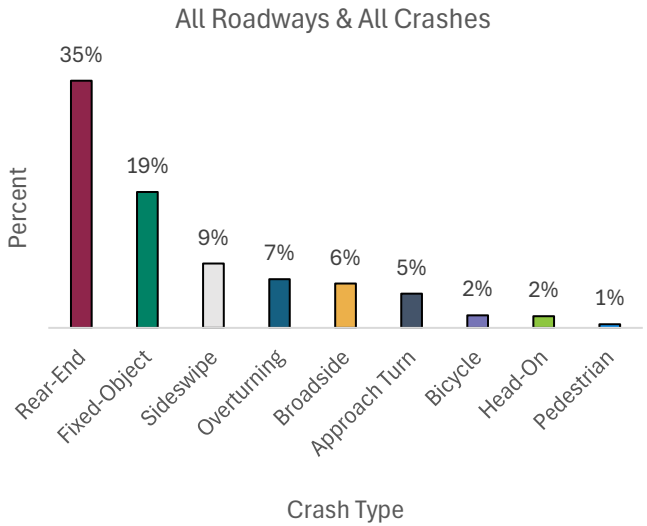
Table 2. Summary of Crashes – CDOT Highways versus Boulder County Roads

	Boulder County Roads	CDOT Highways
All Crashes	3,635 crashes (34%)	7,007 crashes (66%)
KSI Crashes	152 KSI crashes (30%)	344 crashes (70%)
Centerline Miles	1,066 miles (86%)	174 (14%)

Crash Type

The top crash types were analyzed for all roads, Boulder County roads, and CDOT highways for all crashes and serious injury and fatal crashes. **Figure 4, Figure 5,** and **Figure 6** display the crash types for all roads, Boulder County roads, and CDOT highways, respectively. Key takeaways of the crash type analysis include the following:

- The most common crash type that results in serious injury and fatality on all roads in the study area are fixed-object and overturning crashes.
- The most common crash type that results in serious injury and fatality on county roads are bicycle-involved crashes.
- The most common crash type that results in serious injury and fatality on CDOT highways are overturning crashes.
- Bicycle and pedestrian crashes account for 4% of all crashes on Boulder County roads, but account for 24% of serious injury and fatal crashes. Thus, bicycle and pedestrian crashes are over-represented in the serious injury and fatal crashes.
- Although rear-end crashes typically result in a higher percentage of all crashes, they are typically less severe and will not be a focus of the Action Plan.



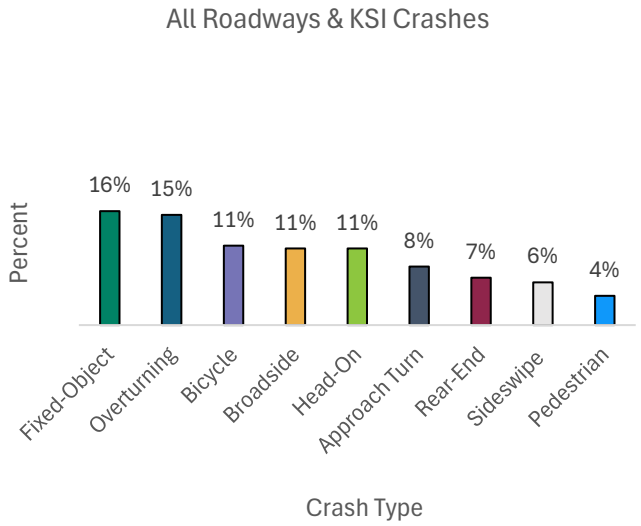
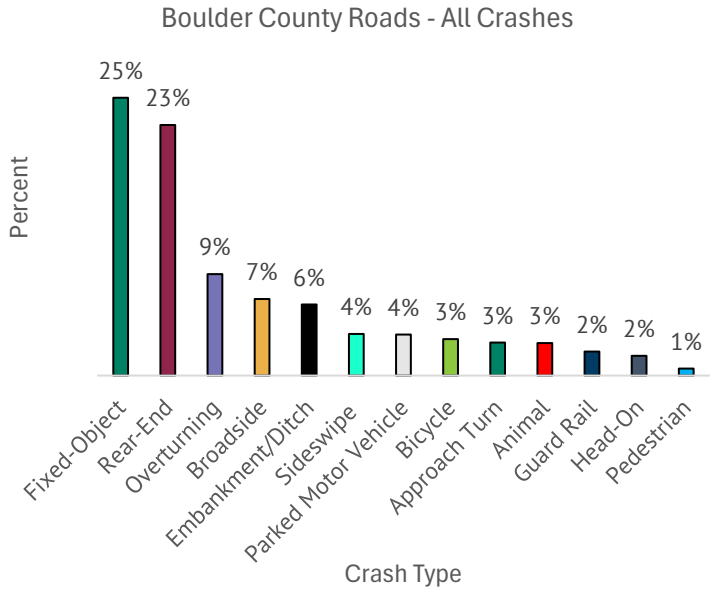


Figure 4. Summary of Top All Crash Types and Serious Injury & Fatal Crash Types – All Roads



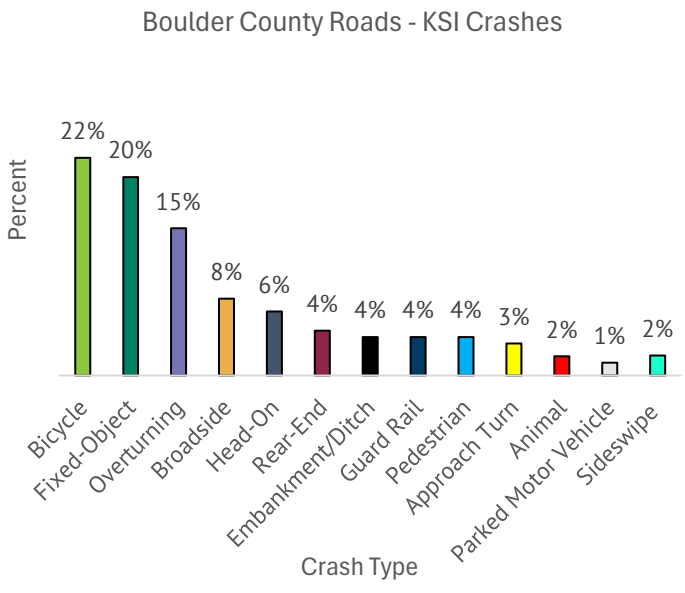


Figure 5. Summary of Top All Crash Types and Serious Injury & Fatal Crash Types – Boulder County Roads

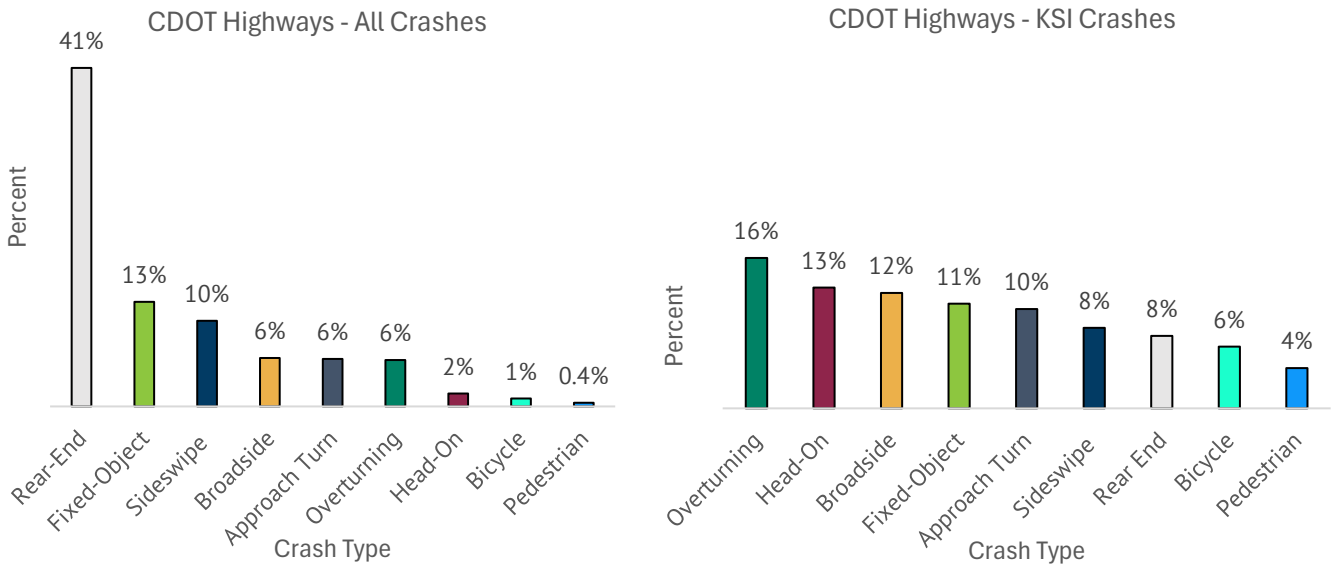


Figure 6. Summary of Top All Crash Types and Serious Injury & Fatal Crash Types – CDOT Highways

In more detail summarized by year, **Table 3** shows the distribution of all crashes in Boulder County by crash type from 2013 to 2022 and **Table 4** shows the distribution of serious injury and fatal crashes in Boulder County.

Table 3. Number of All Crashes by Year and Crash Type in Boulder County

	County Roads												CDOT Highways												Grand	Grand
Crash Type	**2013**	**2014**	**2015**	**2016**	**2017**	**2018**	**2019**	**2020**	**2021**	**2022**	**Total**	**%**	**2013**	**2014**	**2015**	**2016**	**2017**	**2018**	**2019**	**2020**	**2021**	**2022**	**Total**	**%**	**Total**	**Total (%)**
Animal	9	9	11	20	8	12	14	2	10	12	107	2.9%	26	41	42	57	40	60	31	36	25	20	378	5.4%	485	4.6%
Approach Turn	14	9	17	13	14	8	13	2	5	14	109	3.0%	29	28	35	54	55	47	57	33	33	28	399	5.7%	508	4.8%
Barricade/Traffic Barrier	0	0	0	0	0	0	1	5	1	3	10	0.3%	0	0	0	0	0	0	0	2	0	1	3	0.0%	13	0.1%
Bicycle	18	15	11	13	16	8	5	9	7	15	117	3.2%	4	11	6	12	7	6	10	5	4	1	66	0.9%	183	1.7%
Broadside	20	30	21	27	21	34	27	19	24	29	252	6.9%	38	43	49	36	34	53	58	31	30	35	407	5.8%	659	6.2%
Cable Rail	0	0	1	0	0	0	0	1	0	0	2	0.1%	0	0	0	0	0	0	0	0	0	0	0	0.0%	2	0.0%
Crash Cushion	0	0	0	0	0	0	0	0	0	0	0	0.0%	4	1	8	1	0	1	1	0	0	0	16	0.2%	16	0.2%
Curb/Median	2		2	1	4	2	1	1	4	2	19	0.5%	1	2	1	0	5	3	4	2	1	5	24	0.3%	43	0.4%
Embankment/Ditch	41	19	35	33	24	15	16	16	12	22	233	6.4%	34	39	30	18	26	29	28	7	16	14	241	3.4%	474	4.5%
Fixed Object	94	115	108	95	89	106	91	67	66	84	915	25.2%	122	114	113	96	114	90	96	54	45	39	883	12.6%	1,798	16.9%
Ground	0	0	0	0	0	0	0	0	0	1	1	0.0%	0	0	0	0	0	0	0	0	0	2	2	0.0%	3	0.0%
Guard Rail	7	5	8	6	11	8	5	7	15	7	79	2.2%	15	8	16	14	13	15	13	9	11	11	125	1.8%	204	1.9%
Head On	3	14	7	5	7	4	9	6	5	5	65	1.8%	13	15	10	5	14	13	11	3	7	17	108	1.5%	173	1.6%
Large Boulder	9	10	10	12	4	11	8	8	8	7	87	2.4%	13	17	17	16	11	9	14	15	7	11	130	1.9%	217	2.0%
Other/Unknown	0	2	1	0	1	0	0	3	2	3	12	0.3%	5	1	5	1	1	2	2	0	2	0	19	0.3%	31	0.3%
Overtaking Turn	3	4	4	2	8	5	3	4	9	5	47	1.3%	6	7	7	9	7	15	13	4	15	6	89	1.3%	136	1.3%
Overturning	34	35	33	27	36	47	42	33	25	22	334	9.2%	35	48	42	44	36	35	31	50	36	32	389	5.6%	723	6.8%
Parked Motor Vehicle	13	7	13	21	16	17	17	9	9	13	135	3.7%	8	5	2	8	10	7	5	7	6	3	61	0.9%	196	1.8%
Pedestrian	2	2	1	1	4	3	4	1	3	2	23	0.6%	2	2	6	3	5	4	4	1	2	1	30	0.4%	53	0.5%
Railroad Crossing Equipment	0	0	0	0	0	0	0	0	0	1	1	0.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%	1	0.0%
Railway Vehicle	0	0	0	0	0	0	0	0	0	0	0	0.0%	1	0	0	0	0	0	0	0	0	0	1	0.0%	1	0.0%
Rear End	87	95	85	87	80	83	70	38	89	111	825	22.7%	255	344	361	349	311	359	356	161	198	164	2,858	40.8%	3,683	34.6%
Road Maintenance Equipment	2	1	0	2	2	1	0	0	0	0	8	0.2%	3	1	2	2	1	0	2	0	0	0	11	0.2%	19	0.2%
Sideswipe (Opposite Direction)	19	12	16	7	12	15	7	3	9	6	106	2.9%	13	29	18	15	22	9	12	8	16	12	154	2.2%	260	2.4%
Sideswipe (Same Direction)	12	17	17	11	11	9	11	4	23	22	137	3.8%	62	76	73	68	51	60	70	38	39	31	568	8.1%	705	6.6%
Vehicle Cargo/Debris	2	1	0	0	1	1	2	2	1	1	11	0.3%	4	8	8	4	3	4	6	3	4	1	45	1%	56	0.5%
Grand Total	**391**	**402**	**401**	**383**	**369**	**389**	**346**	**240**	**327**	**387**	**3,635**	**100%**	**693**	**840**	**851**	**812**	**766**	**821**	**824**	**469**	**497**	**434**	**7,007**	**100%**	**10,642**	**100%**

Table 4. Number of Serious Injury and Fatal by Year and Crash Type in Boulder County

	County Roads												CDOT Highways												Grand	Total
Crash Type	**2013**	**2014**	**2015**	**2016**	**2017**	**2018**	**2019**	**2020**	**2021**	**2022**	**Total**	**%**	**2013**	**2014**	**2015**	**2016**	**2017**	**2018**	**2019**	**2020**	**2021**	**2022**	**Total**	**%**	**Total**	**(%)**
Animal	0	0	0	0	0	0	0	0	1	2	3	2.0%	1	1	0	0	1	0	0	1	0	1	5	1.5%	8	1.6%
Approach Turn	0	1	1	2	0	0	0	0	0	1	5	3.3%	3	2	2	5	4	6	3	0	6	4	35	#####	40	8.1%
Barricade/Traffic Barrier	0	0	0	0	0	0	0	1	0	0	1	0.7%	0	0	0	0	0	0	0	0	0	0	0	0.0%	1	0.2%
Bicycle	5	4	3	2	6	3	2	1	2	3	31	20.4%	1	2	1	4	5	2	4	0	2	1	22	6.4%	53	10.7%
Broadside	1	0	1	1	1	1	0	1	2	4	12	7.9%	4	1	4	3	5	5	6	3	1	9	41	#####	53	10.7%
Cable Rail	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0.0%
Crash Cushion	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0.0%
Curb/Median	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0.0%
Embankment/Ditch	0	1	1	1	1	1	0	0	0	0	5	3.3%	1	1	3	1	1	2	0	1	1	0	11	3.2%	16	3.2%
Fixed Object	1	3	1	7	1	3	3	5	6	1	31	20.4%	2	5	7	0	6	4	5	4	4	2	39	#####	70	14.1%
Ground	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	1	1	0.3%	1	0.2%
Guard Rail	0	0	0	0	1	0	0	1	4	0	6	3.9%	1	0	2	1	2	0	0	1	0	0	7	2.0%	13	2.6%
Head On	0	1	1	1	0	1	1	2	1	2	10	6.6%	5	3	3	1	8	5	4	1	6	8	44	#####	54	10.9%
Large Boulder	1	0	1	0	0	1	0	0	1	0	4	2.6%	1	0	2	2	0	1	0	1	0	0	7	2.0%	11	2.2%
Other/Unknown	0	0	0	0	0	0	0	0	0	0	0	0.0%	1	0	2	0	1	0	0	0	0	0	4	1.2%	4	0.8%
Overtaking Turn	0	0	0	0	0	0	0	1	0	0	1	0.7%	0	0	0	0	1	0	0	0	1	0	2	0.6%	3	0.6%
Overturning	2	0	4	2	2	4	3	2	1	3	23	15.1%	8	5	2	7	6	3	5	5	5	8	54	#####	77	15.5%
Parked Motor Vehicle	0	0	0	0	0	2	0	0	0	0	2	1.3%	0	0	0	0	0	0	0	0	1	1	2	0.6%	4	0.8%
Pedestrian	0	1	0	0	0	1	1	0	2	1	6	3.9%	0	1	3	0	2	3	2	0	2	1	14	4.1%	20	4.0%
Railroad Crossing Equipment	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0.0%
Railway Vehicle	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0.0%
Rear End	1	0	0	3	0	0	0	1	1	1	7	4.6%	1	1	4	2	3	6	2	1	3	4	27	7.8%	34	6.9%
Road Maintenance Equipment	0	0	0	0	1	0	0	0	0	0	1	0.7%	0	0	0	0	0	0	0	0	0	0	0	0.0%	1	0.2%
Sideswipe (Opposite Direction)	0	1	0	0	0	0	0	1	0	0	2	1.3%	2	2	1	0	4	1	3	1	2	3	19	5.5%	21	4.2%
Sideswipe (Same Direction)	0	1	0	0	0	0	0	0	1	0	2	1.3%	2	0	2	2	1	0	0	1	1	1	10	2.9%	12	2.4%
Vehicle Cargo/Debris	0	0	0	0	0	0	0	0	0	0	0	0.0%	0	0	0	0	0	0	0	0	0	0	0	0%	0	0.0%
Grand Total	**11**	**13**	**13**	**19**	**13**	**17**	**10**	**16**	**22**	**18**	**152**	**100%**	**33**	**24**	**38**	**28**	**50**	**38**	**34**	**20**	**35**	**44**	**344**	**100%**	**496**	**100%**

Where Crashes Are Occurring

A heatmap of all crashes in Boulder County from 2013 to 2022 is shown in Figure 7. Most crashes are concentrated on the following roads:

- US 36 – Boulder/Denver Turnpike
- CO 119 – Diagonal Highway
- US 287

Figure 8 displays the concentration of where injury crashes (minor injury, serious injury, fatal) are occurring. Figure 9 displays the locations of the serious injury and fatal crashes in Boulder County and differentiates if they are occurring at an intersection or non-intersection location. Most of the crashes in the study area occur at non-intersection locations. Figure 10 displays the breakdown of serious injury and fatal crashes occurring on CDOT and Boulder County roads. Over 60% of crashes on CDOT highways and over 60% of crashes on Boulder County roads occur at non-intersection locations. 33% of crashes on CDOT highways occur at intersections or are intersection-related whereas 29% of crashes on Boulder County roads occur at intersections or are intersection-related. The remainder of the crashes occur at driveways or are driveway access related or at ramps or are ramp related.

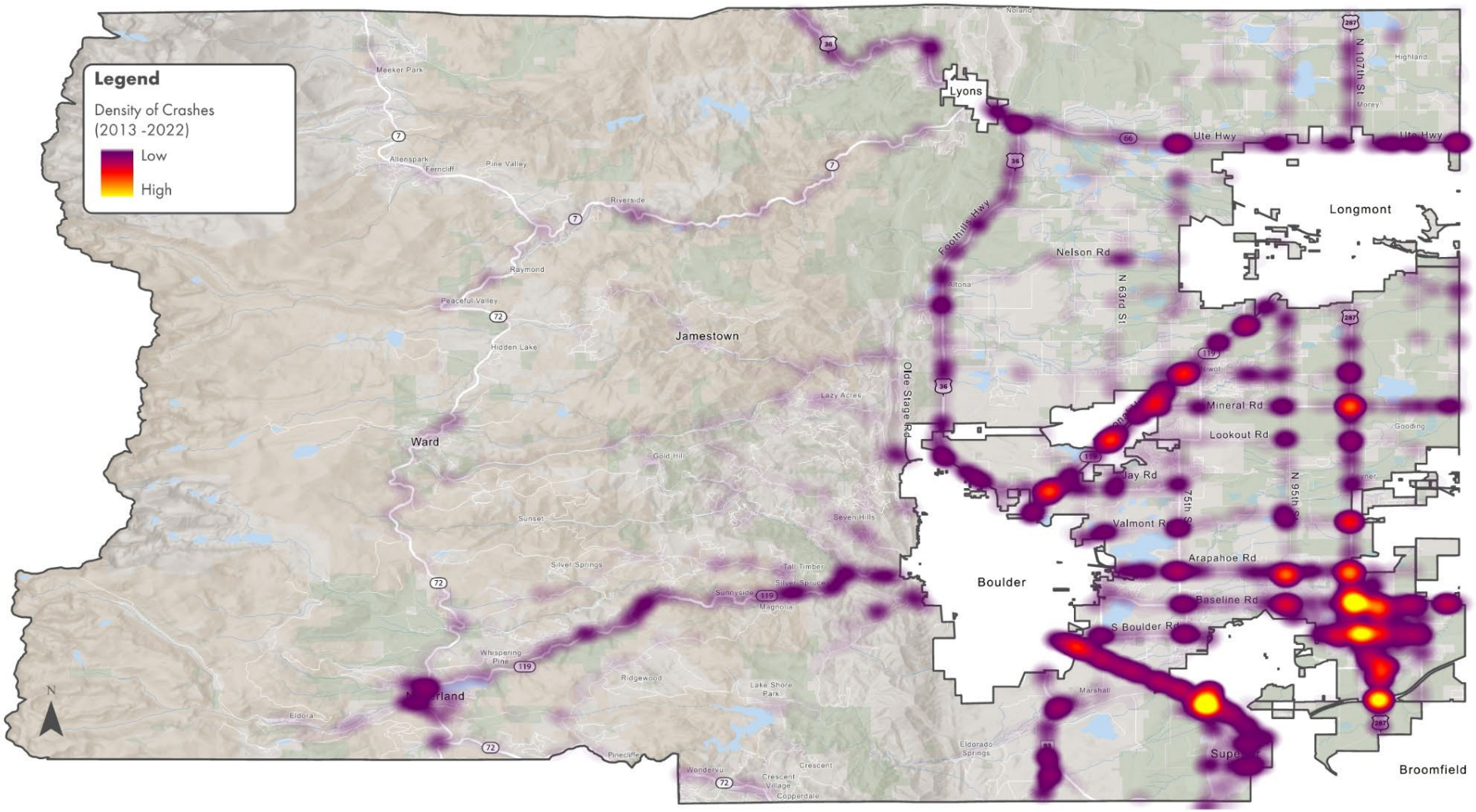


Figure 7. Map of All Crashes in Study Area

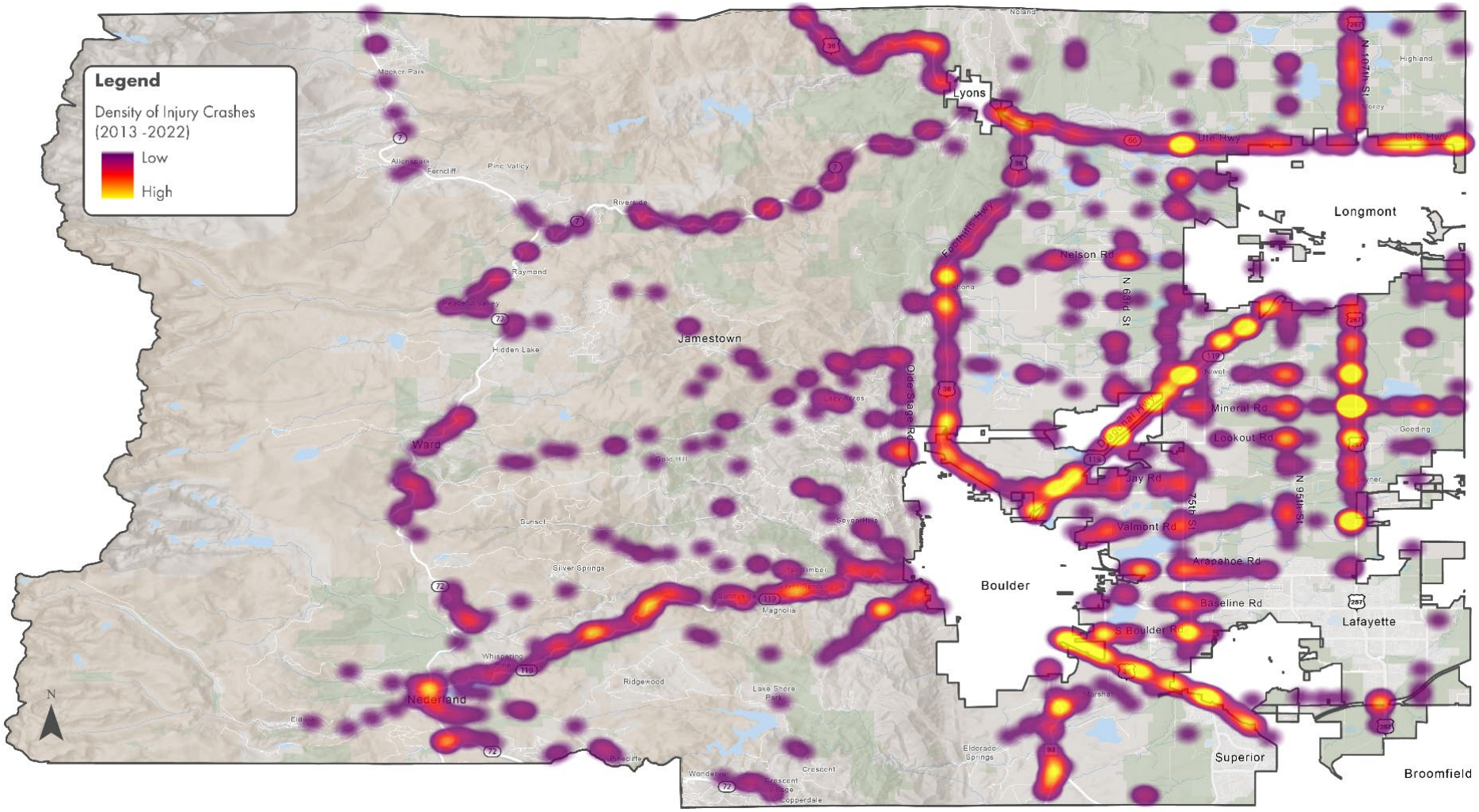


Figure 8. Map of All Injury Crashes (Minor, Severe, Fatal) in Study Area

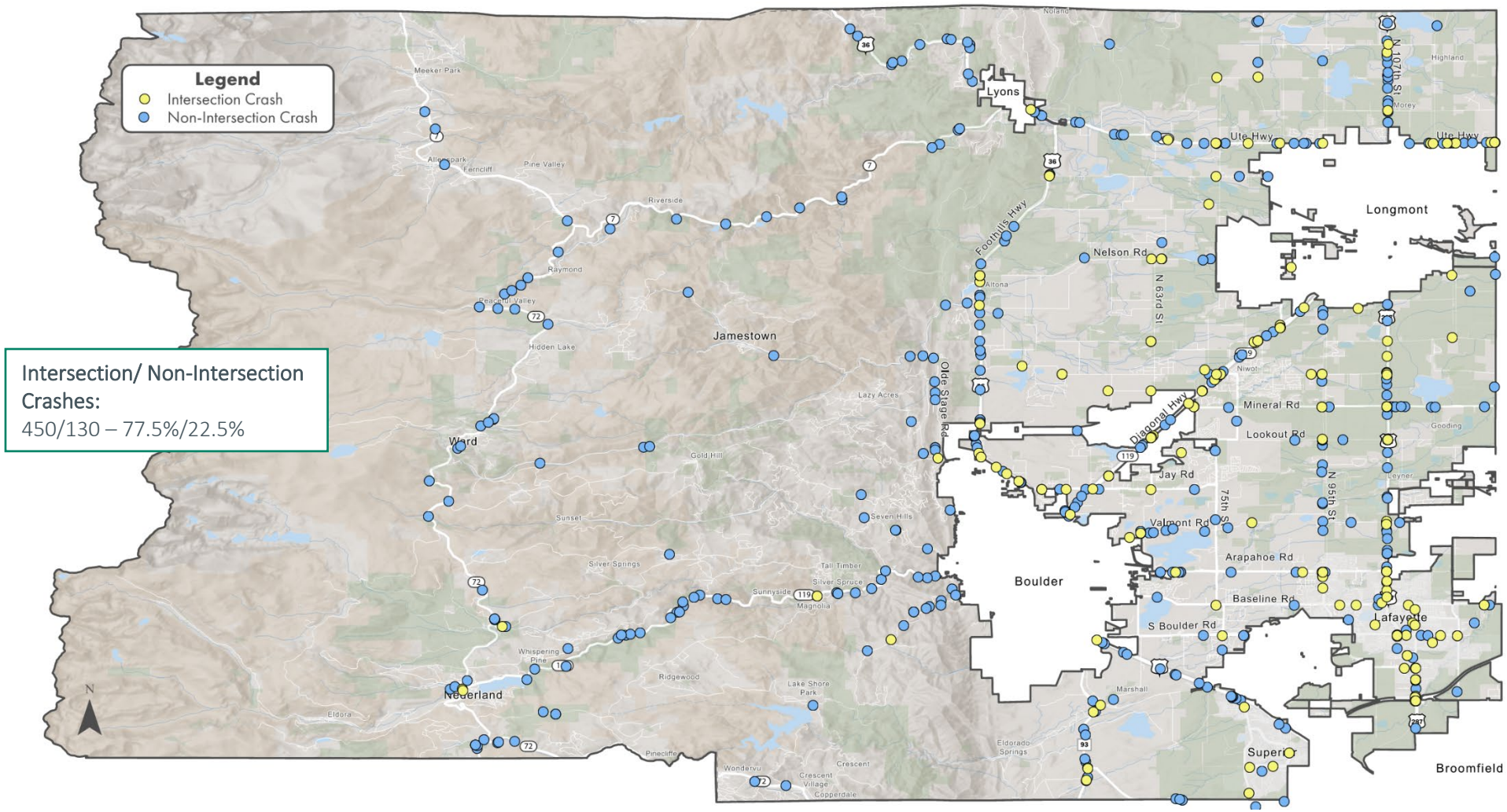


Figure 9. Map of All Serious Injury and Fatal Crashes in Study Area

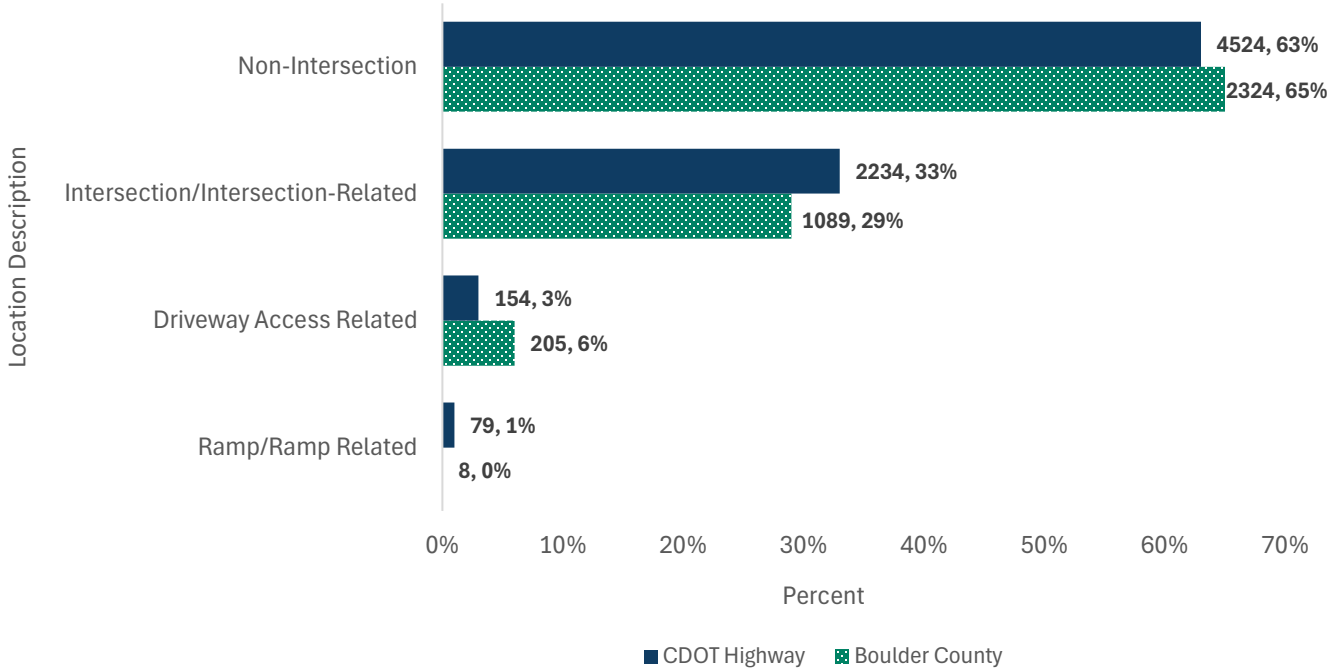


Figure 10. Summary of Crash Location Description, All Crashes– Boulder County and CDOT Highways

When Crashes Are Occurring

Figure 11 displays the percentage of all crashes by time of day. Overall, crashes are distributed between 6AM and 12AM; however, most of the crashes occur between 3PM and 6PM. Figure 12 displays the frequency of crashes in Boulder County by month. Generally, crashes are fairly distributed throughout the year, but March through May have the lowest percentage of crashes and the months with over 9% of crashes include July, October, and November. Figure 13 and Figure 14 display the road conditions and lighting conditions for all crashes, respectively. Most crashes were occurring in dry roadway conditions where 14% of all crashes and 6% of serious injury and fatal were occurring in icy, slushy, or snowy conditions and 7% of all crashes and 5% of serious injury and fatal crashes are occurring in wet conditions. Approximately 70% of crashes occur in the daylight and approximately one-quarter of crashes are occurring in the dark unlighted or dark lighted conditions.

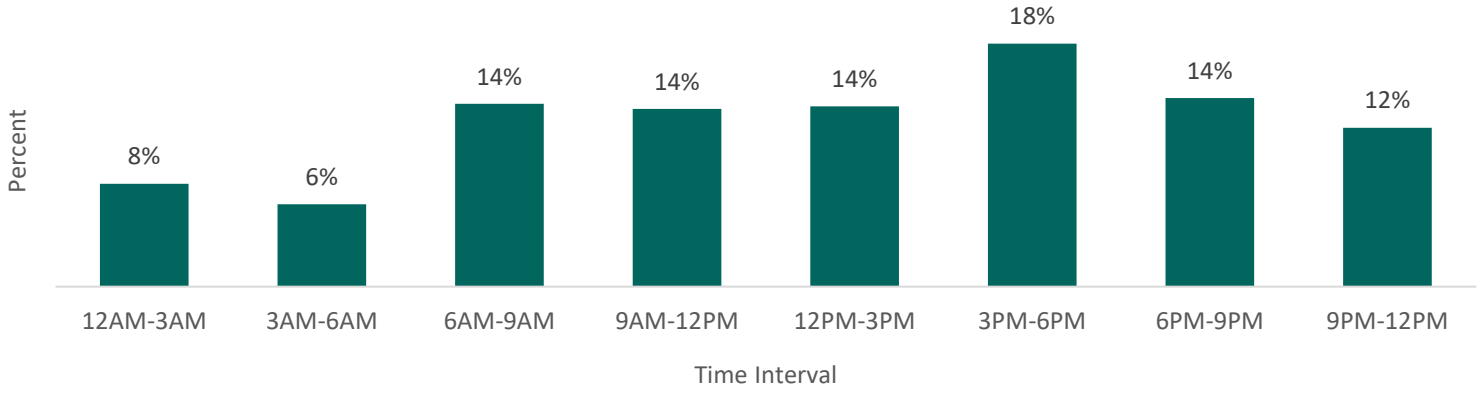


Figure 11. All Crashes by Time of Day in Boulder County – All Roads

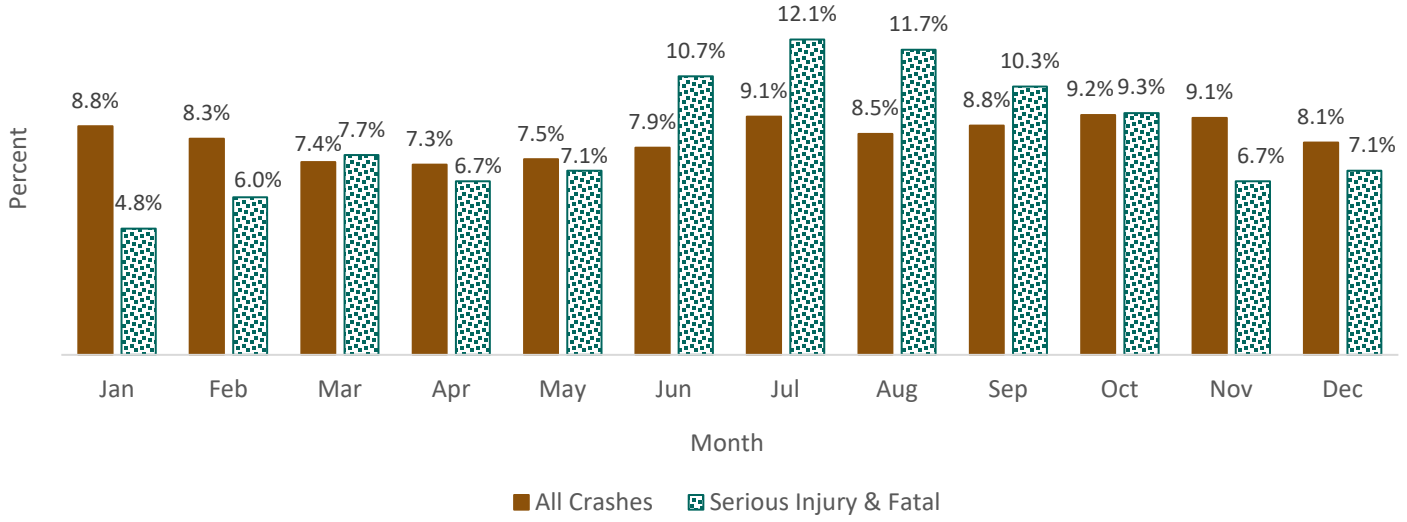


Figure 12. All Crashes and KSI Crashes by Month in Boulder County – All Roads

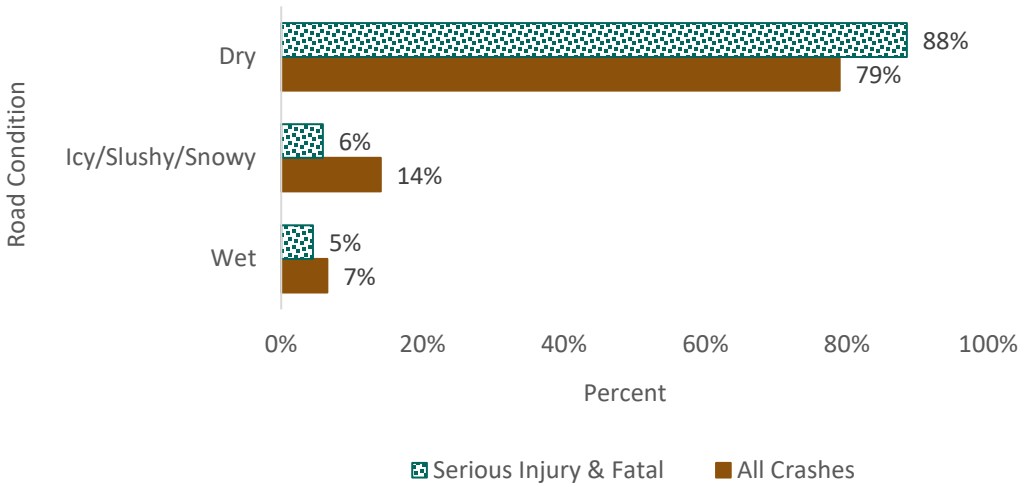


Figure 13. All Crashes Summary of Road Conditions – All Roads

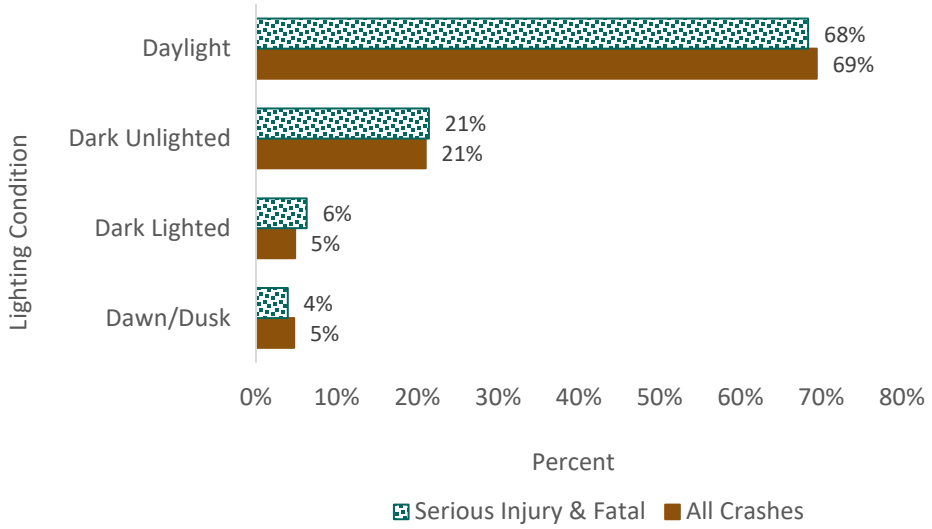


Figure 14. All Crashes Summary of Lighting Conditions – All Roads

Who is Involved in Crashes

Figure 15 displays the vehicle type for the vehicle at fault broken down for all crashes and serious injury and fatal crashes. Most of the vehicles at fault include a passenger car/van or an SUV. For serious injury or fatal crashes, a motorcycle or bicycle at fault is overrepresented compared to other crash types.

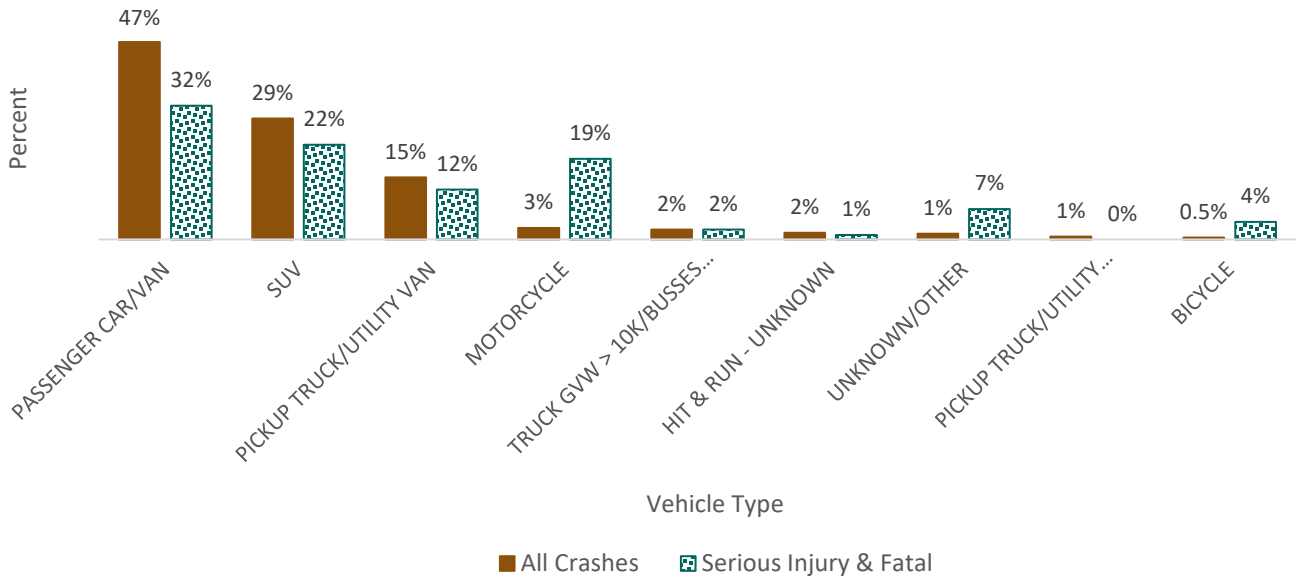


Figure 15. Summary of Vehicle Type at Fault - All Roads

CRASHES INVOLVING PEDESTRIANS, BICYCLISTS, AND MOTORCYCLISTS

A vulnerable road user crash is a crash that involves a pedestrian, bicyclist, or motorcyclist and were analyzed in detail. Bicycle crashes were the most common crash type on Boulder County roads. Bicyclists and pedestrians have notably higher risk of being involved in serious or fatal crashes compared to motorists which is evidenced by their overrepresentation in crashes that result in injury or death. 31% of all Boulder County pedestrian and bicycle crashes resulted in a fatality or serious injury. Figure 16 displays the number of pedestrian and

bicycle crashes per year by severity level. 2017 had the greatest number of all pedestrian and bicycle crashes and KSI pedestrian and bicycle crashes. Most years within the study period had 6-9 serious injuries or fatal bicycle and pedestrian crashes. **Figure 17** displays the number of bicycle and pedestrian crashes by month. The months with the highest number of bicycle/pedestrian crashes are July through October with the highest month being August. **Figure 18** displays a map with the location of pedestrian, bicycle, and motorcycle crashes by severity. The roads that experience the majority of bicycle crashes include the US-36 corridor (north of Boulder) and the CO-110 corridor. Roads with the most motorcycle crashes include SH 72, CO 119 – Boulder Canyon, and US 36 – N US 36.

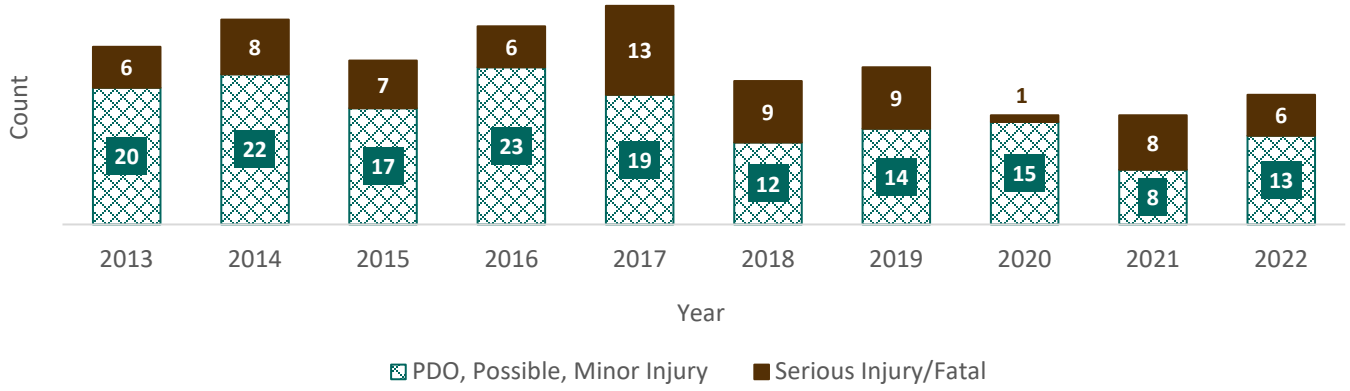


Figure 16. Number of Bicycle and Pedestrian Crashes by Severity and Year

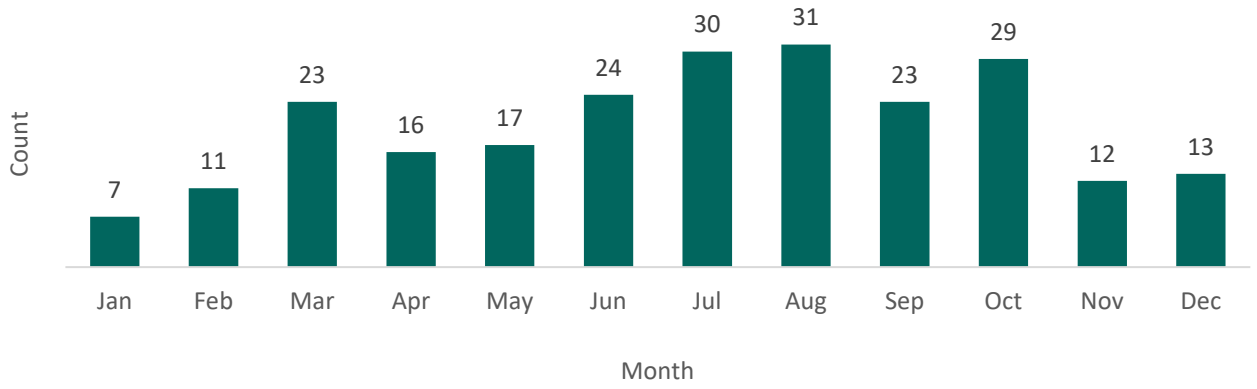


Figure 17. Number of Pedestrian and Bicycle Crashes by Month

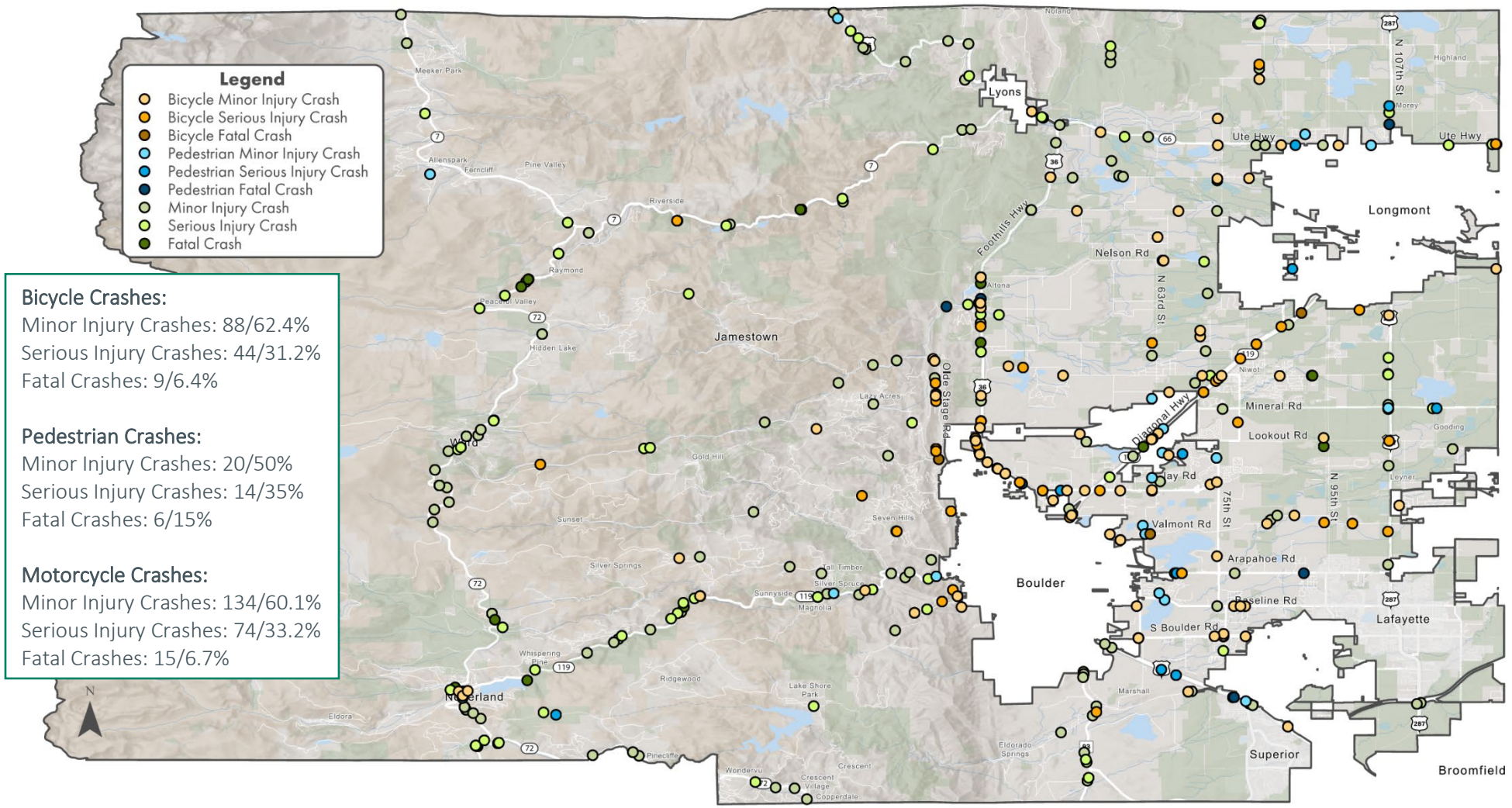


Figure 18. Pedestrian, Bicycle, and Motorcycle Crashes Locations by Severity

Crash Characteristics and Contributing Factors

Table 5 and Table 6 display the top driver actions for vehicles at fault and the top human contributing factors, respectively.

Table 5. All Crashes Driver Action – All Roads

Driver Action	% of All Crashes
CARELESS DRIVING	41%
FOLLOWING TOO CLOSE	9%
CARELESS DRIVING CAUSE INJURY	5%
DRIVE UNDER INFLUENCE ALCOHOL	4%
TOO FAST FOR CONDITIONS	2%
TURN LEFT/ONCOMING TRAFFIC	2%
UNSAFE LANE CHANGE	2%

Table 6. All Crashes Human Contributing Factors – All Roads

Human Contributing Factor	% of All Crashes
NO APPARENT CONTRIBUTING FACTOR WHEN HUMAN FACTOR IS KNOWN	42%
UNKNOWN	20%
DRIVER PREOCCUPIED (“DISTRACTED”)	15%
DRIVER INEXPERIENCE	12%
DRIVER UNFAMILIAR WITH AREA	4%
ASLEEP AT WHEEL	3%
ILLNESS	2%

In the 2013-2020 CDOT data, alcohol/drug use was stated in driver action. Starting in 2021, the data set was updated, and alcohol and drugs were tracked in separate fields with more detail. A summary of alcohol and marijuana use related crashes was completed for the crashes that occurred in the 2021 and 2022 data set that had this information. Table 7 displays the summary of 2021 and 2022 alcohol use and marijuana use crashes on all roads in the study area. There was no information provided (i.e., field was left blank) or alcohol use was unknown for 27% of the crashes in the 2021 and 2022 data set. Where there was data available and known, there was no alcohol suspected in 88% of the crashes. There was no information provided (i.e., field was left blank) or marijuana use was unknown for 19% of the crashes in the 2021 and 2022 data set. Where there was data available and known, there was no marijuana suspected in 97% of the crashes.

Table 7. All Crashes 2021 and 2022 Alcohol Use Crashes – All Roads

Alcohol Use (2021-2022)	
No Alcohol Suspected	88%
Yes, Alcohol Suspected/Confirmed	12%
Marijuana Use (2021-2022)	
Marijuana Not Suspected	97%
Marijuana Suspected	3%

High Injury Network (HIN) Development

Boulder County crash data was utilized to develop a High Injury Network (HIN), which is a network of roadway segments and intersections that historically show a higher concentration of crashes resulting in injury. **The HIN that has been identified includes 7% of the centerline miles and 32 intersections but account for 66% of the serious injury and fatal crashes.** This network provides a framework for identifying high priority locations to focus improvements designed to address traffic fatalities and serious injuries. **Figure 19** displays the overall process for the development of the HIN. Details of the analysis are described in more detail in the subsequent sections below. To address areas of high-injury for all modes and areas of high-injury for vulnerable users, **Figure 20** displays the overall and pedestrian/bicycle HIN.

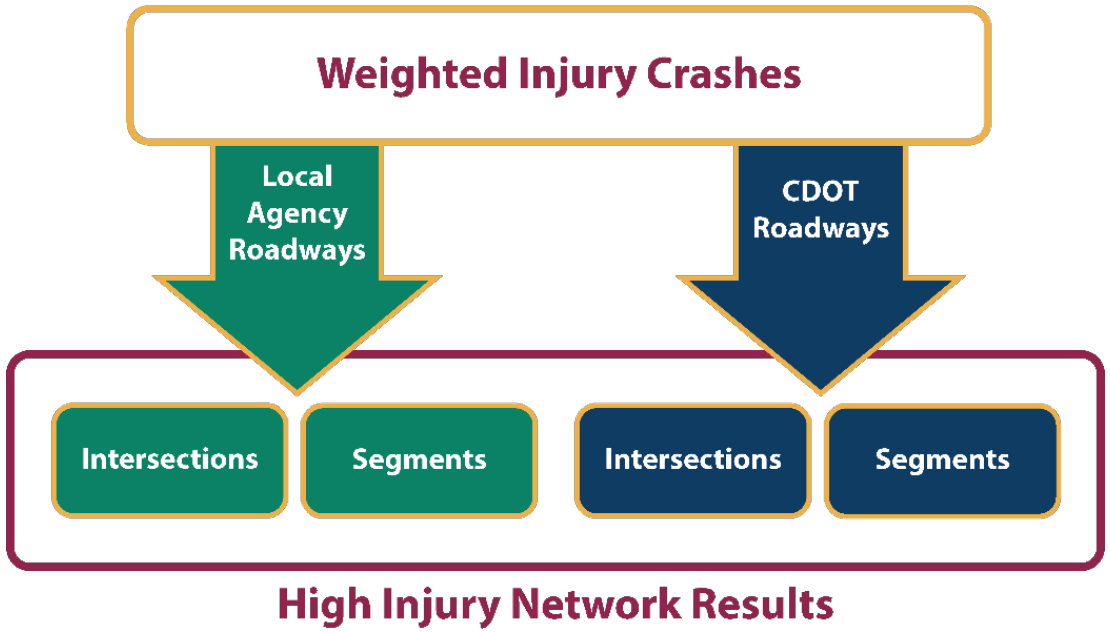


Figure 19. High Injury Network Development Process

Step 1: Prepare Network with Segmentation of Roads

ArcGIS was used to provide visual analysis of the existing available centerline data provided by Boulder County showed roadway segments broken into varying lengths, primarily split at intersections. To connect roads across intersections and provide a more standard segment length, centerlines were dissolved using the roadway name and clipped to the study area. Segments with a length over 1 mile were then divided at mile marker points where available. Segments without mile marker points that were under 2 miles in length were split directly in half, while those that were over 2 miles were divided into one-mile-long segments with any remaining line length divided equally amongst the divisions. All segments were assigned a unique segment ID.

Step 2: Define Weighting of Injury Crashes

Due to the relatively small dataset of fatalities and serious injuries in Boulder County, minor injury crashes were also included in the analysis to improve the ability to reach meaningful conclusions. To maintain a focus on areas with high rates of fatalities and serious injuries, crashes were weighted according to their severity with minor injury crashes having a weight of 1, serious injury crashes having a weight of 2, and fatal crashes having a weight of 4.

Step 3: Intersection versus Road Segment Crashes

To avoid identifying segments where injury crashes were occurring at intersections appearing on the high injury network, it was decided to analyze intersection crashes separately from segments. This separation of intersection versus non-intersection crashes allowed the project team to more clearly assign crashes to location segments and intersections to pinpoint the specific locations where injury crashes are occurring and improve the accuracy of the high injury network. Non-intersection crashes were then assigned to the road segment they occurred on. Each segment was given a score for the weighted number of crashes and the weighted number of crashes per mile.

Intersection points were created at the intersections of each roadway segment. Each intersection was assigned a unique intersection ID. Intersection points that included only local roadway segments were buffered by 50ft, while intersection points with non-local roadway segments were buffered by 75ft to encompass the typically larger intersection size. These two buffer layers were combined into one full dataset comprising the buffers for all intersections.

Intersection crashes that were located within the buffer distance of intersections were assigned to each intersections. Each intersection was given a score for the weighted number of crashes.

Step 4: Boulder County versus CDOT Segments and Intersections

A review of the intersections and segments with the highest number of weighted crashes revealed that the majority of the top intersections and segments were occurring on CDOT highways. The project team determined that CDOT intersections and segments would be analyzed separately from Boulder County intersections and segments. Separating the analysis of the HIN into Boulder County and CDOT was completed for the following reasons:

1. Highlight Boulder County intersections and roads that had a higher proportion of injury crashes compared to other locations owned by Boulder County, even though these locations may not have had as high a proportion when compared to CDOT highways. This gave the project team the flexibility to determine different thresholds for CDOT and County roads.
2. Crash trends and characteristics of CDOT highways versus County roadways are different.
3. Ownership and implementation of roadways is different so ultimately recommended actions identified in the Final Action Plan should be designated based on CDOT or Boulder County roads.

Step 5: Developing a Threshold to Select HIN Segments and Intersections

For intersections, Boulder County and CDOT intersections were sorted by total number of weighted crashes. A threshold for which intersections for each jurisdiction would be included on the high-injury network was determined by calculating the average number of weighted crashes plus one standard deviation. This threshold differed for Boulder County intersections and CDOT intersections, which allowed the project team to identify Boulder County intersections that may not have risen above a combined dataset threshold.

For segments, the number of weighted injury crashes per mile was used to calculate the weighted injury crash rate per mile to determine the highest concentrations of injury crashes. The segments were then sorted by this rate to determine the segments with the highest concentrations of injury crashes. Similarly to the intersection process, segments were split into CDOT highways and Boulder County roads to maintain the focus on Boulder County roads with high concentrations of injury crashes compared to other Boulder County roads, rather than comparing to the proportionally higher state highway rates. The threshold for which county roadway segments and intersections would be included on the high-injury network was determined by calculating the average weighted injury crash per mile plus one standard deviation. For CDOT highways, this threshold was lowered to around 1.5x the county threshold, due to the over-representation of injury crashes on CDOT highways.

Step 6: Refining the HIN

As a result of the dissolve step of the segmentation process, some segments had a very short length and thus were found to have a disproportionately high weighted injury crash rate per mile. To rectify this, very short segments containing injury crashes were manually cleaned by merging with the adjacent, longer segments to be closer to 1 mile long. Segment length and weighted injury crash rates per mile were recalculated, and following this cleaning process segment thresholds for both CDOT highways and Boulder County roads were recalculated.

After reviewing the network of segments falling above the threshold, the project team decided to analyze Boulder County segments at a half mile length to take a closer look at more specific locations with concentrated injury crashes. To accomplish this analysis, the previous Boulder County 1-mile segments were split directly in half. Then, the same steps to determine the weighted crash rate per mile were completed as for the 1-mile segments. CDOT highways were analyzed only under the 1-mile scenario.

When comparing the two scenarios for Boulder County (1-mile segments and ½-mile segments), the project team determined that, though there were many segments that overlapped, there were some segments that were more appropriately analyzed at a 1-mile segment, and

some that were more appropriate at a ½ mile segment. This was largely determined based on the relative distribution of crashes along the two segment lengths. For example, if the majority of crashes occurred on half of the 1-mile segment, it was determined to be most appropriate as a ½-mile segment displayed on the high-injury network. If the majority of crashes were evenly dispersed along the entire 1-mile segment, it was determined to be most appropriate to remain at that length for display on the high-injury network. The project team manually reviewed each Boulder County segment falling above the identified thresholds and used engineering judgement to select the ultimate Boulder County segments to be displayed on the final high-injury network. Appendix A displays the comprehensive list of HIN segments and intersections with their weighted crash scores/thresholds.

Bicycle & Pedestrian High Injury Network Development

Given that bicycle and pedestrian crashes made up a relatively large proportion of injury crashes in Boulder County, the project team created a high-injury network focused specifically on these crash types. To identify this network, the same process was followed as for the general high-injury network, with the injury crash dataset limited to those with a crash type of "BICYCLE" or "PEDESTRIAN." Similarly to the general high-injury network, segments and intersections were analyzed separately, and thresholds were determined separately for CDOT highways and Boulder County roads. For Boulder County and CDOT segments, 1-mile segments were used for the Bicycle & Pedestrian HIN. Due to the relatively small dataset and the short length of some neighborhood roads, some segments and intersections with only 1 injury crash fell above their respective "average + 1 standard deviation" thresholds. These segments were removed from the bicycle & pedestrian high-injury network if the single crash resulted in a minor injury but were retained if the crash resulted in a serious injury or fatality.

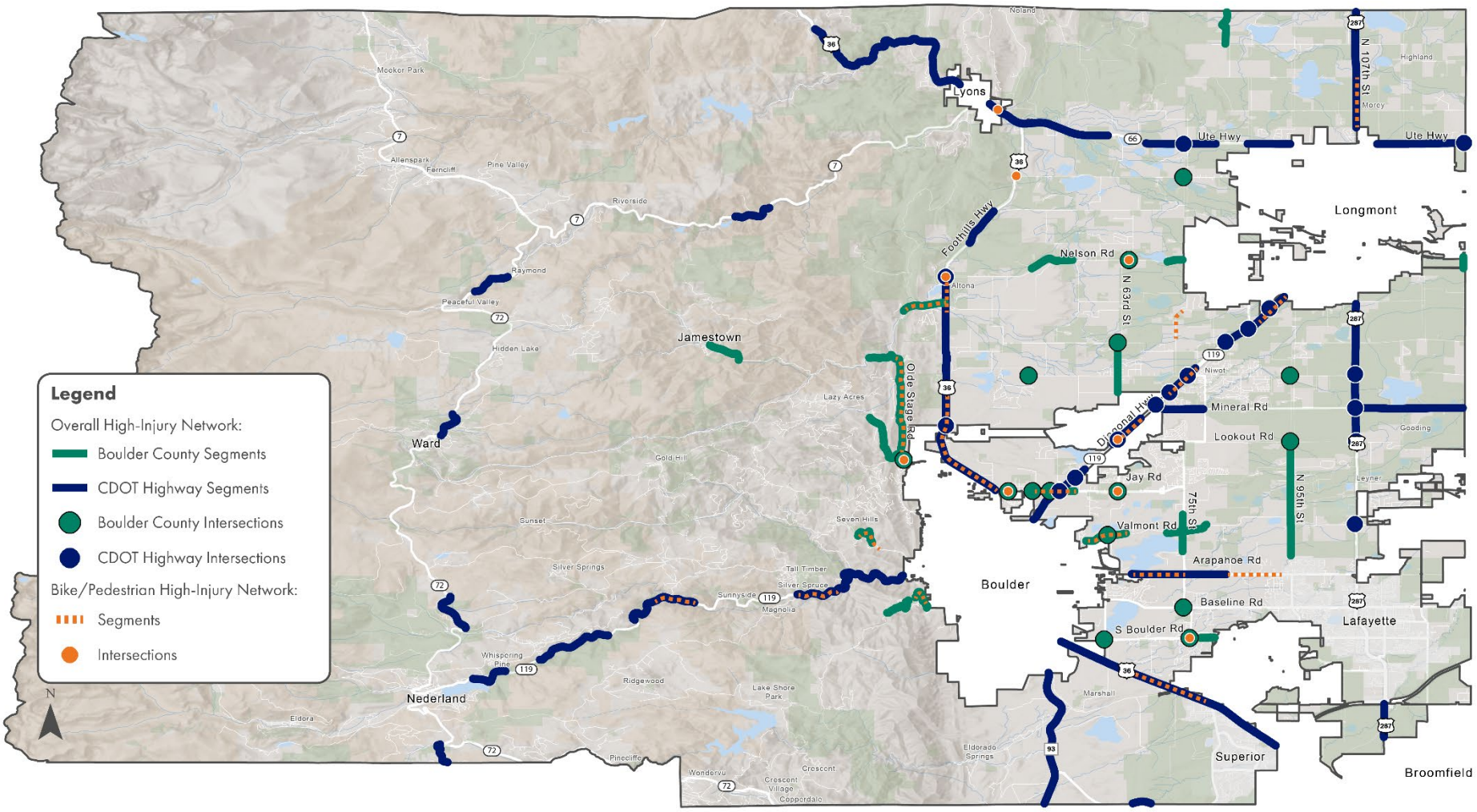


Figure 20. Boulder County High Injury Network

Final Considerations

Ten years of crash data was obtained from CDOT from January 1, 2013, to December 31, 2022, for completion of the safety analysis and development of the HIN. The following key findings are based on a review of crash data from 2013 to 2022.

- Overall, the number of crashes has decreased since 2019, but the number of serious injuries and fatal crashes has remained constant or has increased.
- Since 2020, the number of serious and fatal crashes each year is increasing.
- CDOT highways account for 14% of the centerline miles within the study area, but account for 70% of the serious injury and fatal crashes.
- Boulder County roads account for 86% of the centerline miles within the study area, but only 30% of the serious injury and fatal crashes.
- Top crash types were analyzed separately for CDOT highways and Boulder County roads to understand how crash types differed on each roadway type.
    - Top crash types on Boulder County roads that result in serious injury and fatality include bicycle (20%), fixed-object (20%), overturning (15%), broadside (8%), and head on (6%).
    - Top crash types on CDOT highways that resulted in serious injury and fatality include overturning (16%), head on (13%), broadside (13%), fixed-object (11%), and approach turn (10%).
    - Rear-ends typically result in a high percentage of all crashes, but a lower percentage of serious injury and fatal crashes; thus, rear-ends typically result in less serious injury.
- The following crash profiles represent 77% of the serious injury and fatal crashes in Boulder County:
    - Single-vehicle (including vehicles departing from the road, colliding with fixed-objects, and overturning vehicles) – 36%
    - Bicycle – 12%
    - Head-on – 11%
    - Broadside – 9%
    - Left-turn – 9%
- Most crashes on both county roads and CDOT highways occur at non-intersection locations.
- Most crashes occur between 3PM and 6PM in daylight and dry conditions.
- Passenger car/van is the most common vehicle type at fault. However, motorcycle and bicycle crashes are overrepresented in serious injury and fatal crashes for vehicles at fault.
- Roads with the most motorcycle crashes include SH 72, CO 119 – Boulder Canyon, and US 36 – N US 36.
- Roads with the most bicycle crashes include US 36 – US 36 and CO 119 – Diagonal Highway.

A high-injury network (HIN) based on historical crash data has been identified that includes 7% of the centerline miles but accounts for 66% of the serious injury and fatal crashes.

Appendix A: HIN Segments and Intersections – Ranked by Total Number of Weighted Crashes

Table 8: Boulder County HIN Intersections

Intersecting Roadways	Total Weighted Injury Crashes
76th Street & South Boulder Road	13
Cherryvale Road & South Boulder Road	10
65th Street & Nelson Road	9
95th Street & Lookout Road	9
63rd Street & Oxford Road	7
95th Street & Niwot Road	7
75th Street & Baseline Road	6
30th Street & Jay Road	6
63rd Street & Jay Road	6
75th Street & Hygiene Road	5
51st Street & Jay Road	5
Lee Hill Drive & Wagonwheel Gap Road	5
Golf Club Drive & Niwot Road	5
61st Street & Valmont Road	5
47th Street & Jay Road	5

Table 9: Colorado Department of Transportation HIN Intersections

Intersecting Roadways	Total Weighted Injury Crashes
US 287 & Mineral Road	63
Isabelle Road & US 287	50
CO 119 & Niwot Road	22
75th Street & Ute Highway	20
US 287 & Lookout Road	20
66th Street, East County Line Road, & Ute Highway	18
US 287 & Niwot Road	17
63rd Street & CO 119	16
Airport Road, CO 119, & Ogallala Road	16
55th Street & CO 119	14
IBM Drive, Mineral Road, & CO 119	14
US 36 & Nelson Road	13
Monarch Road & CO 119	11
83rd Street & CO 119	9
Fordham Street & CO 119	7
CO 119 & Jay Road	7
Longhorn Road & US 36	7
US 36 & Hygiene Road	5
McConnell Drive, Stone Canyon Drive, & Ute Highway	4

Table 10: Boulder County HIN Roadway Segments

Roadway	Segment Starting Roadway	Segment Ending Roadway	Total Weighted Injury Crashes per Mile
South Boulder Road	McCaslin Boulevard	Ponderosa Drive	15
Lefthand Canyon Drive	Olde Stage Road	Crossing over Left Hand Creek	12
Flagstaff Road	Gregory Lane	MM 1	12
Nelson Road	Clover Basin Reservoir	75th Street	11
Sunshine Canyon Drive	Timber Trail	Eagles Drive	10
Lefthand Canyon Drive	US 36	West of Geer Canyon Drive	9
Flagstaff Road	MM 2	Flagstaff Drive	9
Valmont Road	57th Street	6300 Block	8
Nelson Road	Centennial Ranch	55th Street	8
Olde Stage Road	Lefthand Canyon	Lee Hill Drive	7
75th Street	UP Railroad	Red Deer Drive	6
Valmont Road	Approx 0.4mi W of 75th Street	Approx 0.6mi East of 7th Street (end of curves)	6
Jay Road	47th Street	55th Street	6
63rd Street	Oxford Road	Monarch Road	6
James Canyon Drive	Main Street	MM 2	6
East County Line Road	North of Quicksilver Road	Pike Road	6
95th Street	Lookout Road	Boulder County Boundary	6
73rd Street	East of Plateau Road	North of Nimbus Road	5
83rd Street	County Line Road	Yellowstone Road	5

Lee Hill Drive	57th Street	East of Reed Ranch Road	5

Table 11: Colorado Department of Transportation HIN Roadway Segments

Roadway	Segment Starting Roadway	Segment Ending Roadway	Total Weighted Injury Crashes per Mile
US 36	Boulder County Boundary	MM 41	38
US 36	MM 41	MM 42	28
US 36	MM 42	MM 43	27
Ute Highway	C & S Railroad	Pace Street	26
Ute Highway	Pace Street	County Line Road	26
Boulder Canyon Drive	MM 30	MM 31	24
US 36	County Boundary	Highway 128	23
US 36	Longhorn Road	Highway 7/Broadway	22
Boulder Canyon Drive	MM 32	MM 33	21
Peak to Peak Highway	MM 44	MM 45	21
Saint Vrain Road	MM 17	MM 18	21
US 36	MM 40	MM 41	21
CO 119	MM 50	MM 51	20
US 287	Yellowstone Road	County Road 4	20
Peak to Peak Highway	Boulder County Boundary	Coal Creek Canyon Road	19
CO 119	MM 48	MM 49	18
CO 128	Boulder County Boundary (East of MP 2)	Boulder County Boundary (W of MP3)	18
US 287	Plateau Road	Oxford Road	17
Boulder Canyon Drive	MP 37	MP 38	17
US 287	County Road 4	South of MM 319	17
Ute Highway	North 87th Street	North 95th Street	16
Boulder Canyon Drive	MM 33	MM 34	16
Ute Highway	Boulder County Boundary	US 36	16
US 36	Nelson Road	Middle Fork Road	16
Peak to Peak Highway	MM 51	MM 52	16
Saint Vrain Road	MM 15	MM 16	15
US 36	MM 44	County Boundary	15

CO 119	MM 52	MM 53	15
Arapahoe Road	Arapahoe Ridge High School	75th Street	14
Ute Highway	McCall Drive	75th Street	14
US 287	Niwot Road	Mineral Road	14
US 36	MM 43	MM 44	14
US 36	Highway 128	Eldorado Springs Drive	13
Ute Highway	US 36	53rd Street	13
112th Street	Boulder County Boundary/144th Avenue	Boulder County Boundary	13
US 36	South Vrain Road	North of MM 26	13
US 36	South of MM 30	Longhorn Road	13
US 36	MM 28	MM 29	13
Boulder Canyon Drive	MM 40	Boulder County Boundary	13
CO 119	MM 45	South of MM 46	12
Mineral Road	North 115th Street	County Line Road	12
US 287	Oxford Road	Niwot Road	12
Mineral Road	US 287	115th Street	11
US 287	Boulder County Boundary	Yellowstone Road	11
Arapahoe Road	75th Street	East of MM 58	11
Peak to Peak Highway	MM 37	Sugarloaf Road	11
Boulder Canyon Drive	MM 27	MM 28	11
US 287	Mineral Road	Lookout Road	11
Ute Highway	53rd Street	61st Street	11
Ute Highway	75th Street	Table Mountain Road	11
US 36	MM 29	South of MM 30	11
US 36	Highway 7/Broadway	Jay Road	11
Saint Vrain Road	MM 14	MM 15	10
Saint Vrain Road	MM 18	MM 19	10
Saint Vrain Road	MM 19	Boulder County Boundary	10
CO 119	South of MM 46	MM 47	9
Saint Vrain Road	MM 16	MM 17	9

Boulder Canyon Drive	MM 38	MM 39	9
US 36	MM 15	Eldorado Springs Drive	9
CO 119	MM 53	MM 54	8
Mineral Road	71st Street	79th Street	8
Boulder Canyon Drive	MM 29	MM 30	8
Saint Vrain Road	MM 25	MM 26	8
Boulder Canyon Drive	MM 39	MM 40	8
Arapahoe Road	West of MM 58	Boulder County Boundary	7

APPENDIX C

HIGH-INJURY NETWORK (HIN) SCORING MEMORANDUM

Memorandum

Date: April 09, 2025

To: Boulder County Vision Zero Action Plan Project Team

From: Consor Engineers

Subject: Boulder County Vision Zero Action Plan – High-Injury Network Scoring

Table of Contents

Introduction 2
Identification of Factors 2
Community Engagement 2
Assigning Factor Scores 3
Equity 3
Vulnerable Road Users 6
Crash Concentrations 6
Community Input 7
Factor Weighting 8
Scoring Results 9

Table of Tables

Table 1. Equity Index EnviroScreen Scores 4
Table 2. Equity Index Social Vulnerability Index Scores 4
Table 3. Equity Index Low Wage Job Concentration Scores 5
Table 4. Equity Index School & Transit Proximity Scores 5
Table 5. Equity Index Equitable Transportation Community Index Scores 5
Table 6. Equity Factor Score Breakdown 6
Table 7. Vulnerable Road User Factor Score Breakdown 6
Table 8. Crash Concentration Factor Score Breakdown 7
Table 9. County-Owned Intersection Community Input Factor Score Breakdown 7
Table 10. County-Owned Segment Community Input Factor Score Breakdown 7
Table 11. CDOT-Owned Intersection Community Input Factor Score Breakdown 7
Table 12. CDOT-Owned Segment Community Input Factor Score Breakdown 8
Table 13. County-Owned Intersection HIN Scores 9
Table 14. County-Owned Segment HIN Scores 10
Table 15. CDOT-Owned Intersection HIN Scores 11
Table 16. CDOT-Owned Segment HIN Scores 12

Introduction

As part of the Boulder County Vision Zero Action Plan (VZAP), a High-Injury Network (HIN) and Bike & Pedestrian HIN were identified and ranked to inform implementation of safety projects. The HIN and Bike & Pedestrian HIN are compilations of the road segments and intersections on county-owned and CDOT-owned roads with the highest concentrations of historic crashes resulting in injuries or fatalities. A summary of the road segmentation and HIN development process can be found in Appendix B of the Boulder County VZAP. Each road segment and intersection on the HIN was given a score utilizing a data-driven approach informed by community engagement. These scores were used to group county-owned projects into High, Medium, and Low-scoring segments and intersections, used to guide additional analysis needs and phased implementation. While this scoring system provides a general framework, the final order of implementation will also depend on funding availability, coordination with other planned capital and maintenance projects, and further community and agency input.

Identification of Factors

Several factors were identified to highlight the segments and intersections where safety projects may provide the greatest impact on eliminating serious injury and fatal crashes in Boulder County. These factors were developed based on an understanding of crash trends and project goals, including supporting safety for all modes of travel and prioritizing equity in transportation safety investments. Factors included:

- Equity: To strategically implement safety interventions in locations where they will provide the highest benefit to historically disadvantaged populations, HIN locations were assigned scores based on a segment-level equity index.
- Vulnerable Road Users: To address crashes involving bicyclists and pedestrians, which make up over 20% of all serious injury and fatal crashes on Boulder County roads, projects were scored hiegher in locations with concentrations of this crash type, particularly where dedicated facilities for walking and biking are lacking.
- Crash History: To focus safety investment where the most severe crashes are occurring, locations with high concentrations of serious injuries or fatalities compared to minor injuries were highlighted.
- Community-Identified Need: To address locations where people report feeling unsafe, HIN locations received scores based on concentrations of map pins from Phase 1 of engagement.

Community Engagement

The factors were presented to the community during Phase 2 of engagement through in-person activities at pop-up events, an informational online video, and an online survey. Pop-up participants were asked to distribute seven tokens amongst the four factors according to the distribution of their priorities. At both pop-up events, the top factor for participants was to improve walking and biking safety, followed by focusing on locations with known crash history. Survey participants were asked to rank each factor on a scale from not important (1) to very important (5). Factors were assigned a weighted average based on the distribution of responses:

The results of this community engagement informed the weighting of factors once scores were assigned to each segment and intersection.

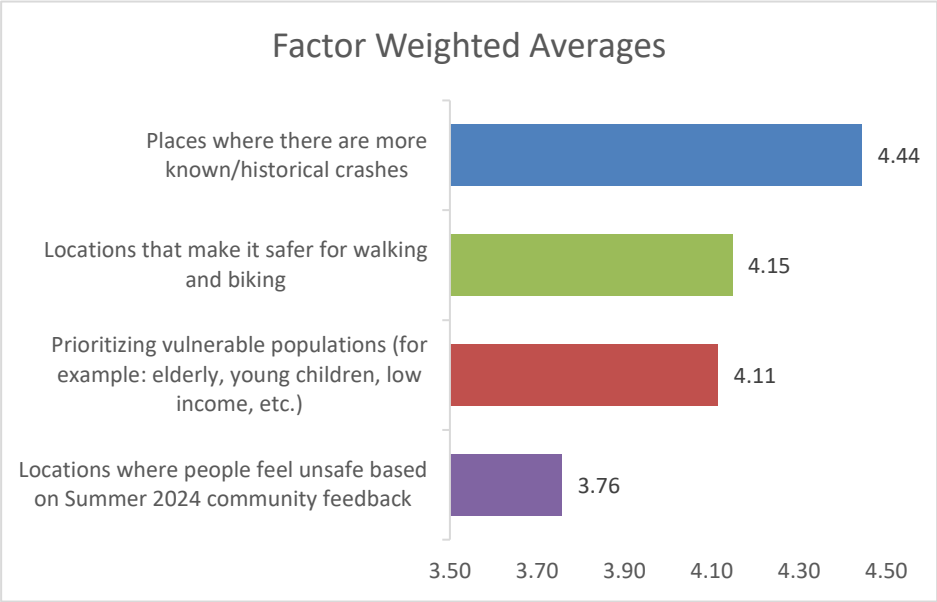


Figure 1. Phase 2 HIN Scoring Community Input

Assigning Factor Scores

Equity

To determine which projects might provide the greatest benefit to historically disadvantaged populations, segments were assigned a score according to the results of a segment-level equity analysis that resulted in a county-wide index.

EQUITY INDEX DEVELOPMENT

The creation of the segment-level index relied upon federal and state census block-level tools available at the time of development, and determination of inputs was based on analysis of peer city equity indices, inputs used in similar analyses by Boulder County, and data availability. The team also reviewed layers being developed within other SS4A efforts in Colorado, including: Larimer County, Town of Castle Rock, and Town of Silverthorne. The following inputs informed the equity index:

Colorado EnviroScreen

This state-level tool uses 35 indicators to calculate a percentile score for each census block group that provides a quantifiable measurement of combined environmental stressors. The indicators are grouped into five main categories: environmental exposures, environmental effects, climate vulnerability, sensitive populations (health indicators), and demographics. Each road segment in Boulder County was assigned a score based on the

EnviroScreen Percentile of the block group into which the majority (≥50% of length) of the segment fell. Scores were determined as follows:

Table 1. Equity Index EnviroScreen Scores

EnviroScreen Percentile	Equity Index Score
0 – 25th Percentile	0
25th – 50th Percentile	1
50th – 75th Percentile	2
75th – 100th Percentile	3

CDC Social Vulnerability Index

This federal tool provides an in-depth look at demographic data related to vulnerability at the census tract level. The Social Vulnerability Index determines an overall vulnerability percentile score based on 16 factors organized into four categories: socioeconomic status, household characteristics, racial and ethnic minority status, and housing type & transportation. Each road segment in Boulder County was assigned a score based on the Social Vulnerability Index Percentile of the tract into which the majority (≥50% of length) of the segment fell. Scores were determined as follows:

Table 2. Equity Index Social Vulnerability Index Scores

Social Vulnerability Index Percentile	Equity Index Score
0 – 25th Percentile	0
25th – 50th Percentile	1
50th – 75th Percentile	2
75th – 100th Percentile	3

Census OnTheMap Concentration of Low Wage Jobs

This federal tool visualizes where workers are employed and where they live based on LEHD Origin-Destination Employment Statistics (LODES) dataset, developed through a partnership between the U.S. Census Bureau and Local Employment Dynamics partner states, including Colorado. The tool identifies concentrations of workers making $1,250 per month or less, defined as a "low wage job." Each road segment in Boulder County was assigned a score if the majority (≥50% of length) of the segment fell into an area considered a concentration relative to the rest of Boulder County based on a quantile breakdown. Scores were determined as follows:

Table 3. Equity Index Low Wage Job Concentration Scores

Low Wage Job Concentration	Equity Index Score
≥ 473 low wage jobs/sq mi	1

Presence within 1/4mi of a school and/or transit stop

Schools and transit stops were buffered by 1/4mi to determine locations that may have higher concentrations of populations such as elderly, youth, etc.. These locations were identified using Colorado Department of Public Health and Environment (CDPHE) School Locations and Regional Transportation District (RTD) Bus Stop geospatial layers. Each road segment in Boulder County was assigned a score if the majority (≥50% of length) of the segment fell into the quarter mile buffer of schools and transit stops. Scores were determined as follows:

Table 4. Equity Index School & Transit Proximity Scores

School & Transit Proximity	Equity Index Score
Within 1/4mi of an RTD Bus Stop	1
Within 1/4mi of a CDPHE School Location	1

Equitable Transportation Community Index

This federal tool developed by the Department of Transportation (DOT) as part of the Justice40 Initiative displays location data at the census tract level based on transportation insecurity, climate and disaster risk burden, environmental burden, health vulnerability, and social vulnerability. For the purposes of the Boulder County Equity Index, only the Transportation Insecurity Indicator was included as a factor in the index as the other three indicators were addressed by the EnviroScreen and CDC Social Vulnerability Index factors. The Transportation Insecurity Indicator includes factors grouped into the categories of transportation access, transportation cost burden, and fatalities per 100,000 people. The DOT considers a census tract to be Transportation Insecure if the normalized score is in the top 65th percentile or higher of all census tracts in the state. Each road segment in Boulder County was assigned a score if the majority (≥50% of length) of the segment fell into a census tract considered Transportation Insecure. Scores were determined as follows:

Table 5. Equity Index Equitable Transportation Community Index Scores

Equitable Transportation Community Index	Equity Index Score
≥ 65th percentile	1

Each road segment was assigned a final Equity Index score based on the sum of the calculated scores for each factor, with the highest possible score being a ten and the highest achieved score in Boulder County being an eight.

Each segment and intersection was assigned an Equity Factor score based on the Equity Index score at that location. For intersections, the highest Equity Index score of the intersection segments was used. The Equity Factor Scores associated with the Equity Index Score ranges were determined based on the distribution of all scores and were as follows:

Table 6. Equity Factor Score Breakdown

Equity Index Score	Equity Factor Score
0 -2	0
3 - 4	1
5 - 8	2

Vulnerable Road Users

To determine the locations where safety investment may have the greatest impact on eliminating serious injury and fatal crashes involving bicyclists and pedestrians, segments and intersections were elevated if they were identified on the Bike & Pedestrian HIN. They received additional scoring if they were on the Bike & Pedestrian HIN and did not have a dedicated bicycle facility, defined as a separated multiuse path or bicycle lane. Vulnerable Road User Factor Scores were assigned as follows:

Table 7. Vulnerable Road User Factor Score Breakdown

Roadway Characteristic	Vulnerable Road User Factor Score
Not on the Bicycle & Pedestrian HIN	0
On the Bicycle & Pedestrian HIN	1
On the Bicycle & Pedestrian HIN and lacking a dedicated bicycle facility	2

Crash Concentrations

To develop the HIN and Bicycle and Pedestrian HIN, minor injury crashes, serious injury crashes, and fatal injury crashes were assigned weights of 1, 2, and 4 respectively. To determine and elevate the locations along the HINs where the highest concentrations of serious injury and fatal crashes were occurring, a crash severity ratio was calculated for each segment or intersection based on the ratio of weighted injury crashes to total injury crashes. For example, an intersection with 6 minor injury crashes (total weighted crashes = 6) would have a ratio of 1 (6 weighted crashes divided by 6 total injury crashes), while an intersection with 3 minor injury crashes and 3 serious injury crashes (total weighted crashes = 9) would have a ratio of 1.5 (9 weighted crashes divided by 6 total injury crashes). Segments and intersections were assigned Crash Concentration Factor Scores based on their crash severity ratios. The Crash

Concentration Factor Scores associated with each crash severity ratio range were determined based on the distribution of all ratios and were as follows:

Table 8. Crash Concentration Factor Score Breakdown

Crash Severity Ratio	Crash Concentration Factor Score
<1.5	0
1.5 – 2.0	1
>2.0	2

Community Input

To incorporate community input about locations where people feel unsafe, the number of map pins and associated upvotes during Phase 1 of engagement on each segment and intersection informed a Community Input Factor Score. Based on the variations in range of number of pins placed on segments vs intersections and county-owned roads vs CDOT-owned roads, the Community Input Factor Scores associated with each range of number of map pins was determined differently for each of these distinct project types, as follows:

Table 9. County-Owned Intersection Community Input Factor Score Breakdown

Number of Map Pins	Community Input Factor Score
0 comments/upvotes	0
1-2 comments/upvotes	1
>2 comments/upvotes	2

Table 10. County-Owned Segment Community Input Factor Score Breakdown

Number of Map Pins	Community Input Factor Score
<3 comments/upvotes per mile	0
3 – 20 comments/upvotes per mile	1
>20 comments/upvotes per mile	2

Table 11. CDOT-Owned Intersection Community Input Factor Score Breakdown

Number of Map Pins	Community Input Factor Score
0 comments/upvotes	0
1 comments/upvotes	1
2 comments/upvotes	2

Table 12. CDOT-Owned Segment Community Input Factor Score Breakdown

Number of Map Pins	Community Input Factor Score
<5 comments/upvotes per mile	0
5 – 25 comments/upvotes per mile	1
>25 comments/upvotes per mile	2

Factor Weighting

To best align with community and county priorities, the factors were weighted differently compared to each other. The weighted averages of each factor from Phase 2 of outreach in conjunction with staff input informed the following weighting:

Factor	Weight
Equity Factor Score	2
Vulnerable Road User Factor Score	2
Crash Concentration Factor Score	4
Community Input Factor Score	1

The total HIN Score was calculated for each segment and intersection using the following formula:

*HIN Score = (Equity Factor Score * 2 + (Vulnerable Road User Factor Score * 2) + (Crash Concentration Factor Score * 4) + (Community Input Factor Score * 1)*

Scoring Results

The final HIN scores for each segment and intersection are listed below from highest score to lowest. Segments and intersections were categorized into High, Medium, and Low to provide a general implementation framework. However, the final order of implementation will also depend on funding availability, coordination with other planned capital and maintenance projects, and further community and agency input.

Table 13. County-Owned Intersection HIN Scores

Category	Intersecting Roadways	HIN Score
High	63rd Street & Jay Road	16
	Lee Hill Drive & Wagonwheel Gap Road	14
	61st Street & Valmont Road	10
	75th Street & Hygiene Road	10
	30th Street & Jay Road	10
Medium	51st Street & Jay Road	9
	63rd Street & Oxford Road	8
	65th Street & Nelson Road	8
	76th Street & South Boulder Road	6
Low	Golf Club Drive & Niwot Road	4
	95th Street & Lookout Road	4
	75th Street & Baseline Road	2
	95th Street & Niwot Road	1
	47th Street & Jay Road	0
	Cherryvale Road & South Boulder Road	0

Table 14. County-Owned Segment HIN Scores

Category	Intersecting Roadways	Segment Start	Segment End	HIN Score
High	Valmont Road	57th Street	6300 Block	18
	Lefthand Canyon Drive	US 36	West of Geer Canyon Drive	16
	Sunshine Canyon Drive	Timber Trail	Eagles Drive	12
	James Canyon Drive	Main Street	MM 2	10
	Jay Road	47th Street	55th Street	10
	Flagstaff Road	Gregory Lane	MM 1	10
	Olde Stage Road	Lefthand Canyon	Lee Hill Drive	10
Medium	Lee Hill Drive	57th Street	East of Reed Ranch Road	9
	83rd Street	County Line Road	Yellowstone Road	8
	Valmont Road	Approx 0.4mi W of 75th Street	Approx 0.6mi East of 7th Street (end of curves)	8
	95th Street	Lookout Road	Boulder County Boundary	8
	Lefthand Canyon Drive	Olde Stage Road	Crossing over Left Hand Creek	8
	Nelson Road	Clover Basin Reservoir	75th Street	8
	Nelson Road	Centennial Ranch	55th Street	6
Low	Flagstaff Road	MM 2	Flagstaff Drive	4
	73rd Street	East of Plateau Road	North of Nimbus Road	4
	East County Line Road	North of Quicksilver Road	Pike Road	2
	South Boulder Road	McCaslin Boulevard	Ponderosa Drive	1
	63rd Street	Oxford Road	Monarch Road	0
	75th Street	UP Railroad	Red Deer Drive	0

Table 15. CDOT-Owned Intersection HIN Scores

Category	Intersecting Roadways	HIN Score
High	Isabelle Road & US 287	14
	US 287 & Niwot Road	8
	66th Street, East County Line Road, & Ute Highway	8
	CO 119 & Niwot Road	8
	US 36 & Hygiene Road	8
Medium	US 287 & Lookout Road	6
	McConnell Drive, Stone Canyon Drive, & Ute Highway	6
	US 36 & Nelson Road	5
	US 287 & Mineral Road	4
	75th Street & Ute Highway	4
	CO 119 & Jay Road	4
	83rd Street & CO 119	4
	63rd Street & CO 119	2
Low	Fordham Street & CO 119	0
	Monarch Road & CO 119	0
	IBM Drive, Mineral Road, & CO 119	0
	55th Street & CO 119	0
	Airport Road, CO 119, & Ogallala Road	0
	Longhorn Road & US 36	0

Table 16. CDOT-Owned Segment HIN Scores

Category	Segment Name	Segment Start	Segment End	HIN Score
High	US 287	County Road 4	South of MM 319	16
	Arapahoe Road	West of MM 58	Boulder County Boundary	14
	CO 128	Boulder County Boundary (East of MP 2)	Boulder County Boundary (W of MP3)	13
	US 36	Nelson Road	Middle Fork Road	12
	CO 119	MM 53	MM 54	12
	CO 119	MM 45	South of MM 46	10
	US 36	Highway 7/Broadway	Jay Road	10
	US 36	Longhorn Road	Highway 7/Broadway	10
	Boulder Canyon Drive	MM 33	MM 34	10
	Boulder Canyon Drive	MP 37	MP 38	10
Medium	US 36	South Vrain Road	North of MM 26	9
	Arapahoe Road	Arapahoe Ridge High School	75th Street	9
	Ute Highway	Boulder County Boundary	US 36	8
	US 36	Highway 128	Eldorado Springs Drive	8
	Ute Highway	Pace Street	County Line Road	8
	US 287	Boulder County Boundary	Yellowstone Road	8
	US 287	Yellowstone Road	County Road 4	8
	Mineral Road	North 115th Street	County Line Road	8
	Peak to Peak Highway	MM 37	Sugarloaf Road	8
	Peak to Peak Highway	MM 51	MM 52	8
	Saint Vrain Road	MM 15	MM 16	8
	Peak to Peak Highway	MM 44	MM 45	8
	US 287	Plateau Road	Oxford Road	7
	Boulder Canyon Drive	MM 27	MM 28	7
	Boulder Canyon Drive	MM 40	Boulder County Boundary	7
Low	Mineral Road	US 287	115th Street	7
	US 36	MM 29	South of MM 30	6
	US 36	MM 28	MM 29	6

Category	Segment Name	Segment Start	Segment End	HIN Score
Low	Ute Highway	US 36	53rd Street	6
	US 36	MM 41	MM 42	6
	US 36	MM 42	MM 43	6
	CO 119	MM 50	MM 51	6
	US 36	MM 43	MM 44	5
	CO 119	South of MM 46	MM 47	5
	US 36	County Boundary	Highway 128	5
	Boulder Canyon Drive	MM 30	MM 31	5
	CO 119	MM 52	MM 53	5
	Peak to Peak Highway	Boulder County Boundary	Coal Creek Canyon Road	5
	Ute Highway	53rd Street	61st Street	5
	Boulder Canyon Drive	MM 39	MM 40	4
	112th Street	Boulder County Boundary/144th Avenue	Boulder County Boundary	4
	US 36	Boulder County Boundary	MM 41	4
	US 36	MM 40	MM 41	4
	Saint Vrain Road	MM 25	MM 26	4
	Saint Vrain Road	MM 18	MM 19	4
	Saint Vrain Road	MM 17	MM 18	4
	Saint Vrain Road	MM 16	MM 17	4
	Ute Highway	McCall Drive	75th Street	4
	US 36	South of MM 30	Longhorn Road	4
	CO 119	MM 48	MM 49	4
	US 287	Oxford Road	Niwot Road	3
	US 287	Niwot Road	Mineral Road	3
	Mineral Road	North 115th Street	County Line Road	3
	US 287	Mineral Road	Lookout Road	3
	Boulder Canyon Drive	MM 38	MM 39	2
	Arapahoe Road	75th Street	East of MM 58	2
	US 36	MM 44	County Boundary	2
	Ute Highway	C & S Railroad	Pace Street	2
	Boulder Canyon Drive	MM 32	MM 33	1

Category	Segment Name	Segment Start	Segment End	HIN Score
Low	Boulder Canyon Drive	MM 29	MM 30	0
	US 36	MM 15	Eldorado Springs Drive	0
	Saint Vrain Road	MM 19	Boulder County Boundary	0
	Saint Vrain Road	MM 14	MM 15	0
	Ute Highway	North 87th Street	North 95th Street	0
	Ute Highway	75th Street	Table Mountain Road	0

APPENDIX D

HIGH-INJURY NETWORK (HIN) FACT SHEETS AND PROJECT RECOMMENDATIONS - GROUP 1

HIGH-INJURY NETWORK (HIN) FACT SHEETS AND PROJECT RECOMMENDATIONS - GROUP 1

TABLE OF CONTENTS

VALMONT ROAD 2

LEFTHAND CANYON DRIVE 5

SUNSHINE CANYON DRIVE 8

63RD STREET & JAY ROAD INTERSECTION 11

LEE HILL DRIVE & WAGONWHEEL GAP ROAD INTERSECTION 15

75TH STREET & HYGIENE ROAD INTERSECTION 18

CORRIDOR FACTS

Corridor Boundary: 57th Street to 6300 block

Functional Class: West of 61st Street: Principal Arterial (11,350 ADT)
East of 61st Street: Minor Arterial (7,600 ADT)

Corridor Length: 1 Mile

Posted Speed Limit: 40mph

Travel Lanes: West of 61st Street: four lanes (two lanes in each direction)
East of 61st Street: two lanes (one lane in each direction)

Bicycle Facilities: Bikeable Shoulder

TOTAL CRASHES

26

MINOR INJURIES

2

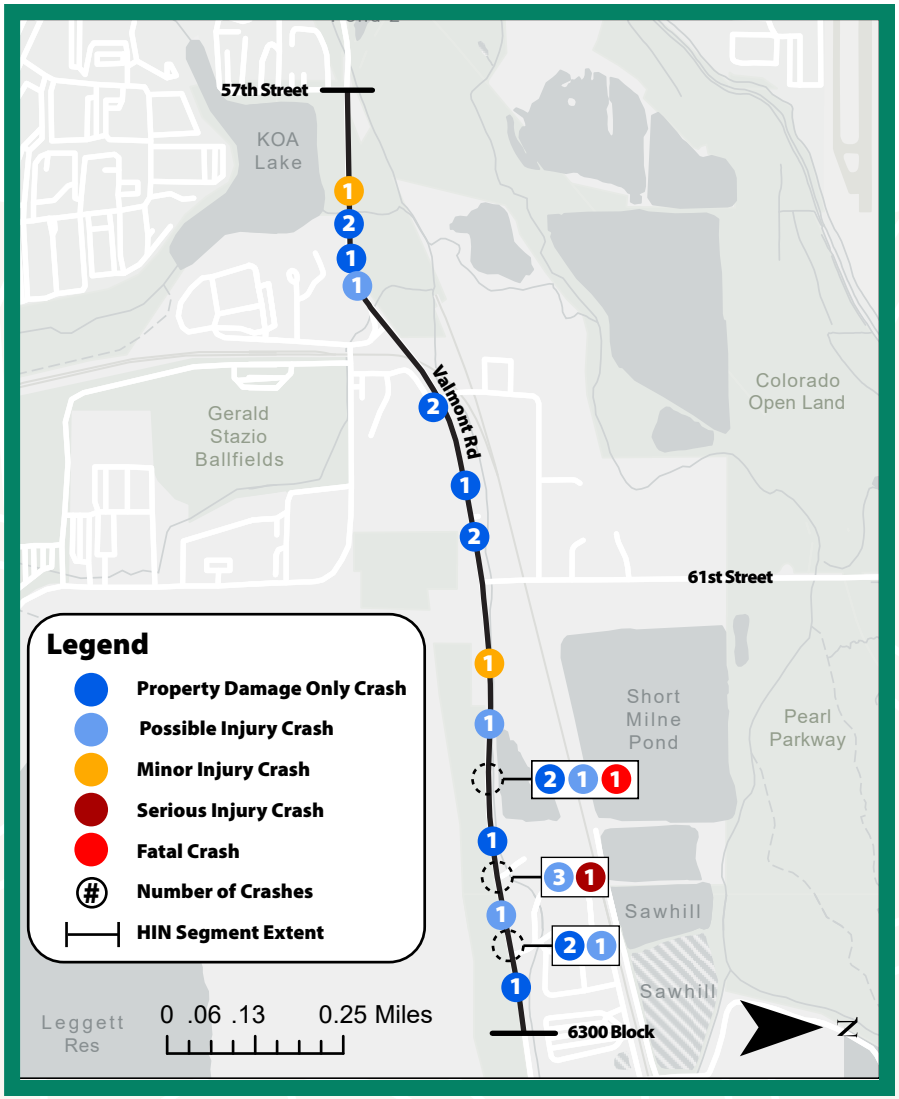
FATALITIES

1

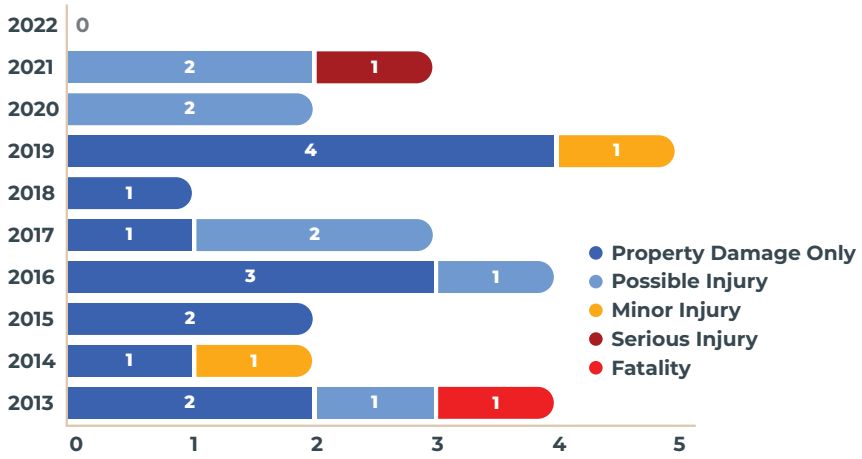
SERIOUS INJURIES

1

Note: an additional minor injury crash occurred on Valmont Road in 2023, outside of the VZAP data analysis period (2013 - 2022).



CRASHES BY YEAR

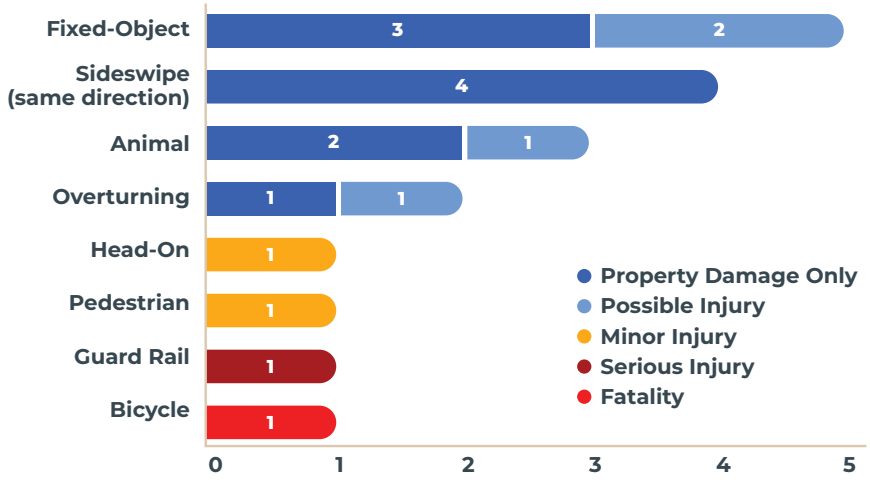


LIGHTING CONDITIONS

Severity	Daylight	Dawn or Dusk	Dark Lighted	Dark Unlighted
Non-KSI	14	1	2	7
KSI	1	1	0	0

KSI - Killed or Serious Injury

CRASHES BY TYPE



OVERREPRESENTED CRASH TRENDS

Trend	% of Total Crashes for Corridor	State Average % at Similar Facility Type
Injury Crashes (east of 61st Street)	56%	23%
Two-Vehicle Crashes (east of 61st Street)	44%	30%

FACT SHEET > VALMONT ROAD

CRASH REDUCTION POTENTIAL

West of 61st Street: Rural Flat and Rolling 4-Lane Divided Highway

East of 61st Street: Rural Flat and Rolling 2-Lane Undivided Highway

FREQUENCY OF CRASHES

West of 61st Street: **Low to Medium** Potential for Crash Reduction

East of 61st Street: **High** Potential for Crash Reduction

SEVERITY OF CRASHES

West of 61st Street: **Low to Medium** Potential for Crash Reduction

East of 61st Street: **High** Potential for Crash Reduction

Planning-Level Recommendation Cost Estimates	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

RECOMMENDATIONS

ROADWAY

- ✔ Consider lighting on curves throughout corridor to improve visibility of curbed median during night time, however, this may be difficult if utilities are not present (lighting) **$$$**
- ✔ Maintain foliage east of 61st Street to improve bicycle space and improve sight distance around curves (bike and ped crashes) **$$**

PEDESTRIAN/BICYCLE FACILITIES

- ✔ Widen road to provide buffered shoulder or increased shoulder width for cyclists, about 2,750 feet east of 61st Street; consider narrowing travel lane to provide more space for buffer (bicycle facilities) **$$$**

SIGNING AND STRIPING

- ✔ Install Chevron (W1-8) signs for curves west of 61st (improved signage) **$**
  - Eastbound west of 61st Street
  - Westbound east of 61st Street
- ✔ Replace existing Object Markers with updated Object Marker (OM-3) signs on median (improved signage) **$**
  - Eastbound, 57th Street
  - Westbound, Butte Mill Road
  - Eastbound, Butte Mill Road
  - Eastbound, west of 61st Street
  - Westbound, west of 61st Street

Note: construction of the 61st Street & Valmont Road Intersection Improvement Project is expected to be completed in 2026.

FACT SHEET › LEFTHAND CANYON DRIVE

CORRIDOR FACTS

Corridor Boundary: West of Geer Canyon Drive to N Foothills Highway (US 36)

Functional Class: Minor Arterial (1,700 ADT)

Corridor Length: 1.03 Miles

Posted Speed Limit: 35 mph westbound | 30 mph eastbound

Travel Lanes: Two lanes (one lane in each direction)

Bicycle Facilities: Bikeable Shoulder

TOTAL CRASHES

7

MINOR INJURIES

2

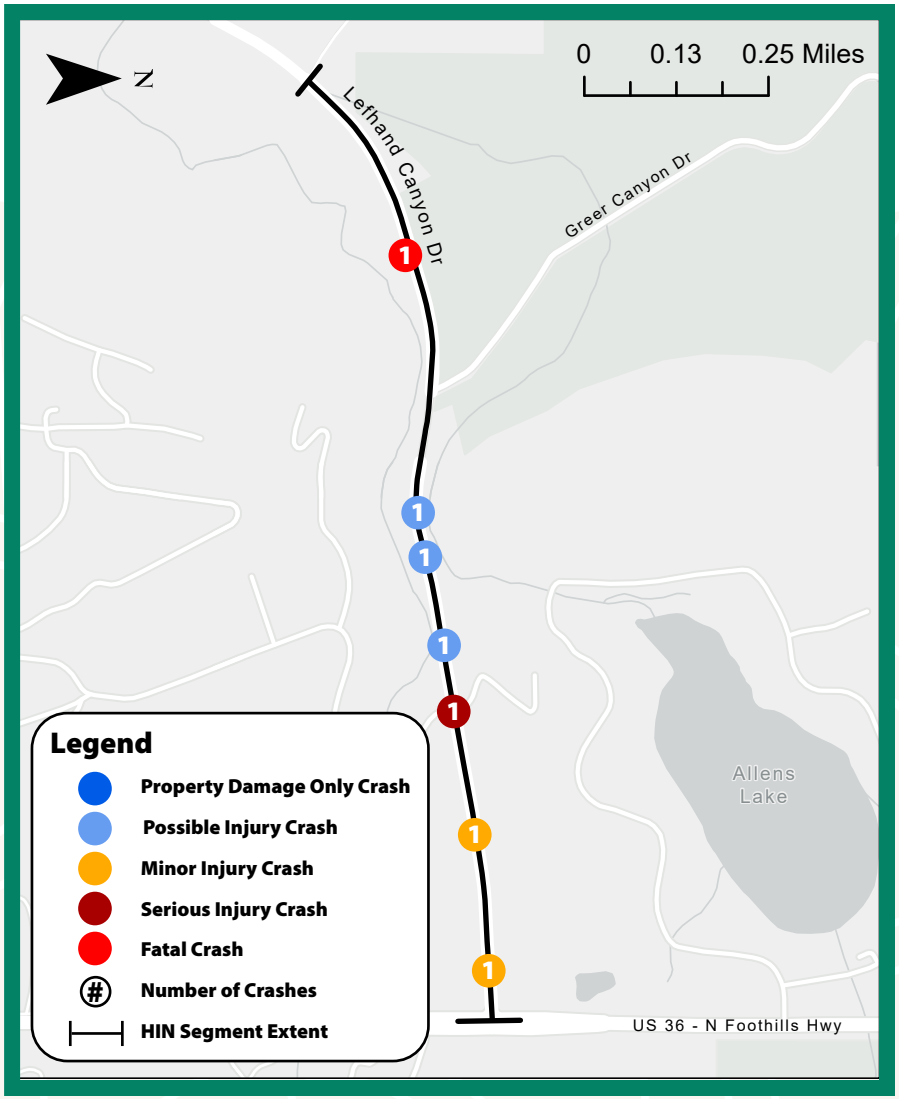
FATALITIES

1

SERIOUS INJURIES

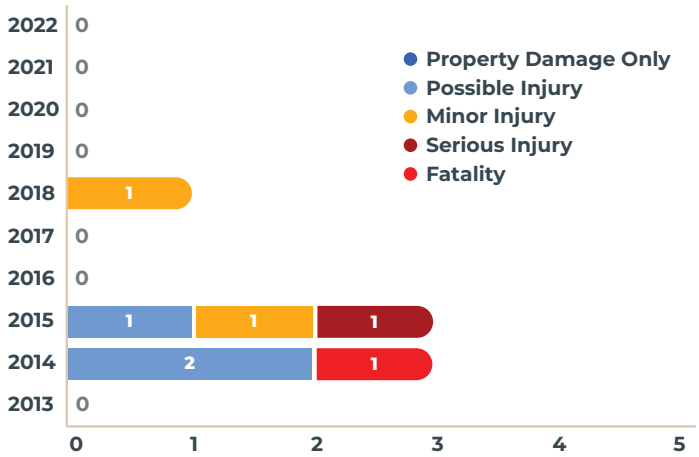
1

Note: Lefthand Canyon was repaved in 2015.



FACT SHEET › LEFTHAND CANYON DRIVE

CRASHES BY YEAR

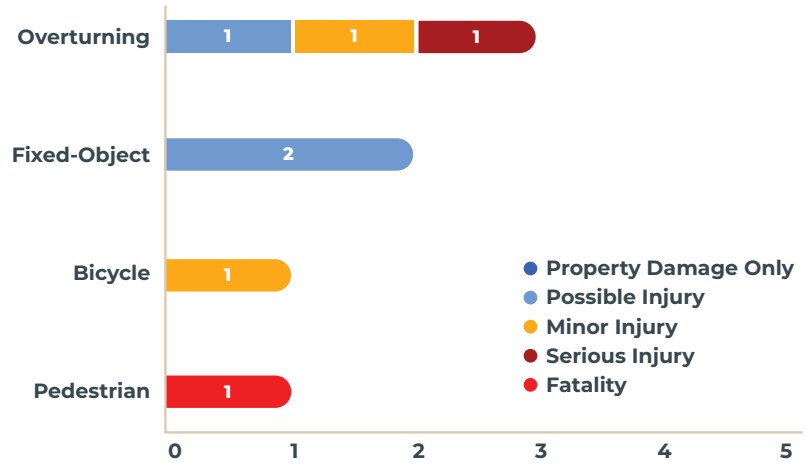


LIGHTING CONDITIONS

Severity	Daylight	Dawn or Dusk	Dark Lighted	Dark Unlighted
Non-KSI	3	0	0	2
KSI	2	0	0	0

KSI - Killed or Serious Injury

CRASHES BY TYPE



OVERREPRESENTED CRASH TRENDS

Trend	% of Total Crashes for Corridor	State Average % at Similar Facility Type
Injury Crashes	100%	31%
Overturning Crashes	50%	22%

FACT SHEET › LEFTHAND CANYON DRIVE

CRASH REDUCTION POTENTIAL

Rural Mountainous 2-Lane Undivided Highway

FREQUENCY OF CRASHES

Low to Medium Potential for Crash Reduction

SEVERITY OF CRASHES

Medium to High Potential for Crash Reduction

Planning-Level Recommendation Cost Estimates	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

RECOMMENDATIONS

ROADWAY

- ✔ Evaluate changing the speed limit in both directions to 25 mph (injury crashes, overturning crashes, pedestrian fatality) **$**
- ✔ Evaluate need for guard rails through S-Curve (overturning crashes) **$$$**
- ✔ Review and maintain foliage and clearance distance to trees along curves (line of sight) **$$**
- ✔ Consider prohibiting passing through subject area due to high pedestrian, bicycle, and parked car activity (bicycle crash, pedestrian crash) **$**

PEDESTRIAN/BICYCLE FACILITIES

- ✔ Install "Motorist Must Give Bicycles 3 FT Clearance" (R4-50_CO) signs in the westbound direction (improved signage) **$**

SIGNING AND STRIPING

- ✔ Install Curve Warning (W1-4, W1-10e) sign for curve through study area (overturning crashes, fixed object crash) **$**
- ✔ Add Chevron (W1-8) signs in both directions at curves **$**
- ✔ Install Curve Warning (W1-4, W1-10e) sign for curve through study area (overturning crashes, fixed object crashes) **$**
  - Westbound chevrons to the west of Geer Canyon Drive
  - Eastbound chevrons to the east of Geer Canyon Drive

FACT SHEET › SUNSHINE CANYON DRIVE

CORRIDOR FACTS

Corridor Boundary: East of Eagles Drive to north of Timber Trail

Functional Class: Collector (1,700 ADT)

Corridor Length: 0.77 Miles

Posted Speed Limit: 25 mph

Travel Lanes: Two lanes (one lane in each direction)

Bicycle Facilities: None

TOTAL CRASHES

16

MINOR INJURIES

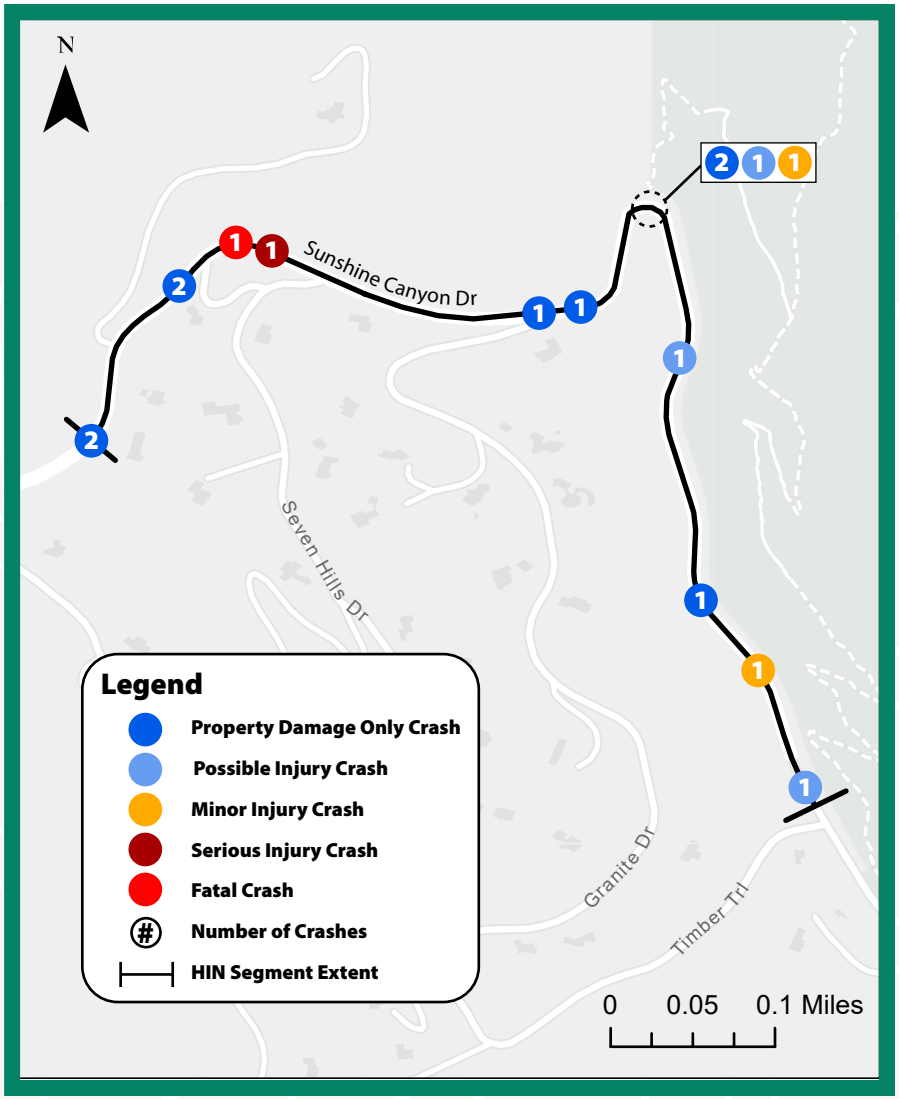
2

FATALITIES

1

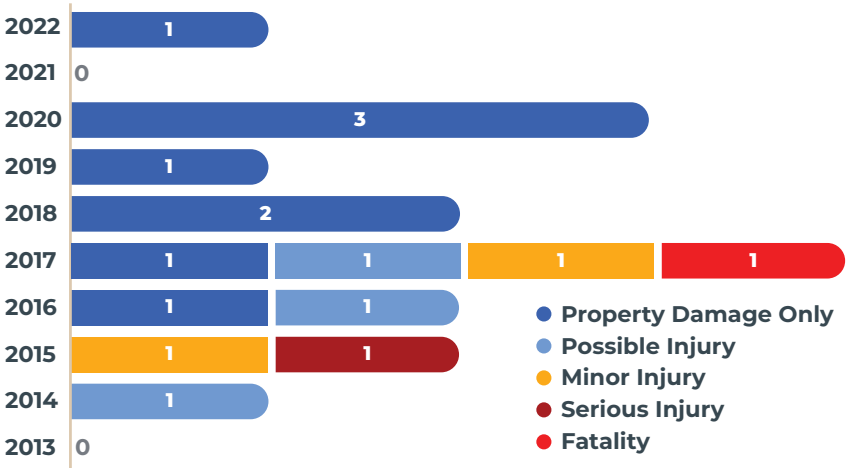
SERIOUS INJURIES

1



FACT SHEET › SUNSHINE CANYON DRIVE

CRASHES BY YEAR

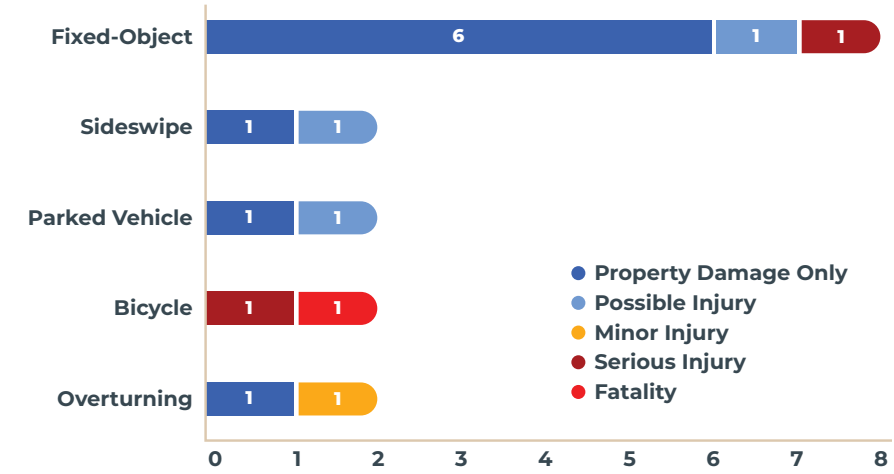


LIGHTING CONDITIONS

Severity	Daylight	Dawn or Dusk	Dark Lighted	Dark Unlighted
Non-KSI	3	2	0	9
KSI	2	0	0	0

KSI - Killed or Serious Injury

CRASHES BY TYPE



OVERREPRESENTED CRASH TRENDS

Trend	% of Total Crashes for Corridor	State Average % at Similar Facility Type
Two-Vehicle Crashes	38%	14%
Off-Road Crashes	75%	54%

FACT SHEET › SUNSHINE CANYON DRIVE

CRASH REDUCTION POTENTIAL

Rural Mountainous 2-Lane Undivided Highway

FREQUENCY OF CRASHES

High Potential for Crash Reduction

SEVERITY OF CRASHES

High Potential for Crash Reduction

Planning-Level Recommendation Cost Estimates	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

RECOMMENDATIONS

ROADWAY

- ✔ Consider widening shoulder and install edge-line and centerline rumble strips on Lions Lair Trailhead curve and the curve west of Seven Hills Drive (off-road crashes, fixed object crashes, bicycle crashes) **$$$$**

PEDESTRIAN/BICYCLE FACILITIES

- ✔ Install "Motorist Must Give Bicycles 3 FT Clearance" (R4-50_CO) sign in both directions at the base and at the top and/or just before the first curves on the downhill and uphill west of Seven Hills Drive to warn cyclists of upcoming down grade and curve (bicycle crashes) **$**
- ✔ Conduct bicycle and motorist education campaign for areas with steep grades and curves in Sunshine Canyon (bicycle crashes) **$$**

SIGNING AND STRIPING

- ✔ Add Chevron (W1-8) signs westbound on the curve west of Seven Hills Drive (improved signage) **$**

Note: reconstruction of Sunshine Canyon Drive is listed as an upcoming project funded by the Boulder County Transportation Sales Tax.

FACT SHEET › 63RD STREET & JAY ROAD INTERSECTION

INTERSECTION FACTS

Left-Turn Operations:

Southbound	Westbound	Northbound	Eastbound
Protected-Permitted	Protected-Permitted	Protected-Permitted	Protected-Permitted

Functional Classification of Approaches: 63rd Street - Minor Arterial (6,050 ADT)
Jay Road - Minor Arterial (5,350 ADT)

Approach Speed Limits:

Southbound	Westbound	Northbound	Eastbound
40 mph	40 mph	35 mph	40 mph

Bicycle Facilities: Bikeable shoulders approaching intersection in all directions. Multi-use path on west side.

Southbound	Westbound	Northbound	Eastbound
Green pavement markings at intersection	Bike lane at intersection adjacent to right-turn lane	Green pavement markings at intersection	Bike lane at intersection adjacent to right-turn lane

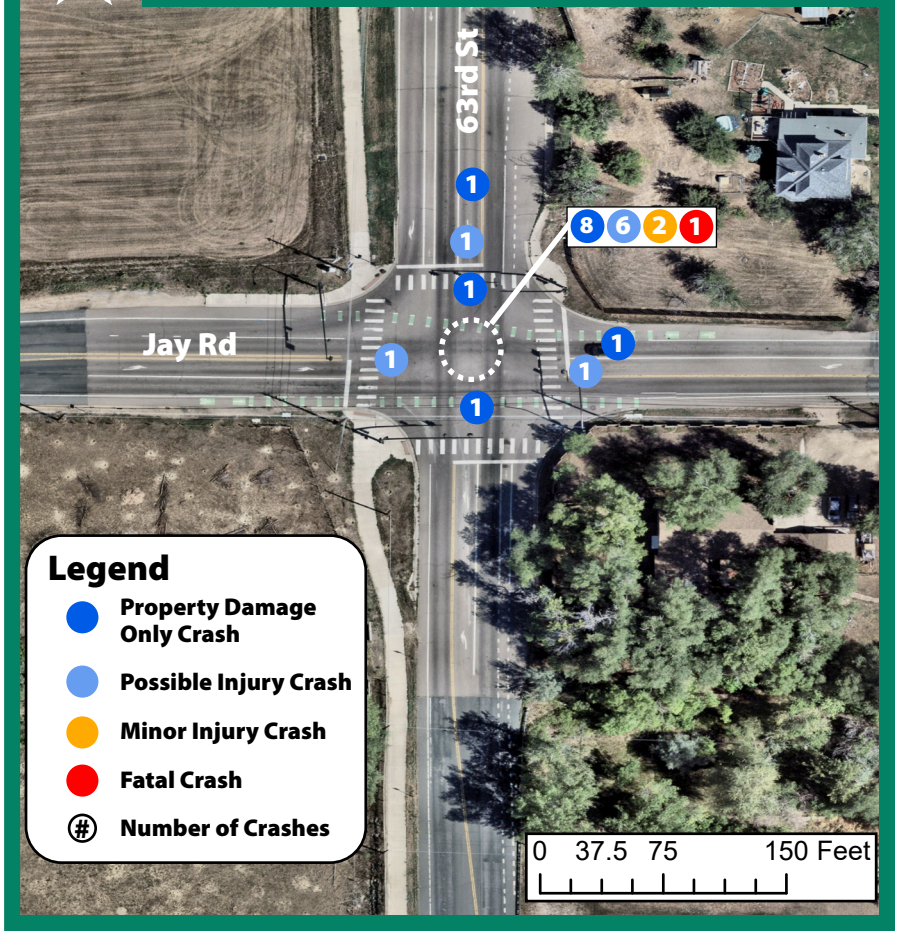
TOTAL CRASHES 24

MINOR INJURIES 2

FATALITIES 1

SERIOUS INJURIES 0

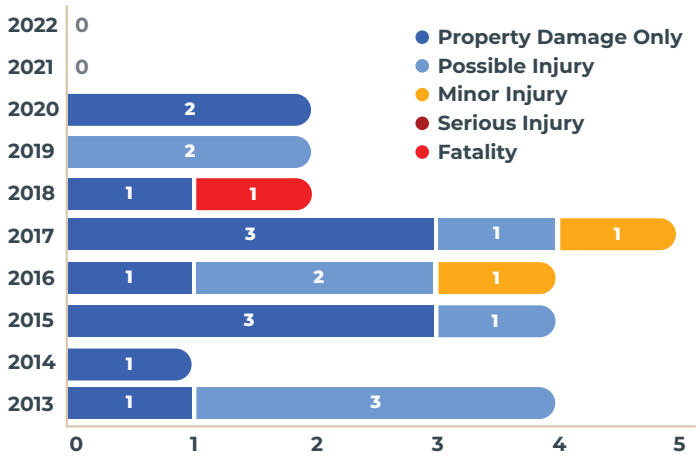
Note: since 2013, camera detection was implemented and enhanced striping (green bike markings) was added to each leg of the intersection. Jay Road was also repaved with new striping and buffered bikeable shoulders in 2024.



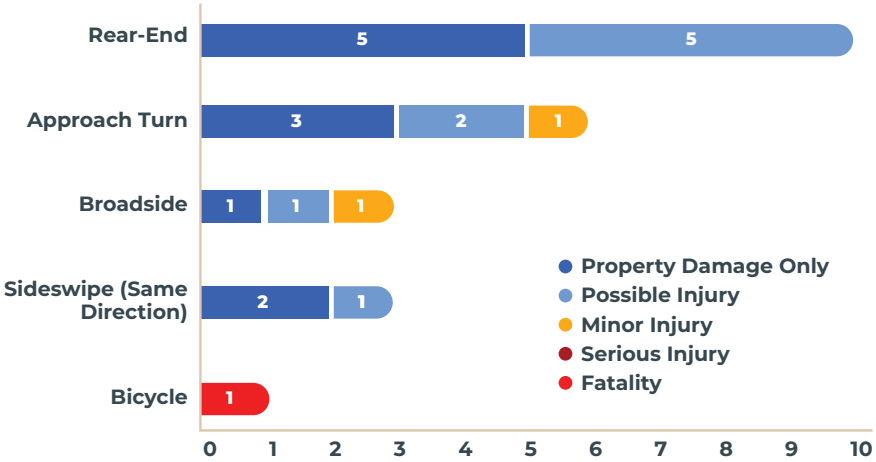
Note: an additional serious injury crash occurred on Valmont Road in 2024, outside of the VZAP data analysis period (2013 - 2022).

FACT SHEET › 63RD STREET & JAY ROAD INTERSECTION

CRASHES BY YEAR



CRASHES BY TYPE



DIRECTION OF AT-FAULT PARTY

	Rear-End	Left-Turn	Broadside
Northbound	3	2	1
Southbound	2	4	1
Eastbound	2	0	0
Westbound	3	0	1

LIGHTING CONDITIONS

Severity	Daylight	Dawn or Dusk	Dark Lighted	Dark Unlighted
Non-KSI	22	0	0	1
KSI	1	0	0	0

KSI - Killed or Serious Injury

OVERREPRESENTED CRASH TRENDS

Trend	% of Total Crashes for Corridor	State Average % at Similar Facility Type
Injury Crashes	46%	29%
Preoccupied Driving	30%	16%

FACT SHEET › 63RD STREET & JAY ROAD INTERSECTION

CRASH REDUCTION POTENTIAL

Urban 2-Lane Divided Signalized 4-Leg Intersection

FREQUENCY OF CRASHES

Medium to High Potential for Crash Reduction

SEVERITY OF CRASHES

High Potential for Crash Reduction

Planning-Level Recommendation Cost Estimates	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

RECOMMENDATIONS

SIGNAL OPERATIONS

- ✔ Install 4-section FYA signal heads to be consistent with nearby intersection traffic signal design (consistent infrastructure) **$**
- ✔ Install reflective back plates (rear-end and broadside crashes) **$**
- ✔ Review yellow and red clearance times (rear-end and broadside crashes) **$**
- ✔ Review traffic operations for protected only left-turn movements by time of day for northbound and southbound lefts (left-turn crashes) **$**

ROADWAY

- ✔ Install luminaire with modern LED light with shielding on northeast and southwest corner of intersection (lighting) **$**
- ✔ Evaluate curb radii on all four intersection corners (traffic calming, crossing distances) **$$$**
  - Reduce northwest curb radius, tie into removing second westbound receiving lane
  - Reduce southeast curb radius to improve pedestrian landing size and pull pedestrian push button away from private fence
  - Reduce northeast curb radius to slow westbound right-turn speeds

63RD STREET & JAY ROAD INTERSECTION

RECOMMENDATIONS (CONT.)

PEDESTRIAN/BICYCLE FACILITIES

- ✔ Reconstruct pedestrian ramps to be directional and evaluate pedestrian push button locations (pedestrian facilities) **$$$**
- ✔ Install green pavement markings in northbound and southbound directions (bicycle facilities) **$**
- ✔ Align westbound green pavement markings on east leg and west leg (bicycle facilities) **$**
  - This recommendation is contingent on the reduction of the west leg to one receiving lane

SIGNING AND STRIPING

- ✔ Consider installing active flashers tied to signal operations on intersection warning signs on all approaches (injury crashes) **$$**
- ✔ Install left-turn lane assignment striping closer to stop bar for westbound direction to match all other directions (improved striping) **$**

Note: construction of a nearby multiuse path along Jay Road and Spine Road to complete a missing link in the Longmont-to-Boulder (LoBo) Regional Trail is anticipated in 2026.

FACT SHEET > LEE HILL DRIVE & WAGONWHEEL GAP ROAD INTERSECTION

INTERSECTION FACTS

Number of Approach Lanes:

Southbound	Northbound	Eastbound
1x Shared Left/Through Lane	1x Shared Through/Right Lane	1x Shared Left-Right Lane

Stop Control Operations:

Southbound	Northbound	Eastbound
Uncontrolled	Uncontrolled	Stop-Controlled

Functional Classification of Approaches:
Wagonwheel Gap Road - Collector (600 ADT)
Lee Hill Road - Collector (3,400 ADT)

Approach Speed Limits:

Southbound	Northbound	Eastbound
35 mph	35 mph	25 mph

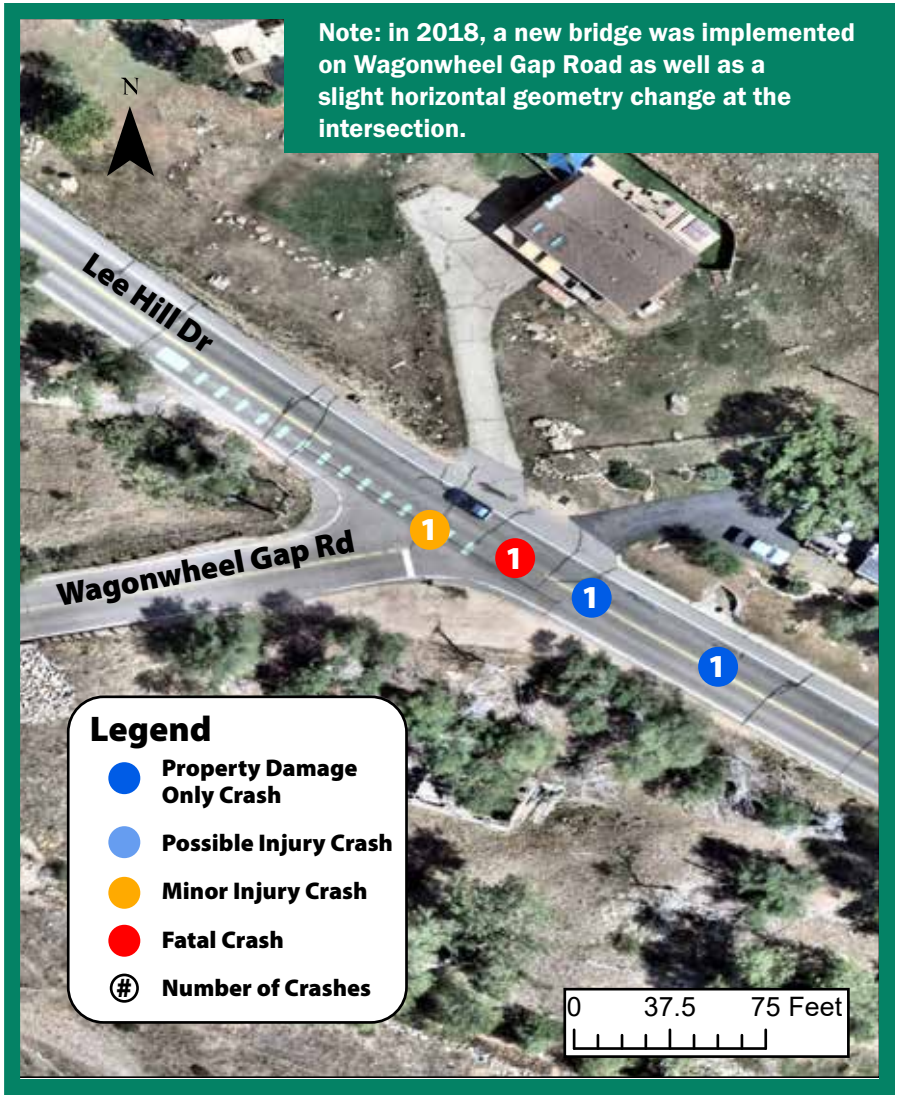
Bicycle Facilities: Bikeable shoulders approaching intersection on Lee Hill Drive. Southbound: Green pavement marking through intersection shared with vehicle lane.

TOTAL CRASHES 4

MINOR INJURIES 1

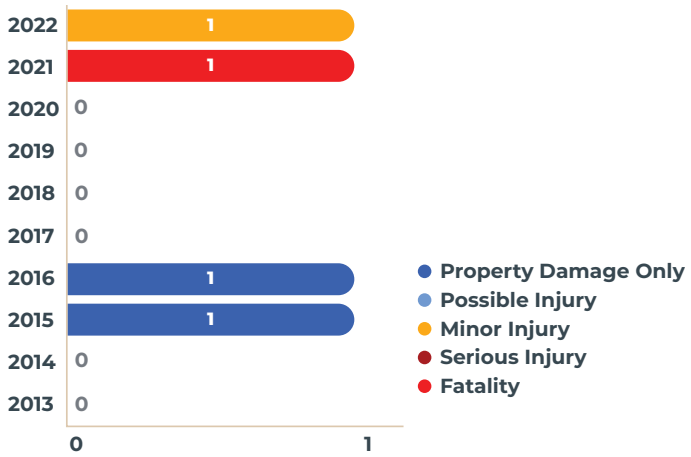
FATALITIES 1

SERIOUS INJURIES 0

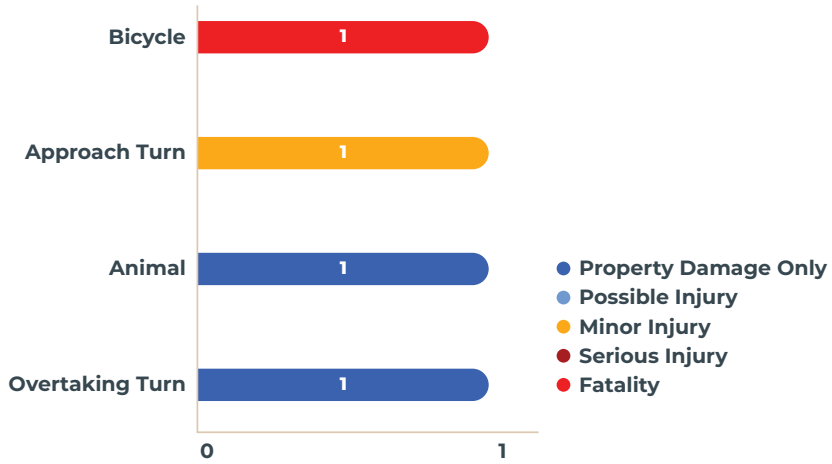


FACT SHEET > LEE HILL DRIVE & WAGONWHEEL GAP ROAD INTERSECTION

CRASHES BY YEAR



CRASHES BY TYPE



DIRECTION OF AT-FAULT PARTY

	Bicycle	Left-Turn	Animal	Overtaking Turn
Northbound	1	1	1	1
Southbound	0	0	0	0
Eastbound	0	0	0	0
Westbound	0	0	0	0

LIGHTING CONDITIONS

Severity	Daylight	Dawn or Dusk	Dark Lighted	Dark Unlighted
Non-KSI	2	1	0	0
KSI	1	0	0	0

KSI - Killed or Serious Injury

OVERREPRESENTED CRASH TRENDS

Trend	% of Total Crashes for Corridor	State Average % at Similar Facility Type
Not Enough Crashes to Determine Trends		

FACT SHEET > LEE HILL DRIVE & WAGONWHEEL GAP ROAD INTERSECTION

CRASH REDUCTION POTENTIAL

Rural 2-Lane Undivided Unsignalized 3-Leg Intersection

FREQUENCY OF CRASHES

Medium to High Potential for Crash Reduction

SEVERITY OF CRASHES

Medium to High Potential for Crash Reduction

Planning-Level Recommendation Cost Estimates	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

RECOMMENDATIONS

ROADWAY

- ✔ Install southbound Lee Hill Drive right-turn lane if feasible (downgrade conflicts) **$$$$**
- ✔ Replace luminaire with modern LED light with shielding (lighting) **$**

OPERATIONS

- ✔ Consider all-way-stop analysis to address issues of grade, line of site, and bicycle volumes (northbound Lee Hill Dr crashes) **$$**

SIGNING AND STRIPING

- ✔ Gate-post Intersection Warning (W2-2, W16-8, W13-1p) signs on both sides of the southbound Lee Hill Dr and northbound Lee Hill Dr approaches (improved signage) **$**
  - Install flashing beacons on warning signs in southbound Lee Hill Drive direction if all-way stop is installed **$**
- ✔ Install Bicycle Hill (W7-5) sign in the southbound Lee Hill Drive direction south of Olde Stage Road to warn cyclists of upcoming downgrade and chevrons to warn cyclists of curve (improved signage) **$**

FACT SHEET › 75TH STREET & HYGIENE ROAD INTERSECTION

INTERSECTION FACTS

Number of Approach Lanes:

Southbound	Northbound	Westbound
1x Shared Left/Through/ Right Lane	1x Shared Through/Right Lane	1x Shared Left/Through Lane, 1x Channelized Right-turn Lane

Stop Control Operations:

Southbound	Northbound	Westbound
Stop-Controlled	Stop-Controlled	Stop-Controlled

Functional Classification of Approaches:
75th Street - Minor Arterial (4,750 ADT)
Hygiene Road - Collector (3,000 ADT)

Approach Speed Limits:

Southbound	Northbound	Westbound
30 mph	30 mph	30 mph

Bicycle Facilities: Bikeable shoulders approaching intersection in all directions.. Northbound: Bike lane at intersection.

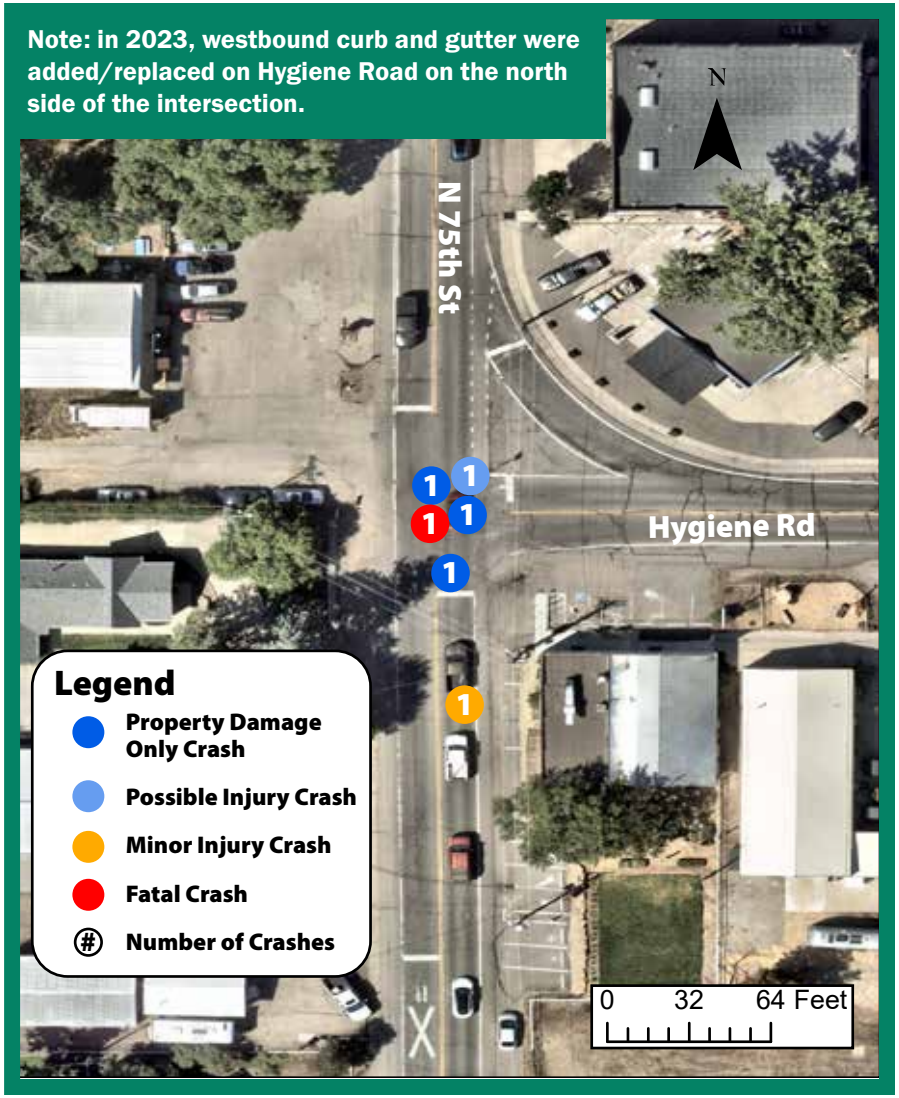
TOTAL CRASHES 6

MINOR INJURIES 1

FATALITIES 1

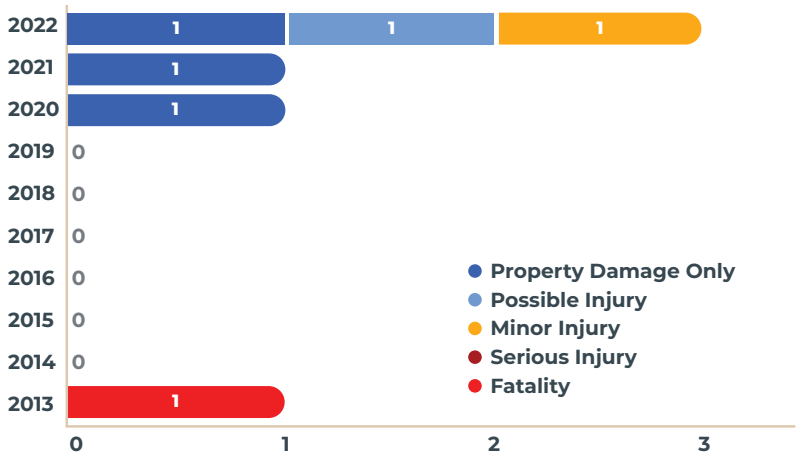
SERIOUS INJURIES 0

Note: in 2023, westbound curb and gutter were added/replaced on Hygiene Road on the north side of the intersection.

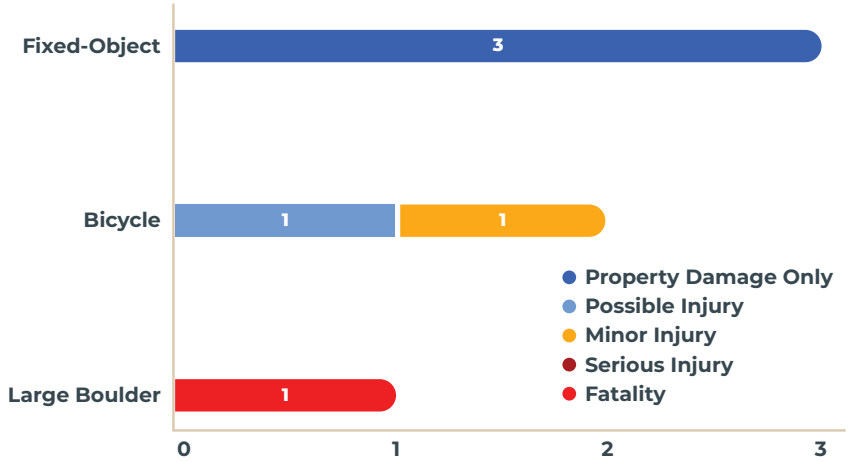


FACT SHEET › 75TH STREET & HYGIENE ROAD INTERSECTION

CRASHES BY YEAR



CRASHES BY TYPE



DIRECTION OF AT-FAULT PARTY

	Fixed Object*	Bicycle	Large Boulder
Northbound	1	1	0
Southbound	0	0	0
Westbound	1	1	1

** One crash direction was listed as unknown.*

LIGHTING CONDITIONS

Severity	Daylight	Dawn or Dusk	Dark Lighted	Dark Unlighted
Non-KSI	2	2	0	1
KSI	0	0	1	0

KSI - Killed or Serious Injury

OVERREPRESENTED CRASH TRENDS

Trend	% of Total Crashes for Corridor	State Average % at Similar Facility Type
Not Enough Crashes to Determine Trends		

FACT SHEET › 75TH STREET & HYGIENE ROAD INTERSECTION

CRASH REDUCTION POTENTIAL

Rural 2-Lane Undivided Signalized Intersection

FREQUENCY OF CRASHES

Medium to High Potential for Crash Reduction

SEVERITY OF CRASHES

Medium to High Potential for Crash Reduction

Planning-Level Recommendation Cost Estimates	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

RECOMMENDATIONS

ROADWAY

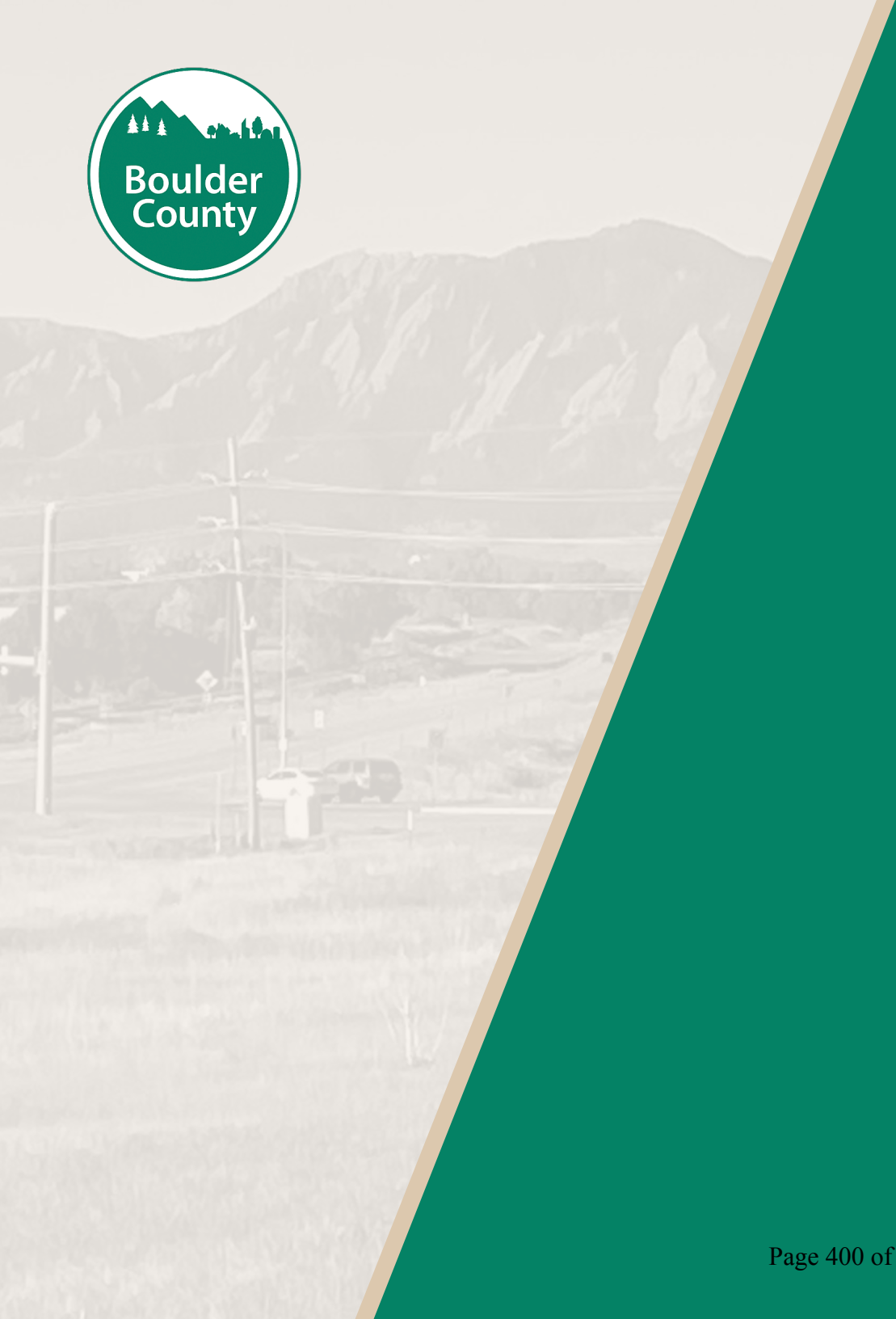
- ✔ Consider eliminating the westbound channelized right-turn lane (remove conflicts) **$$$$**
- ✔ Install raised island for the westbound approach if westbound channelized right-turn remains (traffic calming) **$$**
- ✔ Install modern LED luminaires with shielding (lighting) **$$**

PEDESTRIAN/BICYCLE FACILITIES

- ✔ Install "Motorist Must Give Bicycles 3 FT Clearance" (R4-50_CO) signs approaching intersection (bicycle crashes, improved signage) **$**
- ✔ Widen shoulders to increase bikeable shoulder widths (bicycle crashes) **$$$**
- ✔ Install northbound green pavement markings through intersection for cyclists (bicycle crashes) **$**

SIGNING AND STRIPING

- ✔ Install oversize Stop Signs (R1-1) in all directions (improved signage, fatality) **$**
- ✔ Install larger Object Markers (OM-3) and/or LEDs on stop signs and add 3M reflective tape around stop sign post (improved signage, fatality) **$**



APPENDIX E

SYSTEMWIDE SAFETY ANALYSIS MEMORANDUM

Memorandum

Date: March 28, 2025

To: Boulder County Vision Zero Action Plan Project Team

From: Consor Engineers

Subject: Boulder County Vision Zero Action Plan – Systemwide Safety Analysis

Introduction

As part of the Boulder County Vision Zero Action Plan (VZAP) project, historic crash data was analyzed on unincorporated Boulder County roads, Colorado Department of Transportation (CDOT) roads, and roads in the mountain towns of Jamestown, Nederland, and Ward. The Federal Highway Administration recommends that local agencies take a holistic view of Vision Zero plans to create a safe system that anticipates human mistakes and minimizes impact energy on human bodies so that a crash doesn't result in serious injury or death. The Boulder County VZAP relies on a comprehensive approach to transportation safety that is both reactive and proactive. The reactive component typically focuses on site-specific locations based on identifying a High Injury Network and identifying historical crash trends. The proactive component typically addresses locations based on the presence of risk factors and the potential for future crashes.

This memorandum presents the findings of the systemwide safety analysis conducted on Boulder County's roadway network to support the proactive approach. The analysis attempted to evaluate crash data and roadway characteristics to determine locations and conditions that contribute to high-risk crash patterns. The ultimate goal was to use these insights to develop a High-Risk Network (HRN) that would complement the High-Injury Network (HIN) by highlighting road segments with the greatest potential for future serious injury and fatal crashes. However, after a thorough review of the available data, the project team concluded that current datasets lack the completeness and consistency required to reliably determine enough risk factors. As such, while the methodology holds promise, further data collection and refinement would be needed before a formal HRN can be established in Boulder County. Given current data limitations, the recommended approach shifted from creating a HRN to targeting the most common severe crash types across the county and applying proven countermeasures where crashes have occurred and at other locations with similar conditions. It is believed that this approach can still be effective and is aligned with current available resources.

Methodology

A High-Risk Network (HRN) is a strategy of a systemwide safety analysis, allowing agencies to proactively identify locations where severe crashes are most likely to occur based on risk factors rather than just historical crash data. The High-Risk Network (HRN) differs from a High-Injury Network (HIN) because where the HIN is used to help reactively address locations where the top injury crashes are occurring based on historical crash data, the HRN identifies locations where there is potential for future crashes based on high risk roadway characteristics. **Figure 1** displays a graphic that visually shows how the HIN and HRN work together as complementary tools to create a comprehensive and proactive approach to

traffic safety. Roadway characteristics are identified as high-risk factors on segments and intersections that have the greatest number of serious injury and fatal crashes (likely on the HIN). Based on those identified high-risk factors, other segments and intersections with similar risk factors are identified to be a part of the HRN, regardless of the crash history. This allows agencies to proactively implement countermeasures systemwide, regardless of whether crashes have already occurred, to proactively address traffic safety concerns before crashes do occur.

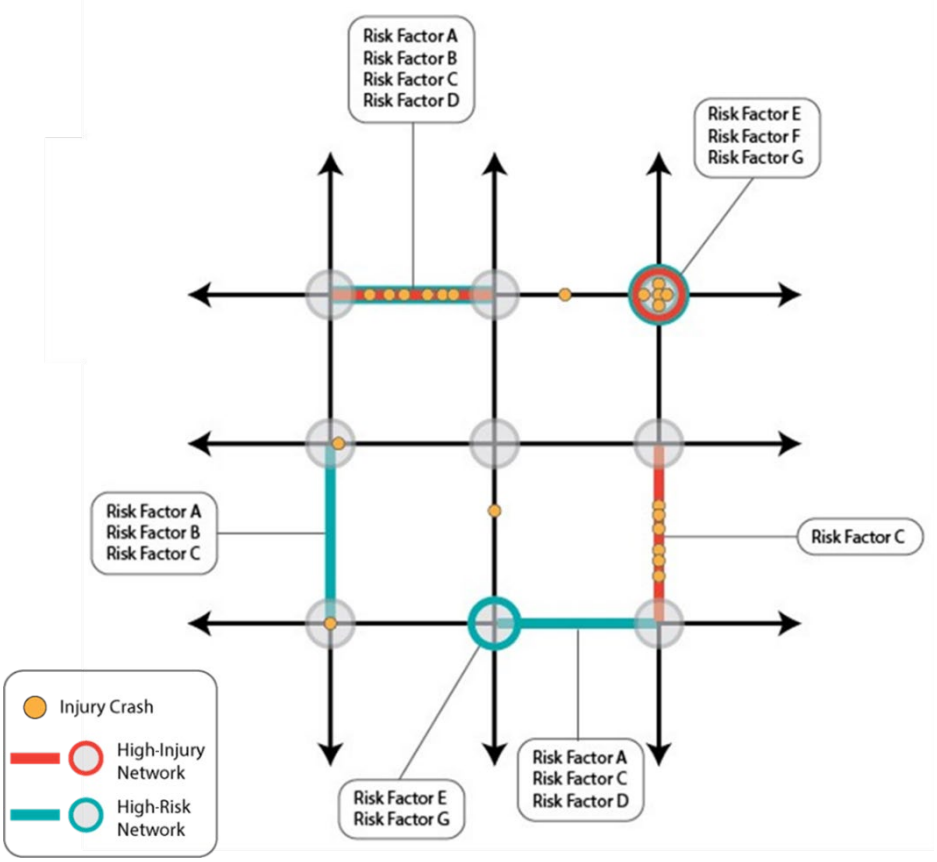


Figure 1. Visualization of HIN and HRN as Comprehensive Tools

Data Collection and Analysis

A combination of historical crash data from 2013 to 2022 and roadway characteristic data was used to identify patterns and potential risk factors. This process was completed for 3 subsets of the transportation network: all roads, CDOT highways only, and Boulder County roads only. CDOT highways and Boulder County roads were analyzed separately because the crash trend analysis showed that these roadway types experienced different top crash trends, likely because of the higher speeds and volumes on CDOT highways, as compared to county roads. The following roadway factors were used to understand trends between historical crash data and serious injury and fatal crashes:

- Functional Class
- Speed Limit
- Presence of Guardrails
- Traffic Control (County Roadways only)

- Level of Plow Route (for winter crashes only)
- Presence/type of bicycle facility (bike crashes only)
- Crossing Type (bike/ped crashes only)
- Land Use
- Within ¼ mi of:
    - School
    - Trailhead
    - Open Space
    - Alcohol-Serving Business
    - Bus Stop
    - Library
    - Hospital

For both CDOT highways and county roads, crash patterns were analyzed to identify if there were any roadway factors with disproportionate numbers of serious injury or fatal crashes compared to the roadway miles (or intersections) with each characteristic/factor. For example, collectors make up 13% of the Boulder County roadway system but were the location of 36% of severe crashes.

The following factors were identified as potential risk factors:

Boulder County Roads:

Data Source	Risk Factor	
	Segment	Intersection
Functional Classification	Collector; Arterial	Collector/Minor Arterial; Local/Minor Arterial; Minor Arterial/Minor Arterial
Speed Limit	30+mph	
Presence/type of Bicycle Facility	No Bicycle Facility	
Land Use*	Rural Residential	
Maximum Score	*County Segment: 4*	*County Intersection: 4*

**Note: Land use ended up not being used as a risk factor because the majority of the county is listed as agricultural and forestry land uses; thus, cannot draw adequate conclusions in trends for the remaining land uses.*

CDOT Highways:

Data Source	Risk Factor	
	Segment	Intersection
Functional Classification	None (all roads are state highways)	Collector/Local/SH, Collector/Minor Arterial/SH, Collector/SH, Local/SH, Minor Arterial/SH
Speed Limit	30+mph	
Presence/type of Bicycle Facility	No Bicycle Facility	
Maximum Score	*CDOT Segment: 2*	*CDOT Intersection: 3*

Risk factors that were identified in the above tables for Boulder County and CDOT Roads were mapped using ArcGIS. For each segment or intersection, scores were tallied based how many of the risk factors that location had. For example, a county road segment had a maximum score possible of four, because four risk factors were identified (Functional Class of either Collector or Arterial, 30+ mph speed limit, no bicycle facility, rural residential land use).

Findings

For County Segments/Intersections and CDOT Intersections the highest scores tallied in the data was three, while for CDOT Segments the highest calculated score was two. As a result, the segments and intersections fall into very broad score categories without clear locations rising to the top as displayed in Figure 2 below, which does not help identify priority locations that should be identified on a HRN. As a result, it was decided to not move forward with publishing an HRN as part of the Boulder County VZAP due to lack of sufficient data. Figure 3 and Figure 4 display the mapped number of risk factors for Boulder County roads and CDOT highways, respectively. Based on the lack of definitive and sufficient data, it was decided to not move forward with developing an HRN as part of the Boulder County VZAP but to use a different approach to address crashes proactively systemwide.

Recommended Approach

Although a HRN was not developed as part of the Boulder County VZAP, a systemwide approach to safety and crash reduction in Boulder County will be achieved by focusing on the top five crash types that result in serious injuries and fatalities and proactively implementing solutions to directly address those crash types and the risks associated with similar conditions where crashes are already occurring. These top five crash types account for 77% of fatal and serious injury crashes in Boulder County:

- Single-Vehicle, including departing from the road, colliding with fixed objects, and overturning vehicles
- Bicycle
- Head-On
- Broadside
- Left-Turn

Potential countermeasures should be deployed in locations that share similar crash trends, even if they have not yet experienced a high number of crashes yet. Solutions should be deployed first at locations with known crash history (higher priority), then at areas with similar characteristics (lower priority). Specific countermeasures for each crash type are described in Appendix F – Countermeasure Toolkit of the final Boulder County Vision Zero Action Plan.

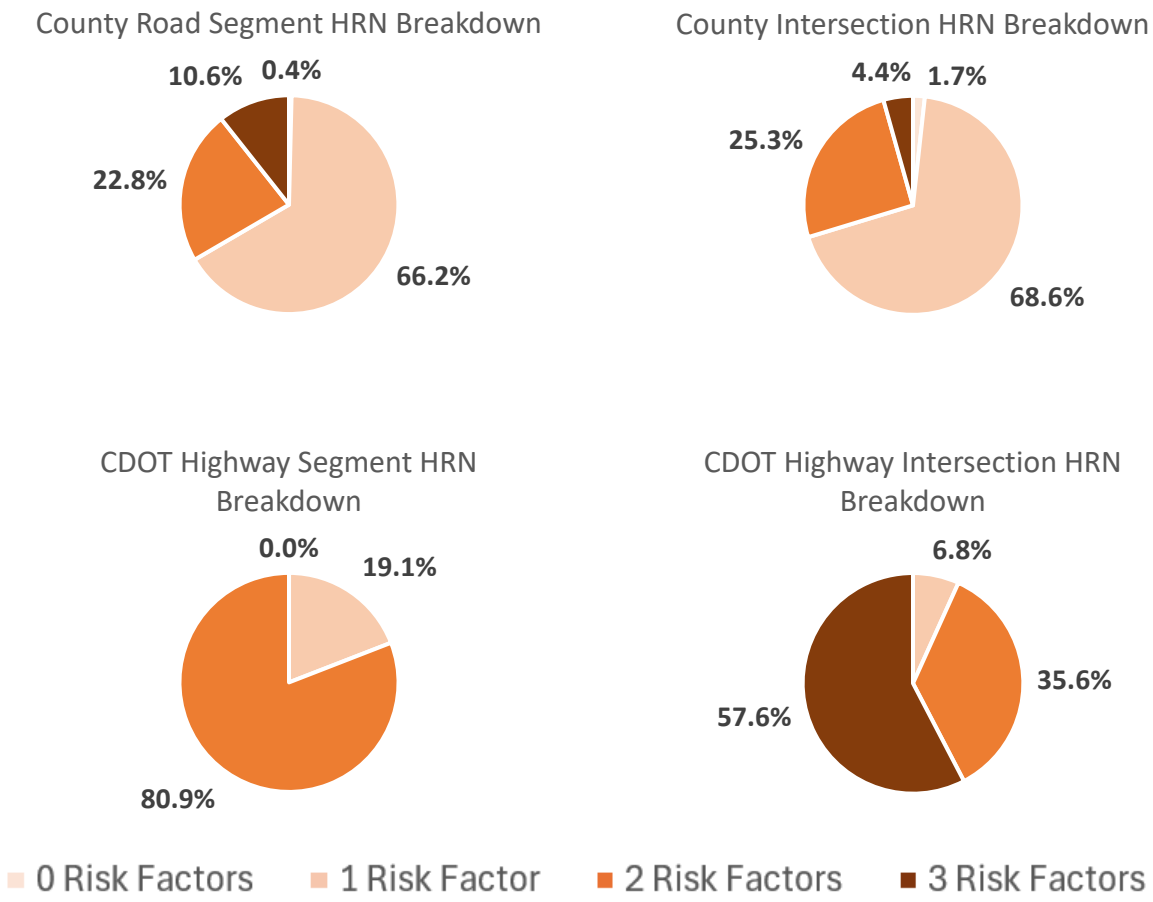


Figure 2. HRN Factor Distribution by Category

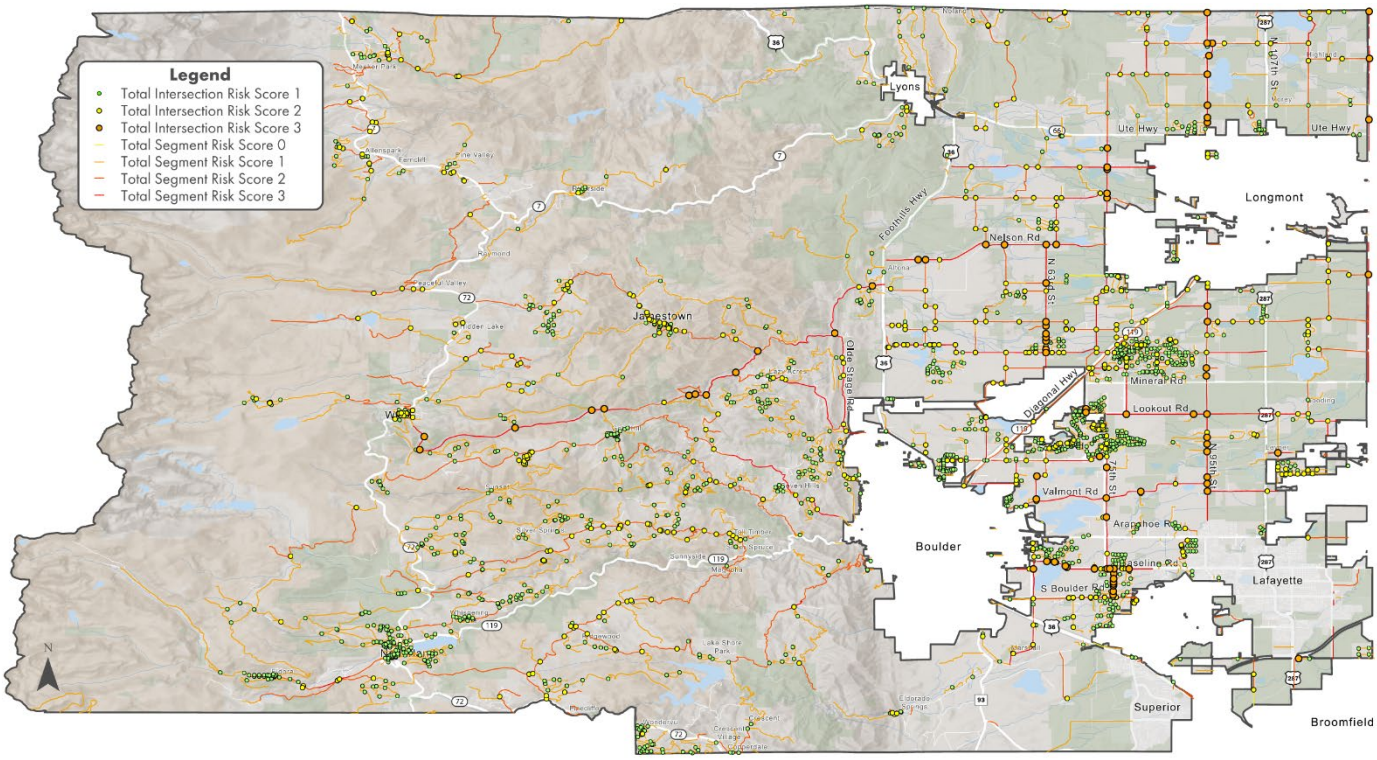


Figure 3. Boulder County Risk Factors

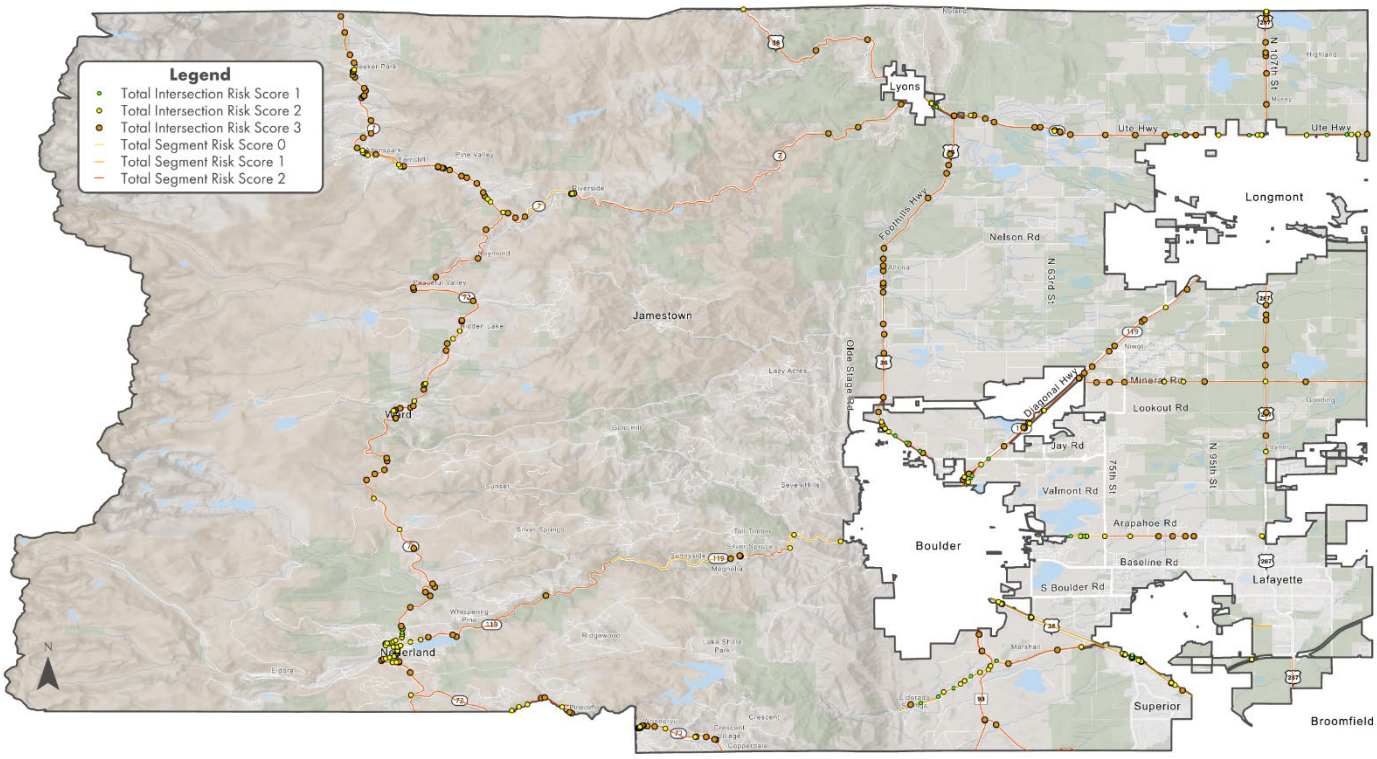


Figure 4. CDOT Highway Risk Factors

APPENDIX F

COUNTERMEASURE TOOLKIT

TOOLKIT OF COUNTERMEASURES: SYSTEMWIDE APPROACH TO CRASH REDUCTION

This countermeasure toolkit supports a systemwide approach to crash reduction in Boulder County. It largely focuses on the five common crash types that result in serious injuries and fatalities and also provides speed-related countermeasures and other countermeasures to comprehensively reduce severe crashes.

These top five crash types account for ***77%*** of fatal and serious injury crashes in Boulder County:

- **Single-Vehicle Crashes,** including departing from the road, colliding with fixed objects, collisions with animals, and overturning vehicles
- **Bicycle Crashes**
- **Head-On Crashes**
- **Broadside Crashes**
- **Left-Turn Crashes**

Each crash type and commonly contributing behaviors and characteristics are described in more detail on the subsequent pages. Potential solutions are also identified and should be deployed first at locations with known crash history (higher priority), then at areas with similar characteristics (lower priority).

Planning Level Cost for Identified Solutions:

Costs are estimated in 2025 dollars, with the levels as follows:	
$	Under $50,000
$$	$50,001 - $100,000
$$$	$100,001 – $500,000
$$$$	$500,001 - $1,000,000
$$$$$	Over $1,000,000

SINGLE-VEHICLE CRASHES

Single-vehicle crashes result in ***36%*** of the serious injury and fatal crashes in Boulder County. Examples of single-vehicle crashes include departing from the road, colliding with fixed objects, and overturning vehicles. Some common behaviors and related conditions that most frequently contribute to these types of crashes include:

1. **Departing from the road and colliding with fixed objects.**
    a. Inadequate warning signs, lack of clear lane markings, and lack of roadway shoulders particularly in areas of sharp curves or elevation changes.
    b. Impaired, distracted, and aggressive driving contribute to off-road crashes as they prohibit the driver's ability to focus, react approriately, and maintain control of the vehicle. It may include behaviors such as driving under the influence, speeding, tailgating, and aggressive maneuvers.
2. **Overturning vehicles.**
    a. Impaired, distracted, and aggressive driving contribute to off-road crashes as they prohibit the driver's ability to focus, react approriately, and maintain control of the vehicle. It may include behaviors such as driving under the influence, speeding, tailgating, and aggressive maneuvers.

Potential Solutions

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Install rumble strips on the shoulder or centerline. Milled or raised elements on the pavement intended to alert drivers through noise and vibration that their vehicle has left the travel lane and they are crossing the centerline. If implemented, to minimize noise impacts, rumble strips should not be installed within 300 feet of residences or businesses.	$$	Locations with cross over crashes or off-right crashes; locations with sharp curves.
Install roadside barriers. Safety features along the edge of roads to prevent vehicles from leaving the roadway and to restrict drivers from striking off-road fixed objects, steep embankments, or hazardous terrain. These barriers, which can include guardrails, concrete barriers, or cable barriers, absorb impact and reduce the severity of crashes.	$$$-$$$$	Locations with high traffic volumes, sharp curves, or areas with significant roadside hazards.

SINGLE-VEHICLE CRASHES

Potential Solutions (cont.)

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Install high friction pavement. Produces vibration and sound to prevent roadway departure and alert drivers to slow down.	**$$**	Locations such as sharp curves, intersections, areas with significant slowing/stopping, or steep grades.
Enhance lighting. Improves nighttime visibility at intersections, crosswalks, and along roadways. Installing brighter and more strategically placed lighting helps drivers detect hazards, pedestrians/bicyclists, and roadway features more easily.	**$$-$$$**	Unsignalized or signalized, unlit intersections with patterns of nighttime crashes; unlight roadway segments with patterns of nighttime crashes.
Enhance delineation along horizontal curves. Warn drivers of a change in roadway direction that can be implemented in advance of or within curves, such as chevrons or retroreflective signs.	**$**	Locations with horizontal curves.
SafetyEdge^{SM} technology. Shapes the edge of the pavement at approximately 30 degrees from the pavement cross slope during the paving process. This safety practice eliminates the potential for vertical drop-off at the pavement edge, has minimal effect on project cost, and can improve pavement durability by reducing edge raveling of asphalt.	**$$$**	Locations that are planned for re-paving and have a history of off-right crashes.
Median barrier. Longitudinal barriers that separate opposing traffic on divided highways to reduce cross median crashes. Could include concrete, metal-beam, or cable rail.	**$$$-$$$$$**	Undivided highways with a crossover crash history.
Refer to speeding strategies (below).	**N/A**	N/A

SINGLE-VEHICLE CRASHES

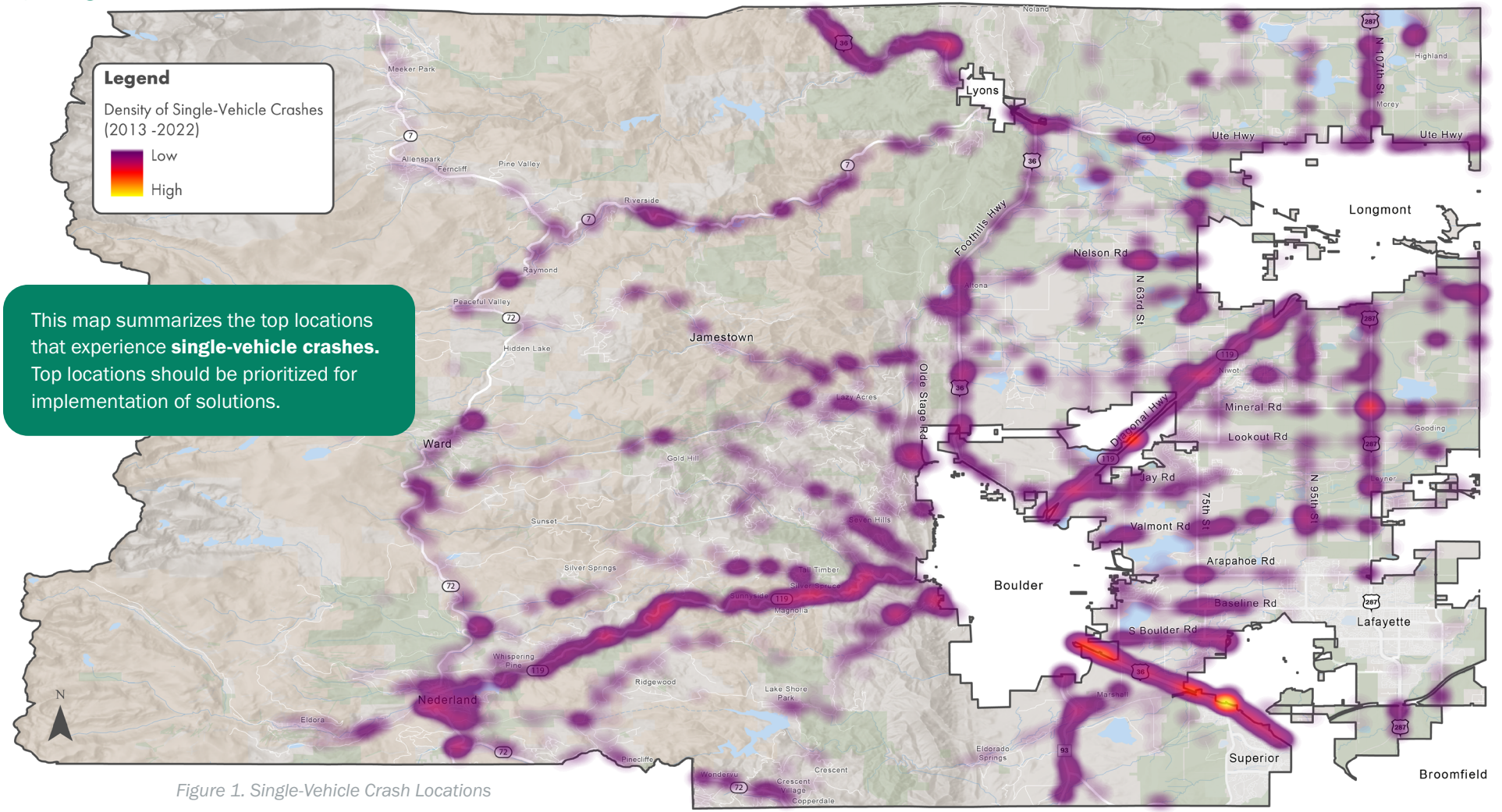


Figure 1. Single-Vehicle Crash Locations

BICYCLE CRASHES

Bicycle crashes result in ***12%*** of the serious injury and fatal crashes in Boulder County. Some common behaviors and related conditions that most frequently contribute to these types of crashes include:

1. **Vehicle failing to yield right-of-way to a bicyclist at an intersection.**
   a. A driver turns right in front of a bicyclist traveling parallel to the vehicle while the bicyclist is crossing the intersection in the street (travel lane or bicycle lane) or in the crosswalk. May involve lack of visibility of bicyclist.
   b. A driver turns left and does not yield to a bicyclist crossing the intersection in the street (travel lane or bicycle lane) or in the crosswalk. May involve lack of visibility of bicyclist.
2. **Vehicle failing to yield to a bicyclist at a non-intersection location.**
   a. Inadequate bicycle facilities where a lack of dedicated bicycle lanes, bike paths, or other bicycle-specific infrastructure forces bicyclists to share lanes with motor vehicles, increasing the risk of vehicles leaving their lane and striking a bicyclist.
   b. Low visibility due to lack of lighting, reflective gear, or improper clothing makes it difficult for drivers to see bicyclists, particularly at night or in low-light conditions.
   c. Impaired, distracted, and aggressive driving contributes to crashes where vehicles depart from their lane or fail to yield the required space for bicyclists and strike a bicyclist traveling along the roadway.
3. **Bicyclist at fault.**
   a. Bicycle fails to obey traffic laws including actions such as running stop signs or red lights, crossing against a traffic signal, failing to signal turns, making sudden lane changes, or riding against the flow of traffic.
   b. Bicyclists riding too fast for conditions and losing control of their bicycle resulting in single-bicycle crash or collision with a vehicle.

Potential Solutions

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Bicycle or buffered bicycle lanes. Provide dedicated, on-road space for bicycling with additional marked space between vehicles and cyclists.	**$$-$$$**	Roads with lower speeds and volumes.
Separated bicycle lanes. On road space for bicyclists that includes a separated bicycle lane delineated with flexible posts or other barriers to physically separate vehicles and bicyclists.	**$$$-$$$$**	Roads with higher speeds and volumes.

BICYCLE CRASHES

Potential Solutions (cont.)

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Improvements at intersections. These may include installing bicycle conflict markings (green paint or chevrons) to dedicate space and raise visual awareness to bicyclists through the intersection or installing bike boxes to allow bicyclists to position themselves ahead of vehicles to improve visibility at traffic signals.	$$	Major or minor signalized or unsignalized intersections; high-conflict driveways.
Protect vehicle turning movements in traffic signal phasing. Separate right or left-turn movements from the bicycle movement in the traffic signal phasing at intersections to eliminate conflicts between vehicles and bicyclists. This is particularly effective when there are a high number of left-turning or right-turning vehicles to eliminate conflicts.	$$	Signalized intersections with a high volume bicycle movements and high number of left-turning or right-turning vehicles.
Leading pedestrian interval. Gives a bicyclist (and pedestrian) crossing in the crosswalk a three to seven second head start when entering an intersection with a corresponding green signal in the same direction.	$	Signalized intersections.

BICYCLE CRASHES

This map summarizes the top locations that experience **bicycle crashes.** Top locations should be prioritized for implementation of solutions.

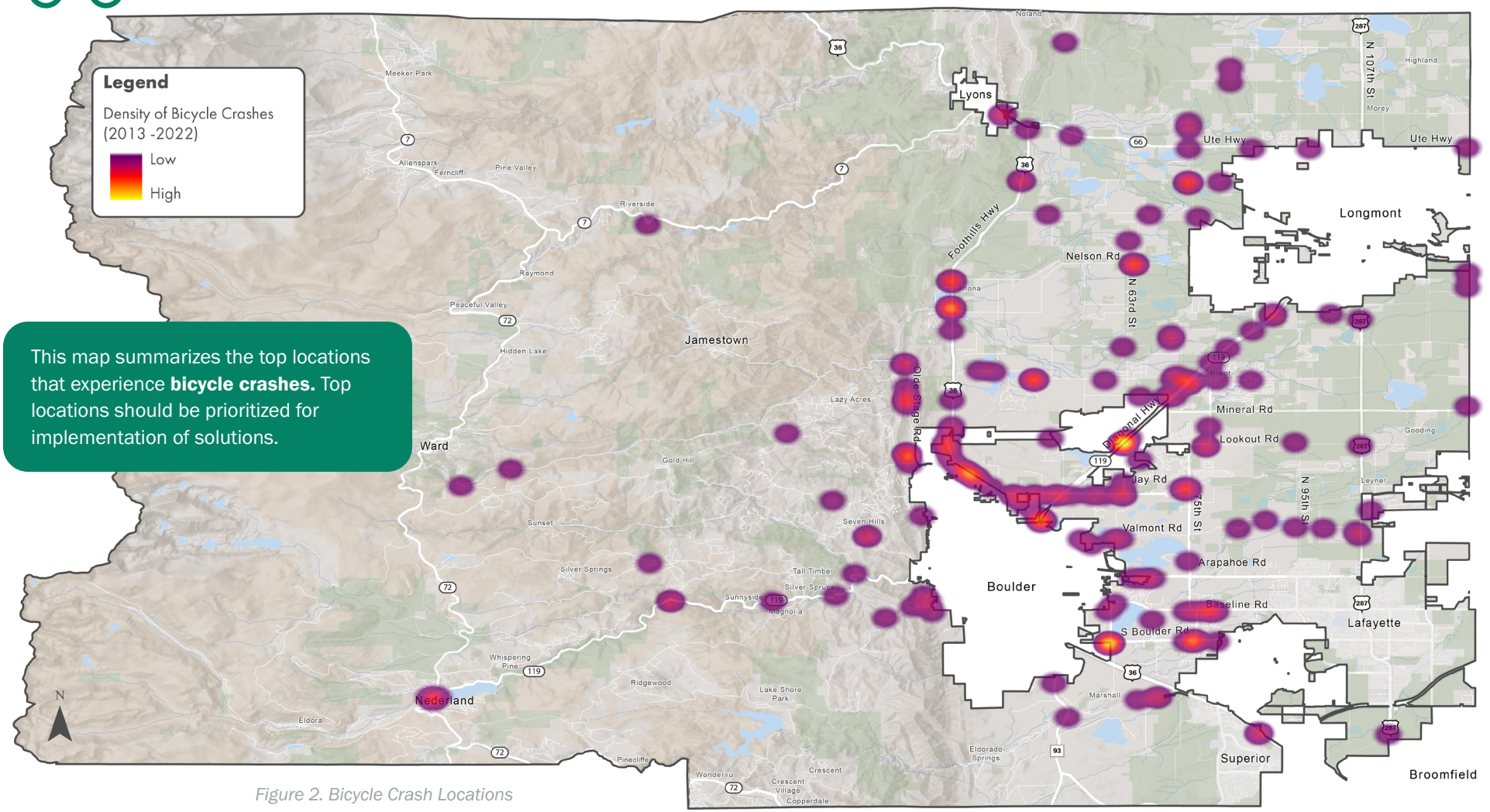


Figure 2. Bicycle Crash Locations

HEAD-ON CRASHES

Head-on crashes result in ***11%*** of the serious injury and fatal crashes in Boulder County. Some common behaviors and related conditions that most frequently contribute to these types of crashes include:

1. **Crossing over the centerline on undivided highways and curved roadways.**
    a. High speeds with lack of a median barrier on undivided highways to restrict vehicles from crossing into opposing traffic.
    b. Often weather conditions, risky passing maneuvers, and distracted, impaired, or aggressive driving can contribute to these crashes on these types of roadways.
    c. Limited sight distance or warning signage which could increase the likelihood of vehicles crossing into opposing traffic.
2. **Departing from the travel lane on rural roadways.**
    a. Narrow vehicle lanes and lack of separation between opposing traffic.
    b. Inadequate warning signs, lack of clear lane markings, and inadequate sight distance for passing.

Potential Solutions

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Install a center median barrier. Longitudinal barriers that separate opposing traffic on a divided highway to reduce cross median crashes. Could include installation of a metal guard rail, concrete, or cable barrier.	**$$-$$$**	Undivided highways with a crossover crash trend.
Enhance delineation along horizontal curves. Warn drivers of a change in roadway direction that can be implemented in advance of or within curves, such as chevrons or retroreflective signs.	**$$-$$$**	Locations with horizontal curves.
Install centerline rumble strips. Milled or raised elements on the pavement centerline intended to alert drivers through noise and vibration that their vehicle has left the travel lane and they are crossing the centerline. If implemented, to minimize noise impacts, rumble strips should not be installed within 300 feet of residences or businesses.	**$$-$$$**	Rural roads with a crossover crash trend
Refer to speeding strategies (below).	**N/A**	N/A

HEAD-ON CRASHES

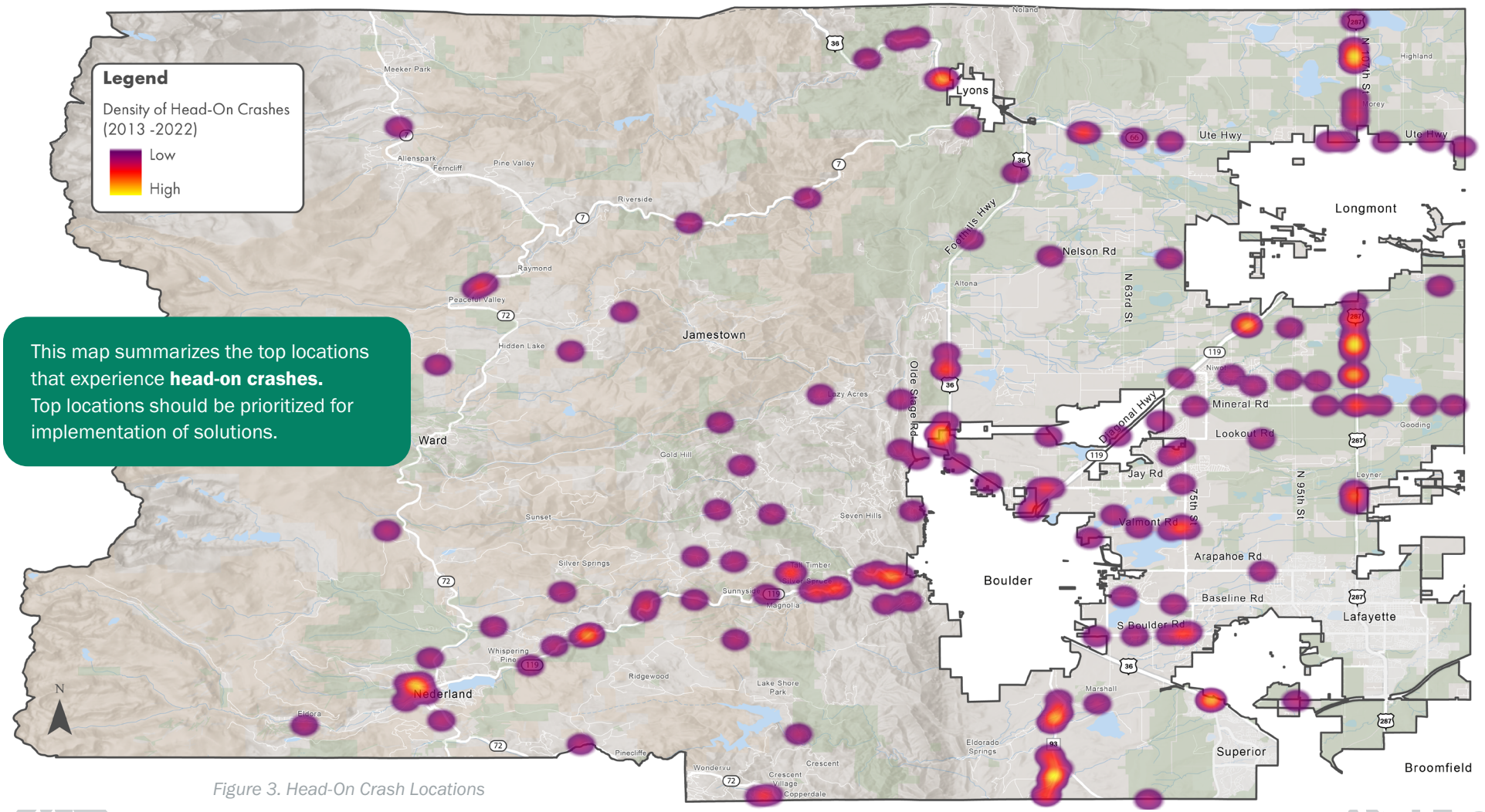


Figure 3. Head-On Crash Locations

BROADSIDE CRASHES

Broadside crashes result in **9%** of the serious injury and fatal crashes in Boulder County. Some common behaviors and related conditions that most frequently contribute to these types of crashes include:

1. **Red-light running.**
   a. Insufficient signal size, too few signal heads per lane, and missing signal backplates can contribute to poor signal visibility, which can contribute to these types of crashes.
   b. Yellow clearance and all-red times are non-optimal which may cause drivers to not be able to stop in time or can contribute to more aggressive driving behaviors.
2. **Failing to yield at unsignalized location.**
   a. Poor visibility of the stop sign or oncoming traffic.
   b. Congestion on the main street causing drivers from the side street to become impatient and make a riskier turning movement.

Potential Solutions

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Improve traffic signal head visibility. Upgrade traffic signal heads with retroreflective backplates, add new signal heads to have one traffic signal head over each travel lane, and/or install near-side signal heads where visibility is limited.	**$-$$$** *Generally a low cost; however, the cost is sometimes higher in cases where mast arms need to be replaced to extend the mast arm length or the additional signal equipment may exceed the structural capacity of the signal poles in mast arms.*	Undivided highways with a crossover crash trend.
Update yellow & red intervals. Evaluate the yellow and red clearance intervals to determine if the interval is adequate for vehicles to react and stop at a traffic signal based on speed and grade approaching the intersection.	**$**	Locations with horizontal curves.

BROADSIDE CRASHES

Potential Solutions (cont.)

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Increase enforcement. Install Red-Light Running Cameras or coordinate with emergency response to increase enforcement locations.	$$	Signalized locations with the greatest history of red-light running crashes.
Improve stop sign visibility. Implement tubular reflectors to sign posts and stop signs.	$	Two-way stop controlled and all-way stop-controlled intersections.
Install roundabout or other traffic control device. Evaluate unsignalized and signalized intersections to see if changes in traffic control are warranted.	$$$$-$$$$$	Unsignalized intersections with a broadside crash history, evaluate for roundabout, traffic signal, or restricting turning movement access. At signalized locations, evaluate for a roundabout.

BROADSIDE CRASHES

This map summarizes the top locations that experience **broadside crashes.** Top locations should be prioritized for implementation of solutions.

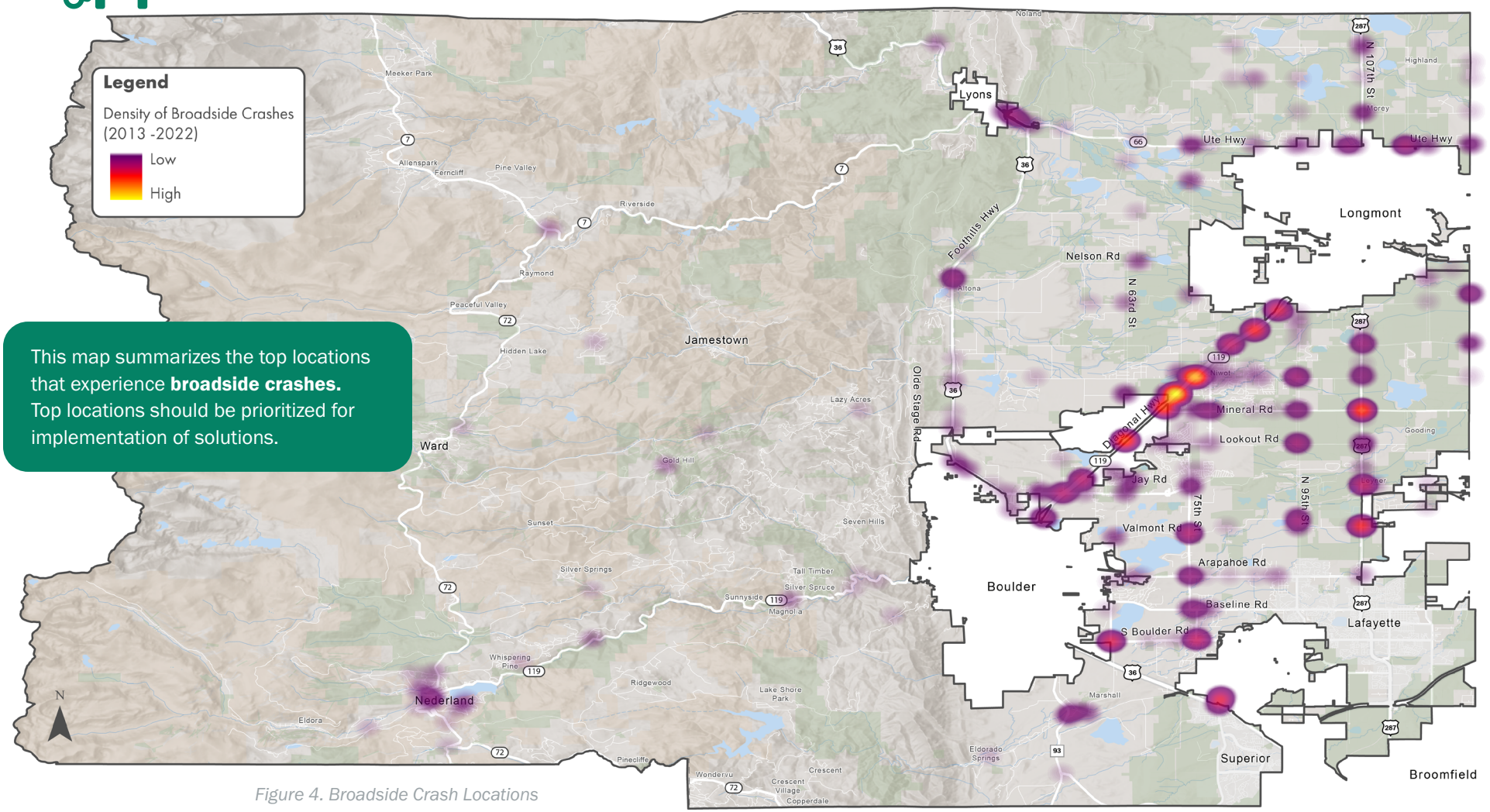


Figure 4. Broadside Crash Locations

LEFT-TURN CRASHES

Left-turn crashes result in **9%** of the serious injury and fatal crashes in Boulder County. Some common behaviors and related conditions that most frequently contribute to these types of crashes include:

1. **Failing to yield at a signalized intersection.**
   a. A driver turns left on a permitted left-turn signal operation and does not yield to an oncoming vehicle.
2. **Failing to yield at an unsignalized intersection.**
   a. A driver turns left and does not yield to an oncoming vehicle.
   b. A driver turns left and does not yield to a perpendicular through vehicle.

Potential Solutions

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Upgrade left-turn operations. Upgrade left-turn signal phasing to permitted-protected or protected-only to eliminate/reduce left-turn conflicts. Protected-only phasing provides a separate phase for left-turning traffic and allowing left-turns to be made only on a green left arrow signal indication. Permitted-protected phasing allows left-turning drivers to turn either during a separate phase or during a regular green light when gaps in opposing traffic allow for a safe turn. Separate left-turn motor vehicle movements prevent turning vehicles from overlapping with the pedestrian walk phase or conflicting with oncoming vehicles.	$	Signalized intersection with left-turn crash trend.
Improve visibility with positive left-turn offset. Shifts left-turn lanes laterally to provide the left-turning motorist a line of sight to opposing through vehicles. Instead of attempting to look around opposing left-turning vehicles, the motorist can clearly see oncoming traffic to make safer gap decisions.	$$-$$$$	Unsignalized locations; Signalized locations with permitted left-turn movements.

LEFT-TURN CRASHES

Potential Solutions (cont.)

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Partial closure to prohibit left-turn movements. Restricts specific left-turn movements at intersections to reduce conflict points, often implemented through physical barriers, signage, or traffic signal modifications.	$$-$$$$	Unsignalized intersection or driveway access with left-turn crash trend; signalized locations that cannot operationally support protected left-turn operations or have geometry restricting left-turns.
Install roundabout or other traffic control device. Evaluate unsignalized and signalized intersections to see if changes in traffic control are warranted.	$$$$-$$$$$	Evaluate for a roundabout, traffic signal, or restricting turning movement access at unsignalized locations. Evaluate for a roundabout at signalized locations.

LEFT-TURN CRASHES

This map summarizes the top locations that experience **left-turn crashes.** Top locations should be prioritized for implementation of solutions.

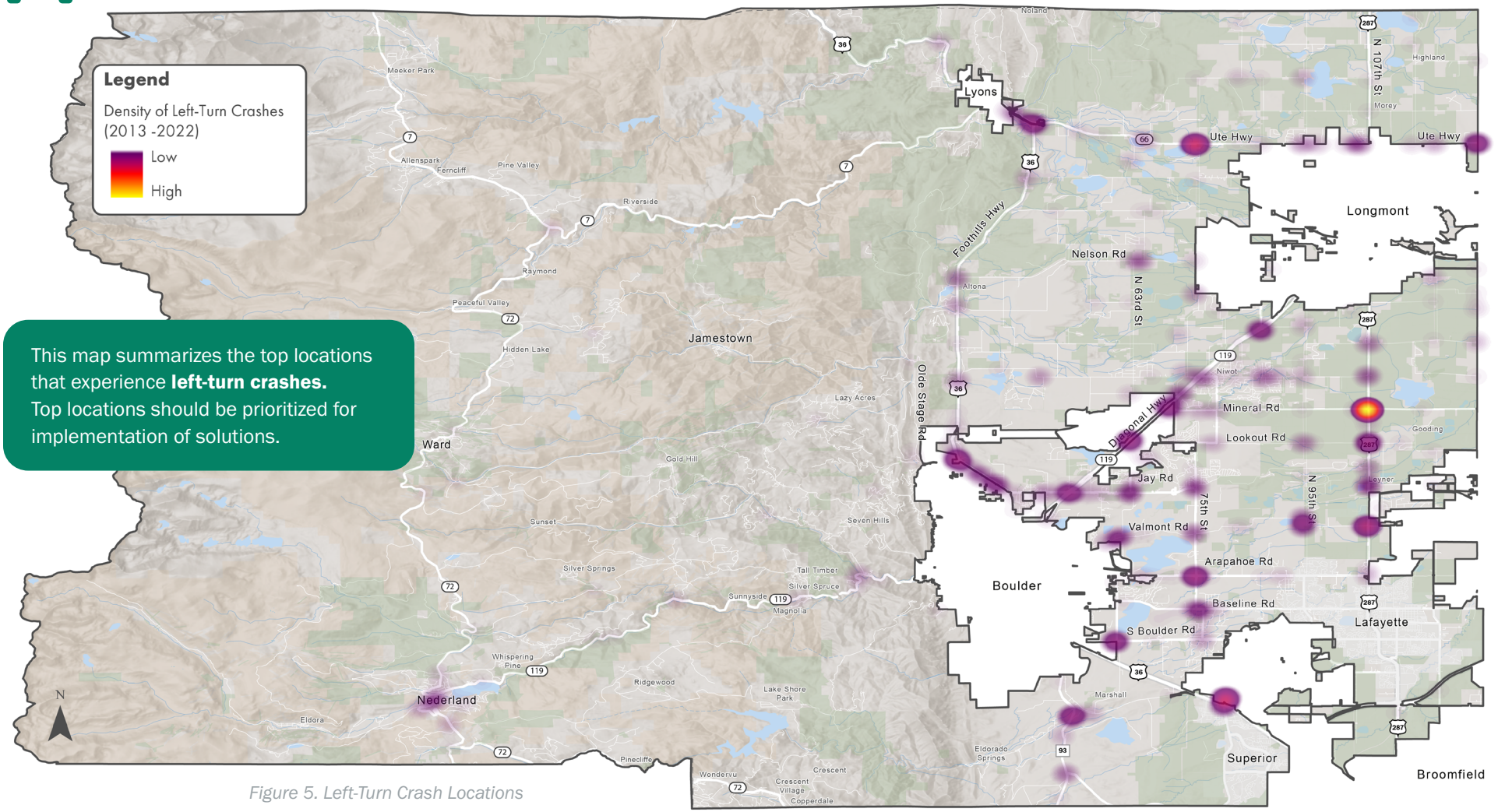


Figure 5. Left-Turn Crash Locations

OTHER COUNTERMEASURES IN THE TOOLBOX

Speed-related Countermeasures

Vehicle speeds have a substantial influence on traffic crashes. For example, at higher speeds a driver is more likely to lose control of their vehicle and/or take longer to stop. In addition, a crash at a higher speed can make the impact more severe, posing a greater risk of injury to all road users. Speeding (i.e., traveling faster than the posted speed limit) is a common contributing factor in the occurrence of traffic crashes.

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Increase enforcement. Install speed cameras or coordinate with emergency response to increase enforcement locations.	$$	Locations include high-speed roads and school zones.
Vary speed limits. Variable speed limits use current roadway conditions like traffic speed, volumes, weather, and road surface conditions to determine appropriate speeds and display them to drivers in real time.	$$	Locations where there are known weather related crashes or high levels of congestion.
Evaluate/adjust the speed limit.	$	Locations where there are inconsistent speed limits along the corridor or known speeding related crash history.
Traffic calming elements. Design and engineering strategies implemented to slow down vehicle speeds and improve safety for all road users- particularly pedestrians and bicyclists. These measures introduce physical changes to the roadway (such as speed humps, chicanes, curb extensions/ bulbouts, raised crosswalks, or road narrowing).	$-$$$	Locations with residential streets or other low-speed, lower-volume roads.
Speed feedback signs. Interactive signs that display vehicles current speed to remind driver to slow down and obey the posted speed limit.	$	Locations include residential areas, school zones, curves, work zones, and rural roads.

Speed-related Countermeasures (cont.)

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Road diets. Reallocating roadway space, typically reducing the number of travel lanes to calm traffic and enhance safety for all users. Creates space for features like bike lanes, wider sidewalks, or center turn lanes. Road diets are particularly effective on streets with moderate traffic volumes, improving safety for pedestrians, cyclists, and motorists while maintaining efficient traffic flow.	**$$$-$$$$$**	Locations where there are more lanes than vehicular capacity needed. Examples include roadways with two-way center turn lanes or roads with 3 or more travel lanes.
Roundabouts. Reduce conflict points, lower vehicle speeds, and virtually eliminate angle crashes common at traditional intersections. Their circular design promotes continuous traffic flow, minimizing delays while improving efficiency for all users.	**$$$$-$$$$$**	Unsignalized or signalized intersections.

Miscellaneous Countermeasures

Education, enforcement, and policy updates work in conjunction with engineering improvements to influence road user behavior and to help establish long-term systemic changes that create safer transportation systems. Together, these countermeasures work to reduce crashes, improve compliance, and foster a culture of safety on the roads.

Systemwide Solution & Strategy for Implementation	Cost Considerations	Where to Consider Implementation
Education. Plays a vital role in traffic safety by raising awareness, promoting safe behaviors, and informing road users about traffic laws and best practices. Through public outreach, school programs, and media campaigns, education helps reduce risky behaviors such as speeding, impaired driving, and distracted driving.	**Varies**	County or regionwide
Enforcement. Partnering with law enforcement ensures compliance with laws designed to reduce crashes and improve roadway safety. Targeted enforcement of speeding, impaired driving, seat belt use, and other violations help deter dangerous behaviors and reinforces safe driving habits.	**Varies**	County or regionwide
Policy updates. May include lowering speed limits, enhancing penalties for dangerous driving behaviors, or updating design standards and guidelines for safer roadway designs.	**Varies**	County or regionwide

APPENDIX G

FUNDING OPPORTUNITIES SUMMARY

The table below encompasses a comprehensive list of potential funding sources detailing an overview of eligible programs to guide future investment in roadway safety in Boulder County. Each potential funding opportunity includes a description, the total funding amount available, the match requirement, status or anticipated funding release date, a link to more information, and a high-level analysis of the types of improvements and projects that may be eligible for the funding. This list of funding opportunities is current as of the Boulder County Vision Zero Plan Adoption in Summer 2025.

Summary of Potential Boulder County VZAP Funding Opportunities

Funding Program	Description	Funding Amount	Match Requirement	Status/Anticipated Funding Release Date	Links	Bicycle Facilities	Pedestrian Crossing Enhancements	Transit Improvements	Striping and Signage	Signal Modification or Improvement	Maintenance and Operations	Other (Education, Enforcement, etc.)
Federal/National Programs												
USDOT Active Transportation Infrastructure Investment Program (ATIIP)	The ATIIP is a new competitive grant program created by the Bipartisan Infrastructure Law to construct projects to provide safe and connected active transportation facilities in active transportation networks or active transportation spines. ATIIP projects will help improve the safety, efficiency, and reliability of active transportation networks and communities; improve connectivity between active transportation modes and public transportation; enhance the resiliency of on- and off-road active transportation infrastructure; help protect the environment; and improve quality of life in disadvantaged communities through the delivery of connected active transportation networks and expanded mobility opportunities.	Active transportation projects or group of projects with a total cost of over $15 million, or total cost of $100,000 for planning and design grants	20%	NOFO presumed to be released in Spring 2025. There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY 26.	https://www.transportation.gov/rural/grant-toolkit/active-transportation-infrastructure-investment-program-atiip	X	X	X	X	X		
USDOT Better Utilizing Investments to Leverage Development (BUILD)	The BUILD grant (formerly RAISE) is a federal program aimed at supporting transportation infrastructure projects that promote sustainability, equity, and resilience. Administered by the U.S. Department of Transportation, RAISE provides funding for projects that improve safety, environmental outcomes, and accessibility, particularly in underserved and rural communities. It focuses on creating long-lasting infrastructure improvements that address the needs of diverse populations while fostering economic growth and environmental stewardship.	Capital grant in urban area: $5 million to $25 million	20%	There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY 26.	https://www.transportation.gov/RAISEgrants	X	X	X	X	X		
USDOT Safe Streets and Roads for All (SS4A)	The Office of the Secretary's Safe Streets and Roads for All Grant program provides supplemental funding to support local initiatives to prevent death and serious injury on roads and streets, commonly referred to as Vision Zero or "Toward Zero Deaths" initiatives.	Implementation grants: $2,500,000 to $25,000,000	20%	Current NOFO is open through June 2025. There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY 26.	https://www.transportation.gov/grants/ss4a/how-to-apply	X	X	X	X	X		X
USDOT Advanced Transportation Technology and Innovation (ATTAIN) Program	The ATTAIN Program is intended to provide funding to eligible entities to deploy, install, and operate advanced transportation technologies to improve safety, mobility, efficiency, system performance, intermodal connectivity, and infrastructure return on investment.	Up to $12,000,000	20%	Next NOFO anticipated to open in Fall 2025. There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY 26.	https://grants.gov/search-results-detail/351055					X		
USDOT Multimodal Project Discretionary Grant Opportunity (MPDG)	Includes: Mega Grant, INFRA Grant & Rural Surface Transportation Grant - applicants may choose to apply to one, two, or all three of these grant programs. The funding opportunities are awarded on a competitive basis for surface transportation infrastructure projects – including highway and bridge, intercity passenger rail, railway-highway grade crossing or separation, wildlife crossing, public transportation, marine highway, and freight projects, or groups of such projects – with significant national or regional impact, or to improve and expand the surface transportation infrastructure in rural areas.	Varies	Varies	Next NOFO anticipated to open in Spring 2025. There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY 26.	https://www.transportation.gov/grants/mpdg-program	X	X	X	X	X		
USDOT Build America Bureau's Rural and Tribal Assistance Pilot Program	The IIJA created the Rural and Tribal Assistance Pilot Program, which provides grants to support legal, technical, and financial advisors to help advance infrastructure projects in rural areas (e.g., projects in Census Bureau designated urban areas with population of more than 150,000 people are NOT eligible). Eligible project sponsors may receive grant funds to select advisors to assist with pre-development-phase activities, such as: feasibility studies, project planning and preliminary engineering and design work.	Up to $27 million	None	Re-release anticipated Spring 2025	https://www.transportation.gov/buildamerica/RuralandTribalGrants	X	X	X	X	X		X

Summary of Potential Boulder County VZAP Funding Opportunities

Funding Program	Description	Funding Amount	Match Requirement	Status/Anticipated Funding Release Date	Links	Bicycle Facilities	Pedestrian Crossing Enhancements	Transit Improvements	Striping and Signage	Signal Modification or Improvement	Maintenance and Operations	Other (Education, Enforcement, etc.)
State-Administered Programs												
CDOT Transportation Alternatives Set-Aside Program (TA)	Federal funds are allocated under the TAP program to transportation improvement projects that expand travel choice, strengthen the local economy, improve quality of life, and protect the environment. Many TAP projects enhance non-motorized forms of transportation like biking and walking. TAP provides funding for programs and projects defined as transportation alternatives, including on- and off-road pedestrian and bicycle facilities, infrastructure projects for improving non-driver access to public transportation and enhanced mobility, community improvement activities, and environmental mitigation; recreational trail program projects; and projects for planning, designing, or constructing boulevards and other roadways largely in the right-of-way of former Interstate System routes or other divided highways.	Varies	20%	Anticipated next NOFO release in Spring 2026. There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY26.	https://www.codot.gov/programs/planning/grants/tap-fiscal-years-2024-26	X	X	X				X
CDOT Revitalizing Main Streets	CDOT seeks to award grants for projects that support downtown vitality and the built environment, community access to public streets and bringing innovative uses of public spaces to life with multimodal transportation projects. The funds may be used for active transportation infrastructure improvement and amenity projects that meet the aim of the program. In addition, projects must be 'shovel ready', therefore can be completed within a 12 month period from grant contract execution, if approved.	$10,000-$250,000	10%	For 2025, 6 deadlines (2/26, 4/30, 6/25, 8/27, 10/29 & 12/31)	https://www.codot.gov/programs/revitalizingmainstreets	X	X	X	X			
CDOT Safe Routes To School (SRTS)	The FHWA Safe Routes to School (SRTS) program promotes safe and accessible walking and biking routes for children traveling to and from school. It provides funding and resources for infrastructure improvements, education, and encouragement programs to enhance student safety and increase active transportation. The program aims to reduce traffic congestion, improve public health, and foster community engagement around school travel.	Infrastructure grants: $100,000 to $1,000,000 Non-Infrastructure grants: $5,000 to $1,000,000	20%	Bi-annual cycle, with next anticipated opening in FY 2027	https://www.codot.gov/programs/bikeped/saferoutes	X	X		X	X		X
CDOT Highway Safety Improvement Program (HSIP)	The Highway Safety Improvement Program (HSIP) is a federal initiative aimed at reducing traffic fatalities and serious injuries on public roads. It provides funding to states for safety improvement projects that are data-driven and focus on reducing crashes. The program emphasizes identifying high-risk locations and implementing cost-effective measures to enhance roadway safety for all users. Twenty-five percent of HSIP for Region 1 is set aside specifically for systemic projects that improve safety for Vulnerable Roadway Users (VRU) or improve safety along High Risk Rural Roads (HRRR). Local agency HSIP funding applications not exceeding a requested amount of $500,000 are eligible to be considered for this set aside.	Minimum request $250,000, multiple project locations can be combined to meet the $250,000 threshold)	10%	FY28 HSIP applications were due February 2025. There is uncertainly regarding upcoming deadlines, given IIJA funding is currently committed through FY26.	https://www.codot.gov/safety/traffic-safety/data-analysis/hsip	X	X	X	X	X		
CDOT Nonattainment Area Air Pollution Mitigation Enterprise (NAAPME) Community Clean Transportation Assistance Grant Funding Program (CCTAP)	The Community Clean Transportation Assistance Grant Funding Program (CCTAP) will look to support communities and other governmental entities in the nonattainment area with eligible projects that will provide demonstrated improvements to air quality in the nonattainment area. Projects funded through this program should aim to meet the business purpose of NAAPME and look to address at least one of the funding focus areas identified in the NAAPME 10-Year Plan. Additional consideration will be given to projects that support disproportionately impacted communities, as defined in Colorado Revised Statutes.	Minimum $500,000; amount available varies (maximum award per project based on total amount available each funding round)	20%	FY25 due in Spring; anticipated to be every other year in out years; future funding rounds for CCTAP are at the discretion of the Board of Directors.	https://www.codot.gov/programs/naapme/about/naapme-community-clean-transportation-assistance-grant-funding-program	X	X	X	X			X
Colorado Energy Office (CEO) Community Accelerated Mobility Project (CAMP)	Grant funding for community-led e-mobility projects. The Community Accelerated Mobility Project (CAMP) offers two phases of grant funding: Technical Readiness Planning Phase and Implementation Phase.	Up to a $75,000 grant per project for Technical Readiness Planning grants; Up to a $1,500,000 grant per project for Implementation grants	Minimum 5%	1-2 rounds for each phase annually	https://energyoffice.colorado.gov/camp	X						X

Summary of Potential Boulder County VZAP Funding Opportunities

Funding Program	Description	Funding Amount	Match Requirement	Status/Anticipated Funding Release Date	Links	Bicycle Facilities	Pedestrian Crossing Enhancements	Transit Improvements	Striping and Signage	Signal Modification or Improvement	Maintenance and Operations	Other (Education, Enforcement, etc.)
Regionally-Administered Programs												
DRCOG Transportation Improvement Program (TIP)	The Denver Regional Council of Government (DRCOG) Transportation Improvement Program (TIP) outlines a four-year plan for federally and state-funded transportation projects to be implemented in the Denver region, aligning with the goals of Metro Vision and the Regional Transportation Plan. Developed through collaboration among local governments, the Colorado Department of Transportation, and the Regional Transportation District, the TIP ensures that selected projects meet air quality standards and regional priorities. The program includes set-aside funds for specific initiatives, such as transportation demand management and air quality improvements, to address targeted regional needs. TIP funding is sourced from 5 major programs: Surface Transportation Block Grant Program (STBG), Transportation Alternatives (TA), Congestion Mitigation/Air Quality (CMAQ), Carbon Reduction Program (CRP), and State Multimodal Transportation and Mitigation Options Fund (MMOF).	$100,000 minimum	20%	Next anticipated call for projects in late 2025/early 2026. There is uncertainty regarding upcoming deadlines, given IIJA funding is currently committed through FY26.	https://drcog.org/transportation-planning/funding-project-delivery/transportation-improvement-program	X	X	X	X	X		X
DRCOG Transportation Improvement Program (TIP) Set Asides Programs	DRCOG's Transportation Improvement Program also funds set-aside programs. Under the Policies for TIP Program Development, a portion of available DRCOG-controlled funds are removed from the pool of available funds prior to a call for projects for the Transportation Improvement Program. These funds are set-aside for specific projects that address priorities identified by the Board. Each program develops its own policies, solicitation application and evaluation criteria. y. For the Fiscal Year 2024-2027 TIP, the TIP Policy identifies five set-asides: • Transportation Demand Management Services • Regional Transportation Operations and Technology • Air Quality Improvements • Human Service Transportation • Community Mobility Planning and Innovation The Community Mobility Planning and Innovation set-aside is made of four constituent programs: • Transportation Corridor Planning • Community-Based Transportation Planning • Livable Centers Small-Area Planning • Innovative Mobility	Set asides for fiscal years 2024-2047 • Transportation Demand Management: $2 Million • Regional Operations & Technology: $16 Million for projects, $4 Million towards signal timing plan development • Human Service Transportation: $8 Million • Transportation Corridor Planning: $3 Million • Community-Based Transportation Planning: $2.5 Million • Livable Centers: $2.5 Million • Innovative Mobility: $4 Million	20%	Spring 2025: • Transportation Demand Management non-infrastructure projects Anticipated Summer 2025: • Transportation Corridor Planning Anticipated fall and winter 2025: • Community-based Plans Spring 2026: • Regional Transportation Operations and Technology 2024 calls: • Human Service Transportation (last call was winter 2024) • Innovative Mobility (last calls were summer and fall 2024) • Livable Centers (last calls were summer and fall 2024)	https://www.drcog.org/transportation-planning/funding-project-delivery/transportation-improvement-program-set-aside	X	X	X	X	X		X
Boulder County Programs												
Countywide Transportation Sales Tax	This fund, passed by voters in 2001 and extended by voters in 2007 and again in 2022, is a countywide 0.1 percent tax (one cent on a $10 purchase) on all sales in Boulder County. Revenues can fund transportation projects including transit service and programs, roadway safety and resilience, regional corridors, regional trails and commuter bikeways, and community mobility programs.	Approximately $4.1 Million annually	N/A	Approved by voters in 2022 to extend in perpituity	https://bouldercounty.gov/government/your-taxes-at-work/transportation-sales-tax/	X	X	X	X	X		X
Boulder County Road & Bridge Fund	The Boulder County Road and Bridge Fund (R&B) is a combination of property taxes, use taxes, state vehicle registration fees, specific ownership tax on vehicle registration, and gasoline taxes collected by the State and County. RR&B funds are restricted to use on the construction and maintenance of roadway-specific projects (including transit and bicycle facilities). R&B collections will be spent on planning, designing, and constructing capital projects, such as repaving roads, repairing and replacing bridges, replacing culverts, repairing sidewalks, etc. The remainder of the road and bridge fund is used by the county for road and infrastructure maintenance activities.	Varies (for the 2024 budget, was $5.9 Million for maintenance and rehabilitation and $8.8 Million dedicated for transportation salex tax projects)	N/A	N/A	https://bouldercounty.gov/transportation/plans-and-projects/capital-improvement-program/	X	X	X	X	X	X	

RESOLUTION NO. 2025-037

A RESOLUTION OF THE BOARD OF COUNTY COMMISSIONERS OF BOULDER COUNTY APPROVING A BALLOT TITLE FOR THE NOVEMBER 4, 2025 GENERAL ELECTION TO EXTEND FOR TEN YEARS THE EXISTING 0.15% COUNTYWIDE OPEN SPACE SALES AND USE TAX FOR THE PURPOSE OF ACQUIRING, IMPROVING, MANAGING, AND MAINTAINING OPEN SPACE LANDS AND OTHER OPEN SPACE PROPERTY INTERESTS

Recitals:

A. This Board has adopted Resolution No. 2025-036, referring an issue to the November 4, 2025 coordinated election ballot.

B. This Board desires to determine the ballot title for the issue referred for placement on the ballot for the November 4, 2025 election.

C. Pursuant to Sections 30-11-103.5 and 31-11-111(3), C.R.S., as amended, this Board must fix a ballot title according to the following guidelines: consider the public confusion that might be caused by a misleading title; avoid a title for which the general understanding of the effect of a "yes" or "no" vote would be unclear; no conflict with titles selected for any other measure that will appear on the County ballot in the same election; and the title shall correctly and fairly express the true intent and meaning of the measure.

D. This Board finds that the ballot title set forth below meets the statutory guidelines.

Therefore, the Board resolves:

1. In accordance with the statutory guidelines, the Board does hereby fix the following ballot title for the referred issue:

COUNTY ISSUE || **(Open Space Sales and Use Tax Extension and Revenue Change):**

WITH NO INCREASE IN ANY COUNTY TAX, SHALL THE COUNTY'S EXISTING 0.15% OPEN SPACE SALES AND USE TAX BE EXTENDED FOR TEN YEARS FOR THE PURPOSES OF ACQUIRING, IMPROVING, MANAGING, AND MAINTAINING OPEN SPACE LANDS AND OTHER OPEN SPACE PROPERTY INTERESTS; AND SHALL THE REVENUES AND THE EARNINGS ON THE INVESTMENT OF THE PROCEEDS OF SUCH TAX CONSTITUTE A VOTER-APPROVED REVENUE CHANGE; ALL IN ACCORDANCE WITH BOARD OF COUNTY COMMISSIONERS' RESOLUTION NO. 2025-036?

2. The Board shall take further action to finally certify the ballot measure and ballot title, together with any others that may be approved, to the November 4, 2025 general election ballot on or before September 5, 2025.

A motion to approve this Resolution 2025-037 was made by Commissioner _____, seconded by Commissioner _____, and passed by a _____ vote.

ADOPTED this ____ day of _____ 2025.

BOARD OF COUNTY COMMISSIONERS
OF BOULDER COUNTY:

_____
Marta Loachamin, Chair

_____
Claire Levy, Vice Chair

_____
Ashley Stolzmann, Commissioner

ATTEST:

Clerk to the Board: _____

RESOLUTION NO. 2025-036

A RESOLUTION DESCRIBING A PROPOSAL FOR A TEN-YEAR EXTENSION OF THE 0.15% COUNTYWIDE OPEN SPACE SALES AND USE TAX FOR THE PURPOSES OF ACQUIRING, IMPROVING, MANAGING, AND MAINTAINING OPEN SPACE LANDS AND OTHER OPEN SPACE PROPERTY INTERESTS; AND A VOTER-APPROVED REVENUE CHANGE.

Recitals

A. Article 2, title 29, Colorado Revised Statutes, as amended, provides for the imposition of a countywide sales and use tax upon approval of a majority of the registered electors of the County voting on such question.

B. There remains a continuing critical need for the preservation of open space lands in Boulder County, preserved open space being a fundamental shared value of the citizens of Boulder County, which open space lands can be used for purposes including but not limited to buffers to preserve community identity, natural areas, wildlife habitat and wetlands, preservation of agricultural uses, continuation of existing visual corridors and passive recreational use through the continued development of a countywide trail system, and therefore there is a critical need for countywide sales and use taxes to finance the acquisition, improvement, management and maintenance of said lands.

C. On November 2, 2010, the voters of Boulder County approved a 0.15% countywide sales and use tax and issuance of open space sales and use tax revenue bonds to acquire, improve, manage and maintain open space lands and other open space property interests, as described in Resolution No. 2010-93, adopted July 27, 2010. Included in Resolution No. 2010-93 was the issuance of up to $40,000,000 in open space capital improvement trust fund bonds repaid through a multiple-fiscal year commitment of revenues received from such countywide sales and use tax and other legally available funds. Nothing in this Resolution 2025-036 modifies, impacts, or revises the bond issuance and its repayment. The Board does not intend for the extension of this sales and use tax to include another bond issuance.

D. The Board desires to refer an extension of the 0.15% countywide open space sales and use tax that is set to expire on December 31, 2030, to be extended for ten years, expiring on December 31, 2040 to the registered electors of the County of Boulder, State of Colorado, to be determined by a majority voting thereon.

E. The Board desires this extension to be effective in for ten years for the purposes of acquiring, improving, managing, and maintaining open space lands and other open space property interests.

F. Proposing to extend said 0.15% countywide sales and use tax, with revenues from said extended period to be expended for open space in accordance with the purposes set forth herein, is a cost-effective method of obtaining additional revenues, the proceeds of which will be used for said purposes, without an increase in the total cumulative countywide sales and use tax rate.

G. If such extension is approved, revenues collected from the imposition of said 0.15% countywide sales and use tax would continue to be expended for the purposes in accordance with Resolution No. 2010-93 through December 31, 2030, and then, beginning on January 1, 2031, would be superseded by this Resolution effective for revenues collected from the imposition of said 0.15% countywide sales and use tax.

H. The Board finds that the extension of the existing countywide sales and use tax in the existing amount of 0.15% from the current expiration date of December 31, 2030, to be extended for ten years, expiring on December 31, 2040, with proceeds of such extension to be utilized for open space purposes in accordance with the provisions of this Resolution, and the exemption of such tax revenues and the interest thereon from the fiscal year spending limitations of article X, section 20 of the Colorado Constitution (the "Article"), would permit these additional revenues to be utilized to further accomplish Boulder County's open space goals.

I. It is the intent of the Board of County Commissioners that, should the proposal to extend the existing countywide 0.15% sales and use tax and obtain a voter-approved revenue change for such tax and earnings proceeds, not be approved by the electorate in November, the existing tax and existing voter-approved revenue change shall not in any way be affected by such failed amendment and shall continue in full force and effect as if this Resolution had not been adopted.

J. Article X, section 20 of the Colorado Constitution provides for the submission of such a sales and use tax proposal to the registered electors of the County at an election called by resolution of the Board of County Commissioners; and Section 104(3) of said Article provides that if no general election is scheduled within 120 days after adoption of such resolution, the Board of County Commissioners shall submit the sales and use tax proposal to the registered electors at a special election, and therefore it is appropriate to refer this proposal to the odd-year election to be held on November 4, 2025, as required by Colo. Const., Art. X, Section 20(3)(a).

K. The said Article provides that the County Clerk and Recorder shall publish the text of such tax proposal four separate times, a week apart, in the official newspaper of the County and of each city and incorporated town within the County.

L. Colo. Const., Art. X, Section 20(3)(b) requires certain election notices to be mailed to all registered voters of the County.

M. The said Article provides that the proposal shall contain certain provisions concerning the amount, levying and scope of said tax.

NOW, THEREFORE, BE IT RESOLVED THAT: the existing countywide 0.15% sales and use tax and revenue change proposal as originally stated in Resolution No. 2010-93 shall be amended as set forth below and the following proposal shall be referred to the registered electors of the County at the general election to be held on Tuesday, November 4, 2025:

1.(a) The imposition, by extension, and collection of a countywide 0.15% (fifteen hundredths of one percent) sales and use tax in accordance with the provisions of the Article

upon the sale at retail of tangible personal property and the furnishing of certain services in the County as provided in paragraph (d) of Subsection (1) of Section 29-2-105, Colorado Revised Statutes ("C.R.S."), as amended, and as is more fully hereinafter set forth.

(b) For the purpose of this sales tax, all retail sales are consummated at the retailer's place of business unless the tangible personal property sold is delivered by the retailer or his agent outside the County's limits. The gross receipts from such sales shall include delivery charges when such charges are subject to the state sales and use tax imposed by article 26, title 39, C.R.S., regardless of the place to which delivery is made. If a retailer has no permanent place of business in the County, the place at which the retail sales are consummated for the purpose of this sales tax shall be determined by the provisions of article 26, title 39, C.R.S., and by rules and regulations promulgated by the Colorado Department of Revenue. Without limiting the broad application of this sales tax and recognizing that mobile telecommunications services are subject to particular legal requirements, this sales tax shall apply to mobile telecommunications services to the greatest extent permitted under Section 29-2-105(1.5), C.R.S.

(c) The amount subject to tax shall not include the amount of any sales or use tax imposed by article 26 of title 39, C.R.S., as amended.

(d) The sales of tangible personal property and services taxable under this sales tax shall be the same as the sales of tangible personal property and services taxable pursuant to Section 39-26-104, C.R.S., as amended, except as otherwise provided herein. They shall be exempt from taxation under the provisions of this proposed countywide sales and use tax extension, the tangible personal property and services which are exempt under the provisions specified in Part 7 of article 26 of title 39, C.R.S., as amended, except that only those local exemptions identified in Section 29-2-105(d)(I), C.R.S., listed below in (1) through (4), and when legally recognized, the local exemptions listed below in (5) through (7) shall apply to this County sales and use tax. The following exemptions are consistent with exemptions contained in various existing Boulder County sales and use tax resolutions:

(1) The exemption for sales of machinery or machine tools specified in Section 39-26-709(1), C.R.S.
(2) The exemption for sales of food specified in Section 39-26-707(1)(e), C.R.S. For the purposes of this subsection, "food" is defined in Section 39-26-102(4.5), C.R.S.
(3) The exemption for sales of components used in the production of energy, including but not limited to alternating current electricity, from a renewable energy source specified in Section 39-26-724, C.R.S.
(4) The exemption for sales of electricity, coal, wood, gas, fuel, oil, or coke specified in Section 39-26-715(1)(a)(II), C.R.S.
(5) The exemption for sales of wood from salvaged trees killed or infested in Colorado by mountain pine beetles or spruce beetles specified in Section 39-26-723, C.R.S.
(6) The exemption for sales that benefit a Colorado school specified in Section 39-26-725, C.R.S.

(7) The exemption for sales by an association or organization of parents and teachers of public school students that is a charitable organization specified in Section 39-

26-718(1)(c), C.R.S.

(e) All sales of personal property on which a specific ownership tax has been paid or is payable shall be exempt from the sales tax imposed by the County when such sales meet both of the following conditions:

(1) The purchaser is a non-resident of or has his principal place of business outside of the County; and
(2) Such personal property is registered or required to be registered outside the limits of the County under the laws of the State of Colorado.

(f) The countywide sales tax shall not apply to the sale of "construction and building materials," as the term is used in Section 29-2-109, C.R.S., as amended, if such materials are picked up by the purchaser and if the purchaser of such materials presents to the retailer a building permit or other documentation acceptable to the County evidencing that a local use tax has been paid or is required to be paid.

(g) The countywide sales tax shall not apply to the sale of tangible personal property at retail or the furnishing of services if the transaction was previously subjected to a sales or use tax lawfully imposed on the purchaser or user by another statutory or home rule county equal to or in excess of that sought to be imposed by the County. A credit shall be granted against the sales tax imposed by the County with respect to such transaction equal in amount to the lawfully imposed local sales or use tax previously paid by the purchaser or user to the previous statutory or home rule county. The amount of the credit shall not exceed the sales tax imposed by the County.

(h) Notwithstanding any other provision of this sales tax regarding the taxation of food, this sales tax shall not apply to the following:

(1) Sales of food purchased with food stamps. For the purposes of this subsection (a), "food" has the same meaning as provided in 7 U.S.C. § 2012, as currently in effect and subsequently amended.
(2) Sales of food purchased with funds provided by the special supplemental food program for women, infants, and children, 42 U.S.C. § 1786. For the purposes of this subsection (b), "food" has the same meaning as provided in 42 U.S.C. § 1786, as currently in effect and subsequently amended.

(i) This sales tax shall not apply to the sales of cigarettes.

(j) This sales tax shall not apply to sales to a telecommunications provider of equipment used directly in the provision of telephone service, cable television service, broadband communications service, or mobile telecommunications service. It is the policy of this County that this exemption be applied in a uniform and nondiscriminatory manner to the telecommunications providers of telephone service, cable television service, broadband communications service, and mobile telecommunications service.

(k) All terms used in this ordinance shall have the same meaning as provided for in Section 39-26-102, C.R.S. Unless otherwise provided in this sales tax, any amendments thereto, or article 2, title 29, C.R.S., the provisions of article 26, title 39, C.R.S., shall govern the

collection, administration, and enforcement of this sales tax.

2. The imposition, by extension, of a countywide 0.15% (fifteen hundredths of one percent) sales and use tax is hereby extended and imposed in accordance with the provisions of the Article for the privilege of using or consuming in the County any construction and building materials purchased at retail and for storing, using, or consuming in the County any motor and other vehicles on which registration is required, purchased at retail. Subject to the provisions of Section 39-26-212, C.R.S., as amended, the use tax shall not extend or apply:

(a) To the storage, use, or consumption of any tangible personal property the sale of which is subject to a retail sales tax imposed by the County;

(b) To the storage, use, or consumption of any tangible personal property purchased for resale in the County either in its original form or as an ingredient of a manufactured or compounded product, in the regular course of a business;

(c) To the storage, use, or consumption of tangible personal property brought into the County by a non-resident thereof for his own storage, use, or consumption while temporarily within the County; however, this exemption does not apply to the storage, use, or consumption of tangible personal property brought into this State by a non-resident to be used in the conduct of a business in this State;

(d) To the storage, use, or consumption of tangible personal property by the United States government or the State of Colorado, or its institutions, or its political subdivisions in their governmental capacities only or by religious or charitable corporations in the conduct of their regular religious or charitable functions;

(e) To the storage, use, or consumption of tangible personal property by a person engaged in the business of manufacturing or compounding for sale, profit, or use any article, substance, or commodity, which tangible personal property enters into the processing of or becomes an ingredient or component part of the product or service which is manufactured, compounded, or furnished and the container, label, or the furnished shipping case thereof;

(f) To the storage, use, or consumption of any article of tangible personal property the sale or use of which has already been subjected to a legally imposed sales or use tax of another statutory or home rule county equal to or in excess of that imposed by the County. A credit shall be granted against the use tax imposed by the County with respect to a person's storage, use, or consumption in the County of tangible personal property purchased in another statutory or home rule county. The amount of the credit shall be equal to the tax paid by the person by reason of the imposition of a sales or use tax of the other statutory or home rule county on the purchase or use of the property. The amount of the credit shall not exceed the tax imposed by this Resolution;

(g) To the storage, use, or consumption of tangible personal property and household effects acquired outside of the County and brought into it by a nonresident acquiring residency;

(h) To the storage or use of a motor vehicle if the owner is or was, at the time of purchase, a nonresident of the County and purchased the vehicle outside of the County for use outside of the County and actually so used it for a substantial and primary purpose for which it was acquired and registered, titled, and licensed said motor vehicle outside of the County;

(i) To the storage, use or consumption of any construction and building materials and motor and other vehicles on which registration is required if a written contract for the purchase thereof was entered into prior to November 6, 2001;

(j) To the storage, use or consumption of any construction and building materials required or made necessary in the performance of any construction contract bid, let, or entered into any time prior to November 6, 2001.

3. The 0.15% use tax provided for herein shall be applicable to every motor vehicle for which registration is required by the laws of the State of Colorado, and no registration shall be made for any motor vehicle by the Department of Revenue or its authorized agents until any tax due upon the use, storage, or consumption thereof pursuant to this Resolution has been paid.

4. The definition of words herein contained shall be as said words are defined in Section 39-26-102, C.R.S., as amended, and said definitions are incorporated herein.

5. Except as provided by Section 39-26-208, C.R.S., as amended, any use tax imposed shall be collected, enforced, and administered by the County. The use tax on construction and building materials will be collected by the County building inspector or as may be otherwise provided by intergovernmental agreement, based upon an accurate estimate of building and construction materials costs submitted by the owner or contractor at the time a building permit application is made.

6. If the majority of the registered electors voting thereon vote for approval of this 0.15% countywide sales and use tax extension proposal, such 0.15% countywide sales and use tax shall be in effect throughout the incorporated and unincorporated portions of the County to be extended for ten years, expiring on December 31, 2040, unless and until repealed or otherwise revised by a vote of the citizens of Boulder County.

7. If the majority of the registered electors voting thereon vote for approval of this countywide sales and use tax extension proposal, revenues collected from the imposition of said 0.15% countywide sales and use tax would be expended for the purposes and in accordance with the limitations of this Resolution.

8. The cost of the election shall be paid from the general fund of the County.

9. The County Clerk and Recorder shall publish the text of this sales and use tax proposal four separate times, a week apart, in the official newspaper of the County and each city and incorporated town within this County.

10. The County Clerk and Recorder, as election officer, shall undertake all measures necessary to comply with the election provisions set forth in Colo. Const., Art. X, Section 20(3), including but not limited to the mailing of required election notices and ballot issue summaries.

11. The conduct of the election shall conform so far as is practicable to the general election laws of the State of Colorado.

12. Beginning January 1, 2030, the net proceeds from the 0.15% countywide sales and use tax received by the County shall be expended by the County for the purpose of acquiring, improving, managing and maintaining open space lands and other open space property interests, including, but not limited to:

(a) To acquire fee title interest in real property through all means available and by various types of instruments and transactions, in the County of Boulder for open space when determined by the Board of County Commissioners, acting pursuant to authority as set forth in title 30, C.R.S., and in article 7 of title 29, C.R.S., to be necessary to preserve such areas;

(b) To acquire an interest in real property by other devices, such as, but not limited to, lease, development rights, mineral and other subsurface rights, and conservation easements in order to effect the preservation of open space lands, as hereinafter defined, in the County of Boulder;

(c) To acquire water rights and water storage rights for use in connection with real property acquired for open space;

(d) To acquire rights-of-way and easements for access to open space lands and for trails in the County of Boulder and to build and improve such accessways and trails;

(e) To acquire options related to these acquisitions;

(f) To pay for all related costs of acquisition and construction as set forth in subparagraphs (a) through (c) above;

(g) To improve all County of Boulder open space property and trails in accordance with Parks and Open Space policies adopted by the Board of County Commissioners; improvements shall be related to resource management, including but not limited to water improvements (irrigation, domestic use, and recreational uses), preservation enhancements (fences, wetlands, and wildlife habitat improvements), and passive recreational uses, such as trails, trailhead parking and other access improvements, picnic facilities and restrooms; and

(h) To permit the use of these funds for the joint acquisition of open space property with municipalities located within the County of Boulder in accordance with an intergovernmental agreement for open space or with other governmental entities or land trusts.

13. Open space land, for the purposes of this Resolution, is generally described as: those lands in which it has been determined by the Board of County Commissioners that it is, or may in the future be, within the public interest to acquire an interest in order to assure their protection and to fulfill one or more of the functions described below. Interests acquired may include fee simple, lease, easements, development rights, and conservation easements. Open space shall serve one or more of the following functions:

(a) urban shaping between or around municipalities or community service areas and buffer zones between residential and non-residential development;

(b) preservation of critical ecosystems, natural areas, scenic vistas and areas, fish and wildlife habitat, natural resources and landmarks, and cultural, historical and archeological areas;

(c) linkages and trails, access to public lakes, streams and other usable open space lands, stream corridors and scenic corridors along existing highways;

(d) areas of environmental preservation, designated as areas of concern, generally in multiple ownership, where several different preservation methods (including other governmental bodies' participation or private ownership) may need to be utilized;

(e) conservation of natural resources, including but not limited to forest lands, range lands, agricultural land, aquifer recharge areas, and surface water; and

(f) preservation of land for outdoor recreation areas limited to passive recreational use, including but not limited to hiking, photography or nature studies, and, if specifically designated, bicycling, horseback riding, or fishing.

Once acquired, open space may be used only for passive recreational purposes, for agricultural purposes, or for environmental preservation purposes, all as set forth above.

14. The Board of County Commissioners will annually consult the City Councils and Town Boards of the municipalities within Boulder County to assure that open space preservation and trail projects identified by municipalities are considered in setting County open space acquisition and trail development priorities for the following calendar year.

15. No open space land acquired through the revenues provided by this sales and use tax may be sold, leased, traded, or otherwise conveyed, nor may any exclusive license or permit on such open space land be given, until approval of such disposal by the Board of County Commissioners. Prior to such disposal, the proposed shall be reviewed by the Parks and Open Space Advisory Committee, and a recommendation shall be forwarded to the Board of County Commissioners. Approval of the disposal may be given only by a majority vote of the members of the Board of County Commissioners after a public hearing held with notice published at least ten (10) days in advance in the official newspaper of the County and of each city and incorporated town within the County, giving the location of the land in question and the intended disposal thereof. No such open space land shall be disposed of until sixty (60) days following the date of Board of County Commissioners' approval of such disposal. If,

within such sixty (60) day period, a petition meeting the requirements of § 29-2-104, C.R.S., as amended, or its successor statute, is filed with the County Clerk, requesting that such disposal be submitted to a vote of the electors, such disposal shall not become effective until a referendum held in accordance with said statute has been held. The provisions of this paragraph shall not apply to agricultural leases for crop or grazing purposes for a term of ten (10) years or less.

16. If the real property or any interest therein acquired by use of proceeds of said sales and use tax pursuant to paragraph 11 of this Resolution be ever sold, exchanged, transferred or otherwise disposed of, the consideration for such sale, exchange, transfer or disposition shall be subject to the same expenditure and use restrictions as those set forth herein for the original proceeds of said sales and use tax, including restrictions set forth in this paragraph; and if such consideration is by its nature incapable of being subject to the restrictions set forth herein, then the proposed sale, exchange, transfer, or disposition shall be unlawful and shall not be made.

17. The County of Boulder will not use any of the revenues received from the sales and use tax to acquire an interest, other than an option, in open space land within the community service area of a municipality as designated and recognized by action of the Board of County Commissioners in accordance with the Boulder County Comprehensive Plan or as provided in an intergovernmental agreement with such municipality, without the concurrence of the municipality involved.

18. Revenue generated from activities on open space lands may be used to acquire, manage, patrol, improve, and maintain open space properties.

19. If the proposal to extend the existing countywide 0.15% sales and use tax and obtain a voter-approved revenue change for such tax and earnings proceeds not be approved by the electorate in November, the existing tax and existing voter-approved revenue change shall not in any way be affected by such failed amendment and shall continue in full force and effect as if this Resolution had not been adopted.

20. Monies from the extended sales and use tax will be appropriated annually as determined by the Board in its sole discretion and in accordance with the terms of this Resolution.

21. Interest generated from the revenues of the sales and use tax shall be used for the purposes set forth in this Resolution.

22. For the purposes of Colo. Const., Art. X, Section 20, the receipt and expenditure of revenues of the sales and use tax together with earnings on the investment of the proceeds of the tax shall constitute a voter-approved revenue change.

23. The existing countywide total sales and use tax rate of 1.185%, a portion of which would be extended under this proposal, when added to existing state and municipal sales and use tax rates which are non-exempt under the provisions of Section 29-2-108, C.R.S., as amended, and cumulated with the contemporary extended open space tax results in a total

sales and use tax rate in excess of the 6.9 percent limit stated in said statute as follows: Boulder: 9.045%; Boulder (retail food service): 9.195%; Erie: 8.685%; Lafayette: 9.055%; Longmont: 8.715%; Louisville: 8.835%; Lyons: 8.685%; Nederland: 9.435%; Superior: 8.645%; Ward: 7.185%.

24. If any provision of this Resolution or the application thereof to any person or circumstances is held invalid, such invalidity shall not affect other provisions or applications of this Resolution which can be given effect without the invalid provision or applications and to this end, the provisions of this Resolution are declared to be severable.

25. The proposal as described in this Resolution shall take effect immediately upon the approval of the electorate.

26. A notice of the adoption of this countywide sales and use tax addition proposal by a majority of the registered electors voting thereon shall be submitted by the County Clerk and Recorder to the Executive Director of the Department of Revenue, together with a certified copy of this Resolution, at least 45 days prior to the effective date of the sales and use tax created herein.

27. The Board of County Commissioners of Boulder County shall take action to set a ballot title for this issue.

IT IS HEREBY DECLARED by the Board of County Commissioners of the County of Boulder and State of Colorado that this Resolution is necessary for the immediate preservation of the public health, safety and welfare, and that it shall become effective immediately upon its adoption.

[**Signature Page to Follow**]

A motion to approve this Resolution 2025-036 was made by Commissioner _____, seconded by Commissioner _____, and passed by a _____ vote.

ADOPTED this ____ day of _____ 2025.

BOARD OF COUNTY COMMISSIONERS
OF BOULDER COUNTY:

_____
Marta Loachamin, Chair

_____
Claire Levy, Vice Chair

_____
Ashley Stolzmann, Commissioner

ATTEST:

Clerk to the Board: _____

RESOLUTION NO. 2025-038

A RESOLUTION DESCRIBING A PROPOSAL TO IMPOSE FOR FIVE YEARS AN ADDITIONAL COUNTYWIDE SALES AND USE TAX OF 0.15% FOR THE PURPOSES OF UNMET NEEDS OF YOUTH, ADULTS, FAMILIES, UNHOUSED INDIVIDUALS, AND OLDER ADULTS IN BOULDER COUNTY WITH OR AT RISK OF MENTAL HEALTH AND SUBSTANCE USE DISORDERS BY PROVIDING MENTAL HEALTH CRISIS SERVICES; SUICIDE PREVENTION AND INTERVENTION; MENTAL HEALTH AND SUBSTANCE USE PREVENTION, TREATMENT, AND RECOVERY; TREATMENT SERVICES FOR UNHOUSED INDIVIDUALS; AND ASSISTANCE FINDING APPROPRIATE SERVICES THROUGH COMMUNITY-BASED ORGANIZATIONS, GOVERNMENTAL ENTITIES, AND OTHER OPTIONS; AND A VOTER-APPROVED REVENUE CHANGE.

Recitals

A. Mental health and substance use challenges impact youth, families, and individuals without regard to gender, age, sexual-orientation, religion, national origin, skin color or language.

B. Untreated mental health and substance use disorders are estimated to cost the US economy approximately $282 billion each year in the form of lost productivity due to absenteeism and unemployment, resulting in significant losses in workforce participation; healthcare costs due to higher rates of chronic conditions among people with untreated mental illness; indirect and direct costs such as treatment expenses, lost earnings, and reduced quality of life; and social costs such as homelessness, incarceration, and strain on social services.[1]

C. As of 2024, Colorado had the second-highest prevalence of mental illness in the country, with more than 530,000 Coloradans struggling with depression, more than one in four Coloradans, or 1.5 million people, suffering from poor mental health, and significantly elevated rates of suicide as compared to the national average.[2]

D. In Colorado, the economic cost of untreated mental illness is estimated to range from $5.4 billion to $10 billion annually associated with lost productivity, increased healthcare expenses, incarceration, and suicide.[3]

E. Data from communities that have implemented locally funded taxes for behavioral health services indicate that a local funding source improved the behavioral health system, increased access to behavioral health services for people with the highest need, increased ability to address complex behavioral health needs, and improved

[1] Unwell and Unproductive: The Economic Toll of America's Mental Health Crisis; Michigan Journal of Economics, April 4, 2025.

[2] "Addressing Mental Health Challenges in Colorado; Economic Impacts and Analysis of State Efforts" Mahan & Anderson, Common Sense Institute, April, 2025.

[3] *Id.*

outcomes for people with mental health and substance use disorders.

F. In Larimer County, which implemented a 0.25% sales and use tax increase in 2018, the suicide rate per 100,000 has been decreasing since this tax revenue was used to provide services and is now below the state average suicide rate.[4]

G. Eagle County's locally funded mental health fund has supported a 50% increase in the capacity of mental health providers in the community, a 70% decrease in behavioral health-related transports to the emergency department, and the addition of behavioral health clinicians in middle and high schools.[5]

H. A study of the economic benefits of expanding mental and behavioral health supports found that recovery from mental illness increases employment and workforce participation up to 41% and created an average return of $4.00 in improved health and productivity for every $1.00 spent on mental health treatment.[6]

I. Surveys of voters in Boulder County have demonstrated strong support for funding the services and supports identified in this Resolution.

J. Boulder County staff and community partners have devoted countless hours to creating a road map of behavioral health services in Boulder County, a Boulder County Behavioral Health Strategic Plan, and a plan to implement the Strategic Plan in the event additional funds become available. The Strategic Plan identifies five areas of core services that are essential to addressing the unmet need for mental health and behavioral health services, and outlines the mechanisms that are necessary to evaluate and measure success.

K. Article 2, Title 29, Colorado Revised Statutes, as amended, provides for the imposition of a county-wide sales and use tax upon approval of a majority of the registered electors of the County voting on such question.

L. The Board of County Commissioners of Boulder County desires to refer to the registered electors of the County of Boulder, State of Colorado, to be determined by a majority voting thereon, a new 0.15% sales and use tax, adding $0.15 to the cost of a $100.00 purchase, to be effective beginning on January 1, 2026 and extending for five years, expiring on December 31, 2030, with revenues to be expended for mental and behavioral health services in accordance with this Resolution.

[4] 2024 Behavioral Health Services Annual Report. Larimer County Behavioral Health Services. https://www.larimer.gov/behavioralhealth/bhs-annual-report/2024-reports

[5] 2017-2018 Mental Health Ballot Measures in Colorado Counties. www.mentalhealthcolorado.org/wp-content/uploads/2021/01/Denver-Foundation-Report.pdf

[6] Expanding access to mental health supports would help the economy, according to new report. Ohio Capital Journal. https://ohiocapitaljournal.com/2025/01/10/expanding-access-to-mental-health-supports-would-help-the-economy-according-to-new-report/

M. The Board finds that the enactment of a 0.15% countywide sales and use tax for five (5) years with proceeds of such tax to be utilized in accordance with the provisions of this Resolution, and the exemption of such tax revenues and the interest thereon from the fiscal year spending limitations of Article X, section 20 of the Colorado Constitution (hereinafter the "Article"), would permit these additional revenues to be utilized to further accomplish Boulder County's goals to meet the mental and behavioral health needs of the residents of Boulder County.

N. The Board finds that the imposition of this 0.15% county-wide sales and use tax, effective for 5 years, the proceeds of which will be used for said purposes, and the exemption of such tax revenues and the interest on them from the fiscal year spending limitations of the Article, would provide additional revenues used to meet critical needs and is a cost-effective method of obtaining additional revenues.

O. The Article provides for the submission of such a sales and use tax proposal to the registered electors of the County at an election called by resolution of the Board of County Commissioners; and section 104(3) of said Article provides that if no general election is scheduled within 120 days after adoption of such resolution, the Board of County Commissioners shall submit the sales and use tax proposal to the registered electors at a special election, and therefore it is appropriate to refer this proposal to the odd-year election to be held on November 4, 2025, as required by Colo. Const., Art. X, Section 20(3)(a).

P. The Article provides that the County Clerk and Recorder shall publish the text of such tax proposal four separate times, a week apart, in the official newspaper of the County and of each city and incorporated town within the County.

Q. Colo. Const., Art. X, Section 20(3)(b) requires certain election notices to be mailed to all registered voters of the County.

R. The Article provides that the proposal shall contain certain provisions concerning the amount, levying and scope of said tax.

NOW, THEREFORE, BE IT RESOLVED THAT: There shall be referred to the registered electors of the County of Boulder at a Coordinated Election held on Tuesday, November 4, 2025, the following proposal:

1.(a) The imposition and collection of a countywide 0.15% (fifteen hundredths of one percent) sales and use tax for five years in accordance with the provisions of the Article upon the sale at retail of tangible personal property and the furnishing of certain services in the County as provided in paragraph (d) of Subsection (1) of Section 29-2-105, Colorado Revised Statutes ("C.R.S."), as amended, and as is more fully hereinafter set forth.

(b) For the purpose of this sales tax, all retail sales are consummated at the retailer's place of business unless the tangible personal property sold is delivered by the retailer or his agent outside the County's limits. The gross receipts from such sales shall include delivery charges when such charges are subject to the state sales and use tax imposed by article 26, title 39, C.R.S., regardless of the place to which delivery is made. If a retailer has no permanent place

of business in the County, the place at which the retail sales are consummated for the purpose of this sales tax shall be determined by the provisions of article 26, title 39, C.R.S., and by rules and regulations promulgated by the Colorado Department of Revenue. Without limiting the broad application of this sales tax and recognizing that mobile telecommunications services are subject to particular legal requirements, this sales tax shall apply to mobile telecommunications services to the greatest extent permitted under Section 29-2-105(1.5), C.R.S.

(c) The amount subject to tax shall not include the amount of any sales or use tax imposed by article 26 of title 39, C.R.S., as amended.

(d) The sales of tangible personal property and services taxable under this sales tax shall be the same as the sales of tangible personal property and services taxable pursuant to Section 39-26-104, C.R.S., as amended, except as otherwise provided herein. There shall be exempt from taxation under the provisions of this proposed countywide sales and use tax, the tangible personal property and services which are exempt under the provisions specified in Part 7 of Article 26 of title 39, C.R.S., as amended, except that only those local exemptions identified in Section 29-2-105(d)(I), C.R.S., listed below in (1) through (4), and when legally recognized, the local exemptions listed below in (5) through (7) shall apply to this County sales and use tax. The following exemptions are consistent with exemptions contained in various existing Boulder County sales and use tax resolutions:

(1) The exemption for sales of machinery or machine tools specified in Section 39-26-709(1), C.R.S.
(2) The exemption for sales of food specified in Section 39-26-707(1)(e), C.R.S. For the purposes of this subsection, "food" is defined in Section 39-26-102(4.5), C.R.S.
(3) The exemption for sales of components used in the production of energy, including but not limited to alternating current electricity, from a renewable energy source specified in Section 39-26-724, C.R.S.
(4) The exemption for sales of electricity, coal, wood, gas, fuel, oil, or coke specified in Section 39-26-715(1)(a)(II), C.R.S.
(5) The exemption for sales of wood from salvaged trees killed or infested in Colorado by mountain pine beetles or spruce beetles specified in Section 39-26-723, C.R.S.
(6) The exemption for sales that benefit a Colorado school specified in Section 39-26-725, C.R.S.
(7) The exemption for sales by an association or organization of parents and teachers of public school students that is a charitable organization specified in Section 39-26-718(1)(c), C.R.S.

(e) All sales of personal property on which a specific ownership tax has been paid or is payable shall be exempt from the sales tax imposed by the County when such sales meet both of the following conditions:

(1) The purchaser is a non-resident of or has his principal place of business outside of the County; and
(2) Such personal property is registered or required to be registered outside the limits of the County under the laws of the State of Colorado.

(f) The countywide sales tax shall not apply to the sale of "construction and building materials," as the term is used in Section 29-2-109, C.R.S., as amended, if such materials are picked up by the purchaser and if the purchaser of such materials presents to the retailer a

building permit or other documentation acceptable to the County evidencing that a local use tax has been paid or is required to be paid.

(g) The countywide sales tax shall not apply to the sale of tangible personal property at retail or the furnishing of services if the transaction was previously subjected to a sales or use tax lawfully imposed on the purchaser or user by another statutory or home rule county equal to or in excess of that sought to be imposed by the County. A credit shall be granted against the sales tax imposed by the County with respect to such transaction equal in amount to the lawfully imposed local sales or use tax previously paid by the purchaser or user to the previous statutory or home rule county. The amount of the credit shall not exceed the sales tax imposed by the County.

(h) Notwithstanding any other provision of this sales tax regarding the taxation of food, this sales tax shall not apply to the following:

(1) Sales of food purchased with food stamps. For the purposes of this subsection (a), "food" has the same meaning as provided in 7 U.S.C. § 2012, as currently in effect and subsequently amended.

(2) Sales of food purchased with funds provided by the special supplemental food program for women, infants, and children, 42 U.S.C. § 1786. For the purposes of this subsection (b), "food" has the same meaning as provided in 42 U.S.C. § 1786, as currently in effect and subsequently amended.

(i) This sales tax shall not apply to the sales of cigarettes.

(j) This sales tax shall not apply to sales to a telecommunications provider of equipment used directly in the provision of telephone service, cable television service, broadband communications service, or mobile telecommunications service. It is the policy of this County that this exemption be applied in a uniform and nondiscriminatory manner to the telecommunications providers of telephone service, cable television service, broadband communications service, and mobile telecommunications service.

(k) All terms used in this ordinance shall have the same meaning as provided for in Section 39-26-102, C.R.S. Unless otherwise provided in this sales tax, any amendments thereto, or article 2, title 29, C.R.S., the provisions of article 26, title 39, C.R.S., shall govern the collection, administration, and enforcement of this sales tax.

2. The imposition of a countywide 0.15% (fifteen hundredths of one percent) sales and use tax is hereby imposed in accordance with the provisions of the Article for the privilege of using or consuming in the County any construction and building materials purchased at retail and for storing, using, or consuming in the County any motor and other vehicles on which registration is required, purchased at retail. Subject to the provisions of Section 39-26-212, C.R.S., as amended, the use tax shall not extend or apply:

(a) To the storage, use, or consumption of any tangible personal property the sale of which is subject to a retail sales tax imposed by the County;

(b) To the storage, use, or consumption of any tangible personal property purchased for resale in the County either in its original form or as an ingredient of a manufactured or compounded product, in the regular course of a business;

(c) To the storage, use, or consumption of tangible personal property brought into the County by a non-resident thereof for his own storage, use, or consumption while temporarily

within the County; however, this exemption does not apply to the storage, use, or consumption of tangible personal property brought into this State by a non-resident to be used in the conduct of a business in this State;

(d) To the storage, use, or consumption of tangible personal property by the United States government or the State of Colorado, or its institutions, or its political subdivisions in their governmental capacities only or by religious or charitable corporations in the conduct of their regular religious or charitable functions;

(e) To the storage, use, or consumption of tangible personal property by a person engaged in the business of manufacturing or compounding for sale, profit, or use any article, substance, or commodity, which tangible personal property enters into the processing of or becomes an ingredient or component part of the product or service which is manufactured, compounded, or furnished and the container, label, or the furnished shipping case thereof;

(f) To the storage, use, or consumption of any article of tangible personal property the sale or use of which has already been subjected to a legally imposed sales or use tax of another statutory or home rule county equal to or in excess of that imposed by the County. A credit shall be granted against the use tax imposed by the County with respect to a person's storage, use, or consumption in the County of tangible personal property purchased in another statutory or home rule county. The amount of the credit shall be equal to the tax paid by the person by reason of the imposition of a sales or use tax of the other statutory or home rule county on the purchase or use of the property. The amount of the credit shall not exceed the tax imposed by this Resolution;

(g) To the storage, use, or consumption of tangible personal property and household effects acquired outside of the County and brought into it by a nonresident acquiring residency;

(h) To the storage or use of a motor vehicle if the owner is or was, at the time of purchase, a nonresident of the County and purchased the vehicle outside of the County for use outside of the County and actually so used it for a substantial and primary purpose for which it was acquired and registered, titled, and licensed said motor vehicle outside of the County;

(i) To the storage, use or consumption of any construction and building materials and motor and other vehicles on which registration is required if a written contract for the purchase thereof was entered into prior to November 6, 2001;

(j) To the storage, use or consumption of any construction and building materials required or made necessary in the performance of any construction contract bid, let, or entered into any time prior to November 6, 2001.

3. The 0.15% use tax provided for herein shall be applicable to every motor vehicle for which registration is required by the laws of the State of Colorado, and no registration shall be made for any motor vehicle by the Department of Revenue or its authorized agents until any tax due upon the use, storage, or consumption thereof pursuant to this Resolution has been paid.

4. The definition of words herein contained shall be as said words are defined in Section 39-26-102, C.R.S., as amended, and said definitions are incorporated herein.

5. Except as provided by Section 39-26-208, C.R.S., as amended, any use tax imposed shall be collected, enforced, and administered by the County. The use tax on construction and building materials will be collected by the County building inspector or as may be otherwise provided by intergovernmental agreement, based upon an accurate estimate of building and construction materials costs submitted by the owner or contractor at the time a building permit application is made.

6. If the majority of the registered electors voting thereon vote for approval of this 0.15% countywide sales and use tax proposal, such 0.15% countywide sales and use tax shall be in effect throughout the incorporated and unincorporated portions of the County from January 1, 2026, through December 31, 2030, unless and until repealed or otherwise revised by a vote of the citizens of Boulder County.

7. If the majority of the registered electors voting thereon vote for approval of this countywide sales and use tax proposal, revenues collected from the imposition of said 0.15% countywide sales and use tax will be expended for the purposes and in accordance with the limitations of this Resolution.

8. The cost of the election shall be paid from the general fund of the County.

9. The County Clerk and Recorder shall publish the text of this sales and use tax proposal four separate times, a week apart, in the official newspaper of the County and each city and incorporated town within this County.

10. The County Clerk and Recorder, as election officer, shall undertake all measures necessary to comply with the election provisions set forth in Colo. Const., Art. X, Section 20(3), including but not limited to the mailing of required election notices and ballot issue summaries.

11. The conduct of the election shall conform so far as is practicable to the general election laws of the State of Colorado.

12. Beginning January 1, 2026, the net proceeds from the 0.15% countywide sales and use tax received by the County shall be expended by the County for the purposes of addressing unmet needs of youth, adults, families, unhoused individuals, and older adults in Boulder County with or at risk of mental health and substance use disorders by providing the following services through community-based organizations, governmental entities, and other options: mental health crisis services; suicide prevention and intervention; mental health and substance use prevention, treatment, and recovery; treatment services for unhoused individuals; and assistance finding appropriate services.

13. The Board shall allocate the tax revenues into five funding categories: crisis response and intervention services; treatment services; recovery supports; navigation services; and prevention services. To continue to maximize the County's strategic investments in the community and facilitate strong and effective partnerships with service providers and considering anticipated growth of mental and behavioral health programs and/or coordination needs with service providers, monies deposited in the Fund may also be used to support County administration of mental and behavioral health services and or programs, including but not limited to a dedicated staff position to serve as liaison with participating agencies. The Board will determine in its sole discretion at least every three years, with the advice of an

advisory council as described below, the allocation of funds between the five funding categories to address changing and emerging needs and fluctuations in available funds.

14. Funds will support services provided by Boulder County, organizations and health care providers that provide licensed clinicians, and community-based organizations that serve under-served populations in Boulder County, including unhoused and formerly unhoused individuals, non-English speaking community members, and members of the LGBTQ community.

15. The Board has determined that the funding categories allocation, after setting aside a required 5% reserve, for the first three years of tax revenues shall be the following:

(a) Crisis Response and Intervention Services: 15% These services will include mobile crisis response, walk-in centers, and place-based crisis response and stabilization for individuals experiencing a mental health crisis or substance use withdrawal.

(b) Treatment Services: 40% Treatment services will include out-patient and residential care for mental health and substance use disorders.

(c) Recovery Supports: 25% These services include case management, staffed residential living, partial hospitalization, sober-living, intensive outpatient services, peer services and other step-down services that support county residents in recovery from substance use and mental health disorders.

(d) Navigation Services: 10% Navigation services will connect people with the appropriate level of mental and behavioral health services and resources.

(e) Prevention Services: 10% Prevention services will fund schools, non-profit organizations, and other groups to support youth and others who have been impacted by adverse experiences, who are experiencing risk factors, or at risk of developing a mental illness or substance use disorder, or at risk of suicide.

16. Future funding decisions will be made by the Board of County Commissioners with the advice of an advisory body convened by Boulder County consisting of representatives of under-served communities, homeless service providers, mental and behavioral health service providers, municipalities, Boulder County, and youth-serving organizations.

17. Before the expiration of the tax, Boulder County will evaluate or procure an evaluation of the efficacy of the services that have been funded by these tax revenues; assess the extent of unmet need for mental health and substance use services, including residential treatment and recovery services, among youth, adults, older adults, and unhoused individuals who do not have private health insurance; make a recommendation for how to meet those needs; and estimate the cost of meeting that need.

18. The intent of Boulder County is to leverage these tax revenues with Medicaid funds and other funds when possible and to provide services through community-based organizations, health care providers, and governmental entities.

19. The intent of Boulder County is for these tax revenues to provide additional funding for mental health and substance use services, and not to supplant existing sources of funding.

20. Monies from the extended sales and use tax will be appropriated annually as determined by the Board in accordance with the terms of this Resolution.

21. Interest generated from the revenues of the sales and use tax shall be used for the purposes set forth in this Resolution.

22. For the purposes of Colo. Const., Art. X, Section 20, the receipt and expenditure of revenues of the sales and use tax together with earnings on the investment of the proceeds of the tax shall constitute a voter-approved revenue change.

23. Upon the effective date of the 0.15% county-wide total sales and use tax proposed herein, the county-wide total sales and use tax rate of 1.185%, when added to existing state and municipal sales and use tax rates which are non-exempt under the provisions of Section 29-2- 108, C.R.S., as amended, results in a total sales and use tax rate in excess of the 6.9 percent limit stated in said statute as follows: Boulder: 9.045%; Boulder (retail food service): 9.195%; Erie: 8.685%; Lafayette: 9.055%; Longmont: 8.715%; Louisville: 8.960%; Lyons: 8.685%;
Nederland: 9.435%; Superior: 8.960%; Ward: 7.185%.

24. If any provision of this Resolution or the application thereof to any person or circumstances is held invalid, such invalidity shall not affect other provisions or applications of this Resolution which can be given effect without the invalid provision or applications and to this end, the provisions of this Resolution are declared to be severable.

25. The proposal as described in this Resolution shall take effect immediately upon the approval of the electorate.

26. The sales and use tax described in this Resolution expires on December 31, 2030.

27. A notice of the adoption of this county-wide sales and use tax addition proposal by Approval of this Resolution by the Board of County Commissioners shall be promptly published in a newspaper of general circulation in Boulder County the Board of County Commissioners shall be published in accordance with statutory requirements. A majority of the registered electors voting thereon shall be submitted by the County Clerk and Recorder to the Executive Director of the Department of Revenue, together with a certified copy of this Resolution, at least 45 days prior to the effective date of the sales and use tax created herein.

28. The Board of County Commissioners of Boulder County shall take action to set a ballot title for this issue.

IT IS HEREBY DECLARED by the Board of County Commissioners of the County of Boulder and State of Colorado that this Resolution is necessary for the immediate preservation of the public health, safety and welfare, and that it shall become effective immediately upon its adoption.

A motion to approve this Resolution 2025-038 was made by Commissioner _____, seconded by Commissioner _____, and passed by a _____ vote.

ADOPTED this _____ day of _____ 2025.

BOARD OF COUNTY COMMISSIONERS
OF BOULDER COUNTY:

_____
Marta Loachamin, Chair

_____
Claire Levy, Vice Chair

_____
Ashley Stolzmann, Commissioner

ATTEST:

Clerk to the Board: _____

RESOLUTION NO. 2025-039

A RESOLUTION OF THE BOARD OF COUNTY COMMISSIONERS OF BOULDER COUNTY APPROVING A BALLOT TITLE FOR THE NOVEMBER 4, 2025 GENERAL ELECTION TO IMPOSE FOR FIVE YEARS AN ADDITIONAL SALES AND USE TAX OF 0.15% FOR THE PURPOSES OF ADDRESSING UNMET NEEDS OF YOUTH, ADULTS, FAMILIES, UNHOUSED INDIVIDUALS, AND OLDER ADULTS IN BOULDER COUNTY WITH OR AT RISK OF MENTAL HEALTH AND SUBSTANCE USE DISORDERS BY PROVIDING MENTAL HEALTH CRISIS SERVICES; SUICIDE PREVENTION AND INTERVENTION; MENTAL HEALTH AND SUBSTANCE USE PREVENTION, TREATMENT, AND RECOVERY; TREATMENT SERVICES FOR UNHOUSED INDIVIDUALS; AND ASSISTANCE FINDING APPROPRIATE SERVICES THROUGH COMMUNITY-BASED ORGANIZATIONS, GOVERNMENTAL ENTITIES, AND OTHER OPTIONS; AND A VOTER-APPROVED REVENUE CHANGE

Recitals:

A. This Board has adopted Resolution No. 2025-038, referring an issue to the November 4, 2025 coordinated election ballot.

B. This Board desires to determine the ballot title for the issue referred for placement on the ballot for the November 4, 2025 election.

C. Pursuant to Sections 30-11-103.5 and 31-11-111(3), C.R.S., as amended, this Board must fix a ballot title according to the following guidelines: consider the public confusion that might be caused by a misleading title; avoid a title for which the general understanding of the effect of a "yes" or "no" vote would be unclear; no conflict with titles selected for any other measure that will appear on the County ballot in the same election; and the title shall correctly and fairly express the true intent and meaning of the measure.

D. This Board finds that the ballot title set forth below meets the statutory guidelines.

Therefore, the Board resolves:

1. In accordance with the statutory guidelines, the Board does hereby fix the following ballot title for the referred issue:

COUNTY ISSUE [] (Mental and Behavioral Health Sales and Use Tax and Revenue Change):

SHALL BOULDER COUNTY TAXES BE INCREASED $15 MILLION ANNUALLY (FIRST FULL FISCAL YEAR DOLLAR INCREASE IN 2026) BY IMPOSING AN ADDITIONAL SALES AND USE TAX FOR FIVE YEARS OF 0.15% FOR THE PURPOSE OF ADDRESSING UNMET NEEDS OF YOUTH, ADULTS, FAMILIES, UNHOUSED INDIVIDUALS, AND OLDER ADULTS IN BOULDER COUNTY WITH OR AT RISK OF MENTAL HEALTH AND SUBSTANCE USE DISORDERS BY PROVIDING MENTAL HEALTH CRISIS SERVICES; SUICIDE PREVENTION AND INTERVENTION; MENTAL HEALTH AND SUBSTANCE USE PREVENTION, TREATMENT, AND RECOVERY; TREATMENT SERVICES FOR UNHOUSED INDIVIDUALS; AND ASSISTANCE

FINDING APPROPRIATE SERVICES THROUGH COMMUNITY-BASED ORGANIZATIONS, GOVERNMENTAL ENTITIES, AND OTHER OPTIONS; AND SHALL THE REVENUES AND THE EARNINGS ON THE INVESTMENT OF THE PROCEEDS OF SUCH TAX, REGARDLESS OF AMOUNT, CONSTITUTE A VOTER APPROVED REVENUE CHANGE; ALL IN ACCORDANCE WITH BOARD OF COUNTY COMMISSIONERS' RESOLUTION NO. 2025-038?

2. The Board shall take further action to finally certify the ballot measure and ballot title, together with any others that may be approved, to the November 4, 2025 general election ballot on or before September 5, 2025.

A motion to approve this Resolution 2025-039 was made by Commissioner _____, seconded by Commissioner _____, and passed by a _____ vote.

ADOPTED this ____ day of _____ 2025.

BOARD OF COUNTY COMMISSIONERS
OF BOULDER COUNTY:

_____
Marta Loachamin, Chair

_____
Claire Levy, Vice Chair

_____
Ashley Stolzmann, Commissioner

ATTEST:

Clerk to the Board: _____