



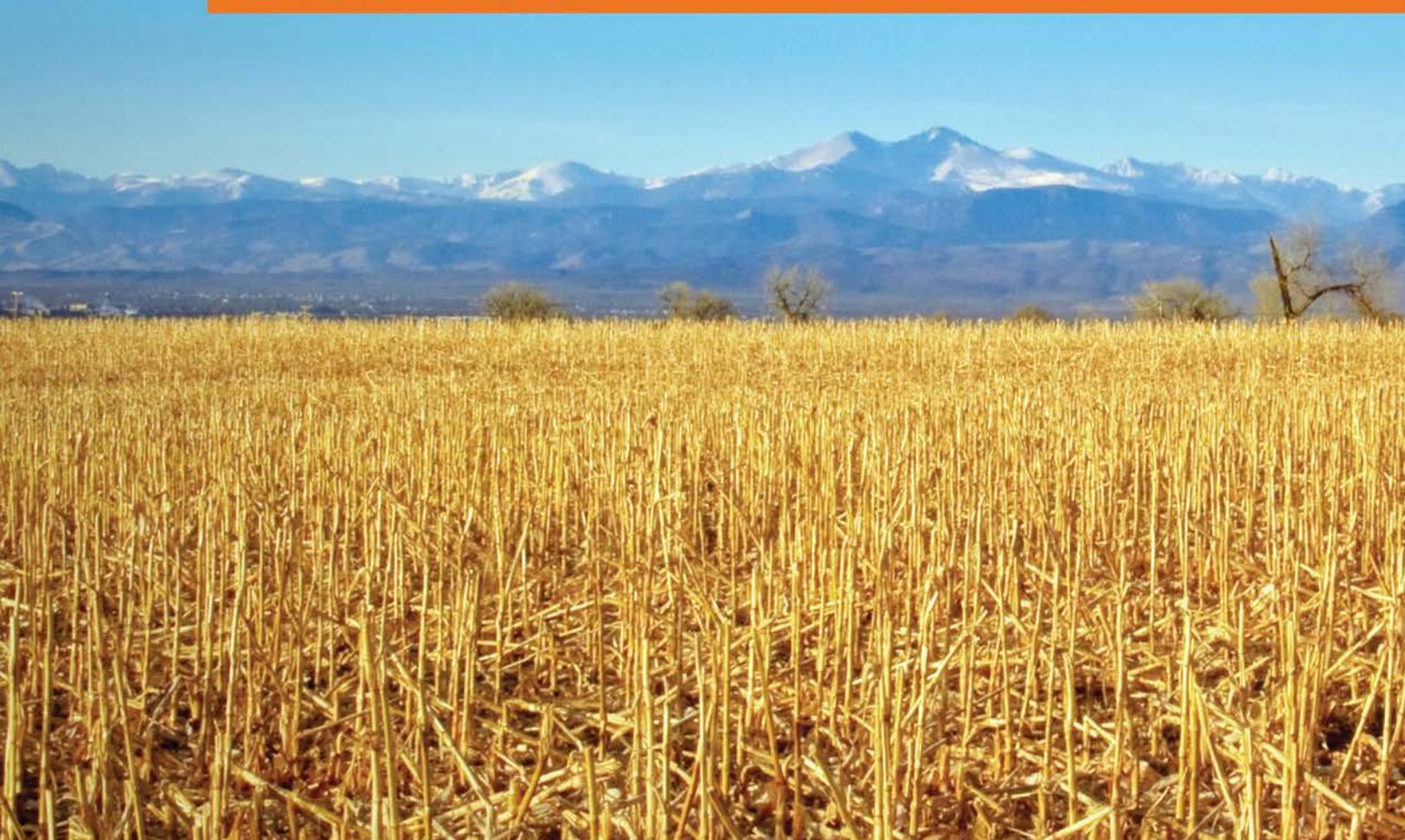
**COLORADO**  
Department of  
Transportation

# 2040 | Regional Transportation Plan

March 2015

## Upper Front Range

*Transportation Planning Region*





All photos provided by CDOT except where noted. Cover photo by David Kingham © Creative Commons, 2.0 Generic via Flickr.

# Contents

---

Letter from the Transportation Planning Region Chairman ..... iii

**Chapter 1** Transportation Planning in the Upper Front Range ..... 1

**Chapter 2** Existing Conditions and Trends..... 9

**Chapter 3** Project Prioritization..... 19

**Chapter 4** Transportation Needs and Revenue..... 27

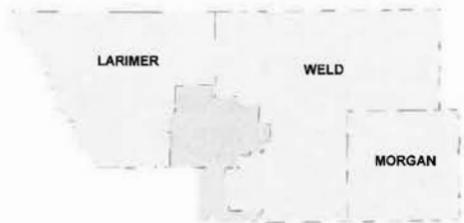
**Chapter 5** Implementation Actions and Moving Forward ..... 35

---

This page is intentionally left blank

**UPPER FRONT RANGE  
TRANSPORTATION PLANNING REGION**

P.O. BOX 758  
GREELEY, COLORADO 80632



**October 30, 2014**

**A Message from your Upper Front Range Transportation Planning Region Chair**

As Chair of the Upper Front Range Transportation Planning Region (TPR), representing Larimer, Morgan and Weld counties, it is my responsibility to ensure that our area's transportation needs and priorities are recognized, made easily accessible, and communicated to the public and key transportation decision-makers. This Regional Transportation Plan (RTP) accomplishes this. The RTP recognizes current needs and priorities, while formulating solutions to keep pace with regional growth and changing conditions.

The Upper Front Range TPR began transportation plan development in May of 2013. This document is the result of TPR member input; broad public sentiment as reflected in online and printed surveys and responses to questions in the telephone town hall; and various types of data and information.

A RTP that reflects the overall priorities and needs for our area is vital at a time of limited funding for transportation. This RTP will help inform decisions the Colorado Transportation makes about state's transportation system.

This RTP has been developed in tandem with the Colorado Department of Transportation's Statewide Transportation Plan. This plan will be integrated into the Statewide Transportation Plan, demonstrating the important role that transportation in the Upper Front Range region plays in the overall state transportation system. For example, transportation needs and priority corridors identified in this plan have been rolled up into the statewide plan.

This plan is intended to be a living, useful document that is referred to when transportation decisions are being made and as the TPR implements the action items listed in the final chapter of the RTP. This RTP will be revisited periodically by the TPR and others to ensure that we are on the right path toward accomplishing the vision and goals set forth in this plan.

Your familiarity with our region's transportation needs, priorities, and the challenges that we face are important now and into the future. I invite you to review this plan and become more engaged in the Upper Front Range's transportation future.

Sincerely,

A handwritten signature in cursive script that reads "Barbara Kirkmeyer".

Barbara Kirkmeyer  
Chair, Upper Front Range TPR

**LARIMER COUNTY**  
COMMISSIONER TOM DONNELLY  
SUZETTE MALLETTE, ENGINEERING  
(970)498-7002

**WELD COUNTY**  
COMMISSIONER BARBARA KIRKMEYER  
ELIZABETH RELFORD, PUBLIC WORKS  
(970)356-4000, EXT 3748

**MORGAN COUNTY**  
COMMISSIONER BRIAN MCCRACKEN  
RICHARD EARLY, ASPHALT & BRIDGE DIRECTOR  
(970)542-3500

---

This page is intentionally left blank

# Chapter 1

## Transportation Planning in the Upper Front Range

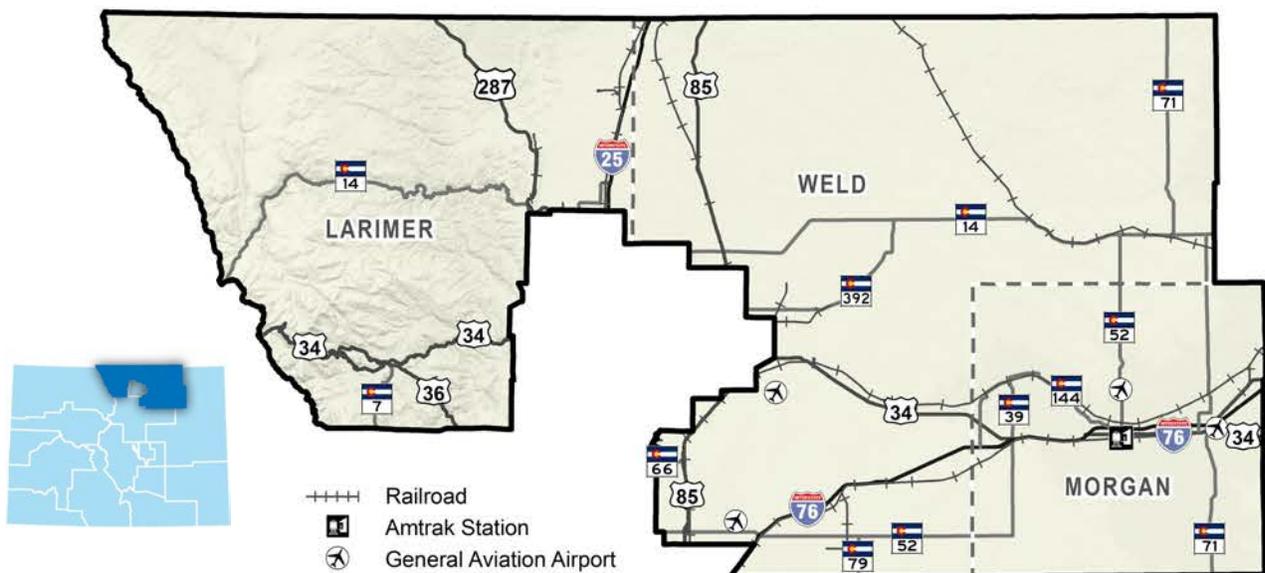
Transportation planning matters to all Coloradans. Transportation is a critically important element for creating and sustaining the level of economic vitality and quality of life for which Colorado is known. Transportation planning provides the framework for investment in the transportation system. Since transportation is closely tied to the quality of life and economic vitality of the Upper Front Range Transportation Planning Region (TPR), it is important to assess future needs and identify solutions to keep pace with growth and changing conditions.

Federal and state legislation and policies guide the development of the Regional Transportation Plan (RTP). Perhaps more importantly, however, the stakeholders of the region provide input on needs, solutions, and priorities for tailoring the RTP to the Upper Front Range TPR.

### Planning Area Description

While influenced by growth of adjacent urban areas outside of the region—including Denver, Fort Collins, and Greeley—the Upper Front Range TPR includes predominantly rural areas of Larimer and Weld Counties, and all of Morgan County. Located in north-central Colorado, the Upper Front Range represents a variety of geographic and social characteristics. The plains of the eastern portion of the region consist of productive agricultural land and booming oil and gas activity. The western portion of the region is mountainous and a home to widely popular tourist destinations. Transportation planning must incorporate all of these unique regional characteristics and develop a comprehensive strategy for preserving and enhancing mobility for people of the region.

*The Upper Front Range TPR encompasses Larimer, Morgan, and Weld Counties. Areas in the center and to the south, not included in the Upper Front Range TPR, consist of the North Front Range Metropolitan Planning Organization (MPO) and the Denver Regional Council of Governments (DRCOG).*



## What is a Regional Transportation Plan?

A Regional Transportation Plan creates the transportation vision and framework for maintaining and improving all modes of transportation in the region, including motor vehicle, air travel, transit, rail, bicycle, and pedestrian. It identifies transportation improvement goals, strategies, and priorities that support the TPR's economic vitality, environmental sustainability, and quality of life.

## Purpose of the Plan

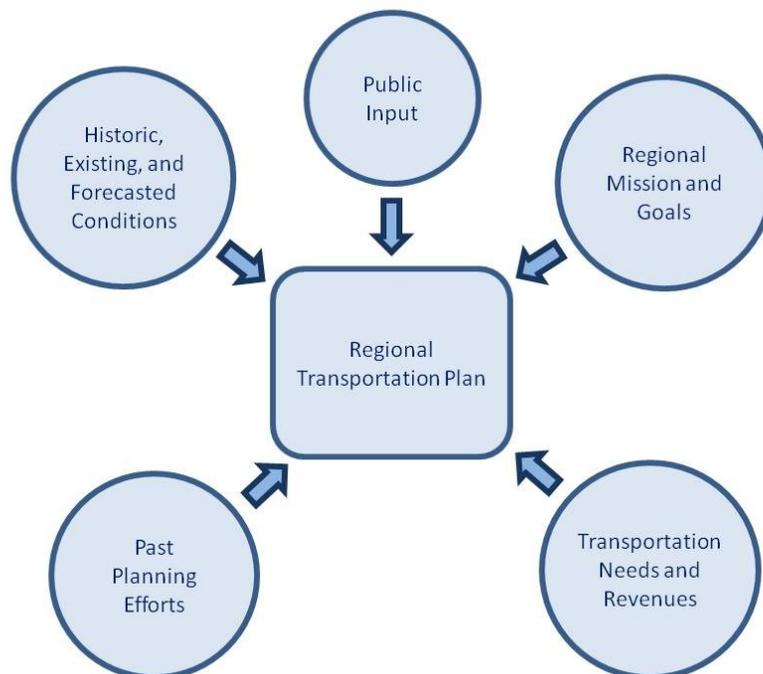
The purpose of the Upper Front Range TPR's RTP is to provide guidance and direction for decision-making related to maintenance and improvement of the state highway system that will contribute to the economic vitality and quality of life in the TPR. It allows people of the Upper Front Range to communicate their needs and desires for transportation, and in response, to understand what they can expect from the Colorado Department of Transportation (CDOT) for funding and completing projects.

The Colorado Transportation Commission and CDOT will refer to this document to assist in their planning and decision-making. With limited dollars available, it is important to have a plan that establishes transportation priorities for the Upper Front Range so that investments can be made in the region accordingly. The implementation mechanism for the RTP is the Statewide Transportation Improvement Program (STIP), a capital improvement program that identifies which transportation projects have been approved for funding. The STIP is based on RTPs developed by each region to establish a direct link between the corridor-based transportation needs and priorities expressed in the RTP and the selection and funding of specific system improvements.

The RTP showcases the mission, goals, and priorities identified by the citizens of the TPR for their transportation system for a set timeframe, in this case through the year 2040. All modes of transportation are addressed separately and with a similar planning process, including motor vehicles, transit, rail, bicycles, pedestrians, aviation, and freight. This RTP outlines project and funding priorities for the state highway system in the TPR. It also identifies solutions that address transportation issues via projects, initiatives, and partnerships.

The intent of the RTPs and the Statewide Transportation Plan is for them to be "living" documents that can be used for easy reference by TPR members and other interested parties. Plans will be monitored regularly for progress against proposed implementation action items.

## Components of a Regional Transportation Plan



## Planning History

The first RTP developed by the Upper Front Range TPR was completed in 1994, setting a planning horizon of 2015. In the year 2000, an Executive Committee comprised of TPR County Commissioners and staff from CDOT committed to making regular updates to the RTP. The agreement between the Executive Committee stated:

*Recognizing the need for the transportation planning process to be dynamic, the Upper Front Range Regional Planning Commission commits to a complete update of the RTP at least once every five years and will also establish a process through which the RTP can be amended on an annual basis.*

This plan is the fifth complete update to the RTP since that first effort in 1994 and now extends the planning horizon through the year 2040. So as to retain the outcomes of plans that preceded this RTP, previous plans were considered an important starting point for this planning process.

## Development of the Plan

The 2040 RTP for the Upper Front Range TPR was developed and adopted by the TPR through a concerted approach that combines previous planning efforts, data analysis, and performance-based measures with comprehensive stakeholder and public involvement.

### Federal and State Regulations

Legislation and policies at the state and federal levels require the development of a comprehensive, long-range, Statewide Transportation Plan that encompasses a 20-year period and incorporates the priorities and the needs of the TPRs across the state. The current federal transportation legislation, the Moving Ahead for Progress in the 21st Century Act (MAP-21), was signed into law in July 2012.

MAP-21 promotes a streamlined, performance-based, and multimodal program to **address the many challenges facing the nation's transportation system. Performance targets** are to be specified in statewide plans to assess system performance, assist with investment decisions, and track progress. The Statewide Transportation Plan also must be financially feasible according to state law so that it portrays a realistic transportation future based on reasonably anticipated funding. In Colorado, RTPs are prepared to include supplemental revenue scenarios and priorities in case additional funds become available.

MAP-21 requires that states develop other transportation plans in conjunction with the Statewide Transportation Plan. These are:

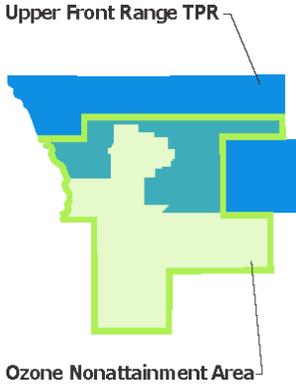
- Strategic Highway Safety Plan—The multi-agency plan will include key emphasis **areas to address the “4 Es of Safety”, education, engineering, emergency services,** and enforcement.
- Statewide Freight Plan—The plan must list projects that improve freight movement to be eligible for increased federal match (95 percent rather than 90 percent). For TPR goals, see page 28.
- Risk-Based Asset Management Plan—States can lose up to 35 percent of their **federal transportation funding if they don't develop and implement plans to** maintain their transportation assets (roads, bridges, culverts, walls, etc.).

To read more about federal and state transportation goals and planning factors, refer to [CDOT's planning website](#).

## Transportation Planning Commission

State law enables officials from the counties and municipalities within a non-urban TPR to form a TPR through an intergovernmental agreement. Comprised of elected and appointed officials from counties and municipalities, each TPR is responsible for establishing regional priorities and needs, developing the multimodal RTPs, and coordinating ongoing planning with CDOT. TPRs serve as a valuable means of communication between local communities within the TPR and a critical link in transportation planning and programming processes. Refer to page 5 for more information on the TPR participants.

**Denver-North Front Range  
Ozone Nonattainment Area**



*Portions of the Upper Front Range are within the Denver-North Front Range ozone nonattainment area. Planned roadway improvements within this area are assessed for conformity within the State Implementation Plan.*

**Air Quality Conformity Determination**

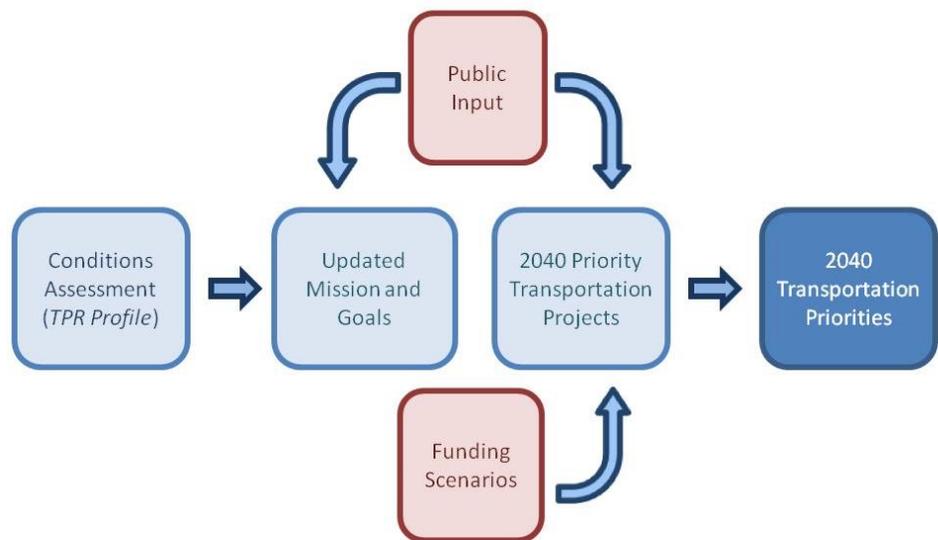
Large portions of Larimer and Weld Counties are part of the 8-hour ozone nonattainment area. A “nonattainment area” is a geographically defined area where air pollution levels persistently exceed National Ambient Air Quality Standards, standards set forth by the Clean Air Act. This area was designated as a nonattainment area by the Environmental Protection Agency (EPA) in late 2007 and includes the seven Denver metropolitan counties. A State Implementation Plan was adopted in 2008 to bring the area back into compliance. The nonattainment status requires that any transportation plans or programs perform a conformity determination.

A Memorandum of Agreement (MOA) was established in March 2008 that assigned the conformity determination responsibility to DRCOG and the North Front Range MPO. For a copy of the MOA, refer to CDOT’s website. Per the agreement, DRCOG will perform the conformity determinations on behalf of the Upper Front Range for the southern subarea and the North Front Range MPO will perform the work for the northern subarea. The Upper Front Range TPR works in coordination with both DRCOG and the North Front Range MPO in the development and adoption of the conformity determinations.

A conformity determination is anticipated to be performed for this RTP in the spring of 2015. The conformity determination will demonstrate that implementation of the Upper Front Range RTP will not cause any new violations of the air quality standard, increase the frequency or severity of violations of the air quality standard, or delay the timely attainment of the standard or any interim milestone. The results of the conformity determination will be accessible on CDOT’s planning website when the findings have been published.

**Upper Front Range RTP Planning Process Components**

In developing the RTP for the Upper Front Range, the region evaluated the current and predicted future conditions of the region’s transportation system and identified problems and potential solutions. Anticipated changes in the region’s population, economy, and travel were considered so that future transportation investments are sensitive to changing conditions in the region. Key elements in developing the plan include: updating the region’s transportation mission and goals, developing a list of



---

priority projects for the region, evaluating future transportation revenue and investment scenarios, and integrating the RTP with other modal plans and the Statewide Transportation Plan, as described later in this section. Action items have also been identified to provide direction for future decision-making and to monitor progress as the RTP is implemented.

## Participants

Creation of the RTP was accomplished via public outreach and a series of six meetings with the Upper Front Range TPR. TPRs are responsible for establishing regional priorities and needs, developing the multimodal RTPs, and coordinating ongoing planning with CDOT. They are charged with approving the RTP by considering public input, performance data, and other factors that influence transportation in the region. Others involved in development of the RTP include:

- The Upper Front Range Regional Transportation Planning Commission
- Colorado Transportation Commissioners
- CDOT—Region 4
- CDOT—Division of Transportation Development—Planning
- Colorado Office of Economic Development and International Trade (OEDIT)

Summary of Meeting Discussion Topics:

- Plan Development Process and Timeline
- Regional Transportation Mission, Goals, and Strategies
- RTP Template
- Public Outreach Approach
- Current and Projected Conditions
- Regional Priority Projects
- CDOT Policy

Members of the Upper Front Range TPR:

- |                       |                       |                            |
|-----------------------|-----------------------|----------------------------|
| • Larimer County      | • City of Fort Morgan | • Town of Log Lane Village |
| • Morgan County       | • Town of Gilcrest    | • Town of Mead             |
| • Weld County         | • Town of Grover      | • Town of New Raymer       |
| • Town of Ault        | • Town of Hillrose    | • Town of Nunn             |
| • City of Brush       | • Town of Hudson      | • Town of Pierce           |
| • Town of Erie        | • Town of Keenesburg  | • Town of Platteville      |
| • Town of Estes Park  | • Town of Kersey      | • Town of Wellington       |
| • City of Fort Lupton | • Town of Lochbuie    | • Town of Wiggins          |

## Public Engagement

The purpose of public engagement is to create meaningful opportunities for the general and traveling public to learn about statewide and regional transportation issues and comment on transportation concerns and priorities. CDOT uses several techniques to gain feedback from the public and to develop the framework, strategies, and priorities for deciding how much money might be invested in highways, transit, rail, and other programs. The public's input also influences the selection and scheduling of specific projects in the future. The following methods were used to help inform the public and seek feedback. Results of the public engagement process are below.

### Public Survey

A survey was offered via the Statewide Transportation Plan's website so that the general and traveling public could provide valuable feedback about priorities in the TPR. The survey was available statewide and had a section that was specific to the Upper Front Range TPR. In addition to being available electronically, the survey also was available in hard copy format. The survey was promoted through social media, email blasts, and word of mouth by the TPR members. A total of 38 survey responses were received from the Upper Front Range TPR.

#### Why is transportation important to you?

- #1 Moves people and goods safely
- #2 Gets me to work and/or vital services
- #3 Helps economic development; helps me live my life the way I want
- (tie)**

#### What transportation issues matter most to you?

- #1 Improving roadway pavement condition
- #2 Reducing congestion
- #3 Increasing bike/pedestrian options

#### What do you feel makes your region unique?

- #1 Rural living with nearby amenities
- #2 Sense of community
- #3 Tourism
- #4 Agriculture
- #5 Urban amenities

### Telephone Town Hall

A telephone town hall is an interactive public meeting conducted over the telephone. On May 21, 2014, residents in the Upper Front Range TPR were called on the phone and invited to participate in a discussion with local leaders and CDOT staff. This created a valuable connection with members of the public who otherwise might not be involved. The Town Hall was promoted on the radio and in local newspapers as well as via social media. A total of 3,251 people participated in the call and provided comments.

What is most important to you about transportation?	How should CDOT invest limited dollars?	What kinds of transportation improvements can best help the economy in your area?
<b>38%:</b> Safety  <b>23%:</b> Gets me to work or vital services	<b>54%:</b> Maintain the existing system  <b>30%:</b> More travel options	<b>30%:</b> Better bus or rail service to support tourism  <b>25%:</b> Improving pavement

## Other Public Engagement Tools

Several other methods were used to share information with the public and allow for dialogue outside of formal engagement. These included popular social media applications and an interactive website.

### **www.ColoradoTransportationMatters.com**

This is the interactive website dedicated to the development and presentation of the Statewide and RTPs. The information it provides allows the public to explore topics on their own schedule and based on their own interests. There are multiple ways the public could provide feedback via the website, including emailing questions or comments and uploading photographs.



### **Facebook and Twitter**

The use of social media throughout the plan development process provided opportunities for the public to learn about and comment on the RTP as it was created. Facebook and Twitter profiles were deployed to solicit feedback, but also to promote upcoming public events and other opportunities for robust public involvement.



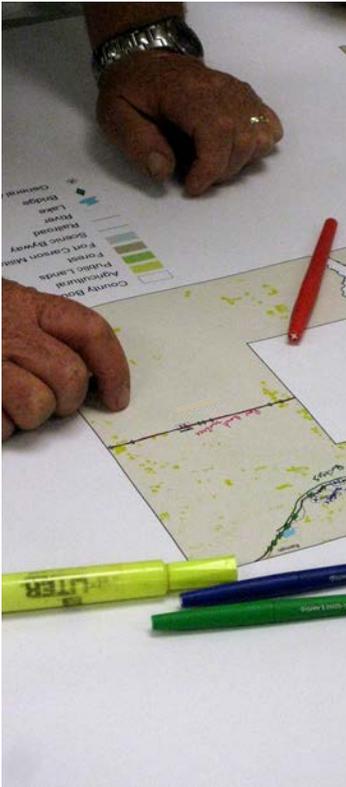
## Environmental Stakeholder Engagement

The link between transportation planning and the environment is of the utmost importance. Stakeholder engagement during the planning process that facilitates input on key environmental issues or concerns can serve as foundational information for future National Environmental Policy Act (NEPA) studies and aid in streamlining documentation.

In accordance with state and federal regulations, CDOT conducted a statewide interagency environmental discussion to identify environmental concerns or issues with the Regional Priority Corridors. Key participants included state and federal agencies, TPRs, and MPOs. These discussions were conducted via two webinars: the first focused on purpose, intent, and a collaborative identification of key information to be presented, and the second focused on interagency input. Based on the input provided, examples of potential mitigation strategies could include: wildlife crossings designed to reduce vehicular collisions, habitat conservation for threatened or endangered species, and construction of sound barriers.

Outreach to environmental advocacy groups also was conducted via a webinar. Information was shared about the development of the Statewide Transportation Plan and RTPs, how CDOT is addressing state and federal planning factors, development of various modal plans and policies, and key initiatives. One of those initiatives is the CDOT Sustainability Program that includes: (1) collaboration with the Colorado Energy Office, the Regional Air Quality Council, and other groups to develop a market and infrastructure for compressed natural gas and other alternative fuel vehicles; (2) creation of a greenhouse gas model; and (3) innovations in design and construction.

During development of the RTP, corridor profiles were modified to include environmental characteristics and concerns and to develop any environmental implementation actions if desired. For further information on environmental stakeholder participants and corridor profiles, go to CDOT's planning website. To review implementation actions identified by the TPR, go to **Chapter 5, Implementation Actions and Moving Forward**.



## Integration of Other Plans and Initiatives

The RTP for the Upper Front Range TPR is one of 10 rural RTPs in the state. While these RTPs, along with plans for the five urbanized areas, are stand-alone documents, they also are key components of the Statewide Transportation Plan. In this way, the **needs and priorities identified at the local level can be considered in the state's** transportation planning and decision-making process.

Maintenance, preservation, and operation of the transportation system are critical elements that contribute to the long-term sustainability of economic vitality and quality of life in the TPR. To ensure all elements and modes of transportation are considered, the 2040 RTP for the Upper Front Range TPR was developed with the following plans and initiatives in mind:

### **Plans that support a statewide multimodal transportation system:**

- RTPs
- MPO Plans, such as those developed by the North Front Range MPO and DRCOG
- Colorado Statewide Transit Plan
- Upper Front Range Regional Coordinated Transit and Human Services Plan
- Statewide Bicycle and Pedestrian Plan
- Colorado Aviation System Plan
- County and local Comprehensive Land Use or Transportation Plans

### **Plans that support the economic vitality of the state:**

- Colorado State Freight and Passenger Rail Plan
- Statewide Freight Plan
- Colorado Airports Economic Impact Study

### **Plans that assist in identifying maintenance needs for the existing transportation infrastructure:**

- Risk-Based Asset Management Plan
- Colorado Bridge Enterprise 10-Year Program Plan

### **Plans that aim to get more out of the existing system by focusing on traveler safety and operational improvements:**

- Strategic Highway Safety Plan
- Integrated Highway Safety Plan
- Transportation System Management and Operations Plan

These plans are available on CDOT's planning website.

# Chapter 2

## Existing Conditions and Trends

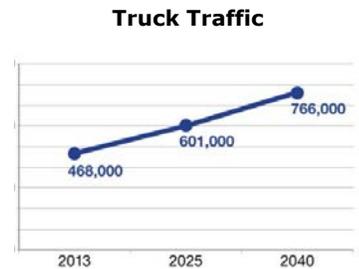
The RTP for the Upper Front Range takes into account several recent events and long-term trends. Existing conditions for the TPR include population growth; economic development in tourism, oil and gas production, and agriculture; the increasing occurrence of wildfires in the mountainous areas of the region; and the devastating floods of 2013. The sections below describe regional trends that affect the **transportation system of the Upper Front Range and develop the region's priorities as identified in an established mission statement and goals for 2040.**

### Economic Vitality

Because of the diverse geographies of the Upper Front Range, the top industries range from popular tourist attractions of Estes Park and Rocky Mountain National Park in the west, to energy production and agriculture in the eastern portions of the region. According to the U.S. Census of Agriculture (2007), counties in the Upper Front Range are the top agricultural producers in the state. Weld County alone is ranked number one in the state for its production of agricultural goods and number three in the nation for animal products, including livestock and dairy sales. All counties in the region have experienced growth in agricultural production in the past and are expected to do so in the future. To accommodate growth in these industries, the region must have an efficient transportation system to facilitate freight movement.

Energy production in the region is equally as important to the continued economic vitality of the TPR. In 2013, more than 43 percent of the oil and gas drilling permits issued in the state of Colorado were for locations within the Upper Front Range (Colorado Oil and Gas Conservation Commission, 2014). Energy production industries rely on roads to be able to move freight to specific locations in the region. Across the region, truck traffic currently makes up 14 percent of the traffic, which is much higher than the statewide average of 9 percent. Much of this traffic is due to oil and gas production activities.

**Because the region's transportation systems serve as travel corridors for major employment and tourist destinations in adjacent areas, it is important to consider the economic activity of adjacent communities.** The transportation system of the Upper Front Range TPR supports through-traffic from Denver's metropolitan region and populous areas of the North Front Range MPO, as well as from agricultural areas in neighboring Eastern TPR. In 2012, the National Park Service reported that more than three million people visited Rocky Mountain National Park, many of whom accessed the park via the transportation system of the Upper Front Range (Source: National Park Service Visitation Statistics). During the peak months for visiting the park, July through September, many roads in and around the park become congested with tourist traffic. The region is home to four designated Scenic Byways, including Cache la Poudre-North Park Byway, Pawnee Pioneer Trails, Peak to Peak Highway, and Trail Ridge Road.



*The region is expected to experience significant growth in daily truck traffic. By 2040, the daily vehicle miles traveled (VMT) by trucks in the region will increase by 64 percent. (Source: CDOT)*

*Oil and gas production is important for the economy in the Upper Front Range and has an impact on the transportation system through the movement of extracted products. (Photo: Bo Insogna © Creative Commons, 2.0 Generic via Flickr)*

## Multimodal Transportation System

The multimodal transportation system in the Upper Front Range TPR includes state highways, airports, and rail lines. There are 1,686 lane miles of state highways, four general aviation airports, one passenger rail line, and approximately 8 local and human services bus providers within the Upper Front Range TPR (see Multimodal Transportation System At-A-Glance).

### Multimodal Transportation System At-A-Glance

**1,686** lane miles—7.3 percent of the state highway system

**3.4** million vehicle miles traveled (VMT) per day on state highways—4.4 percent of state VMT

**4** general aviation airports: Easton Valley View, Brush Municipal Airport, Fort Morgan Municipal Airport, Platte Valley Airpark

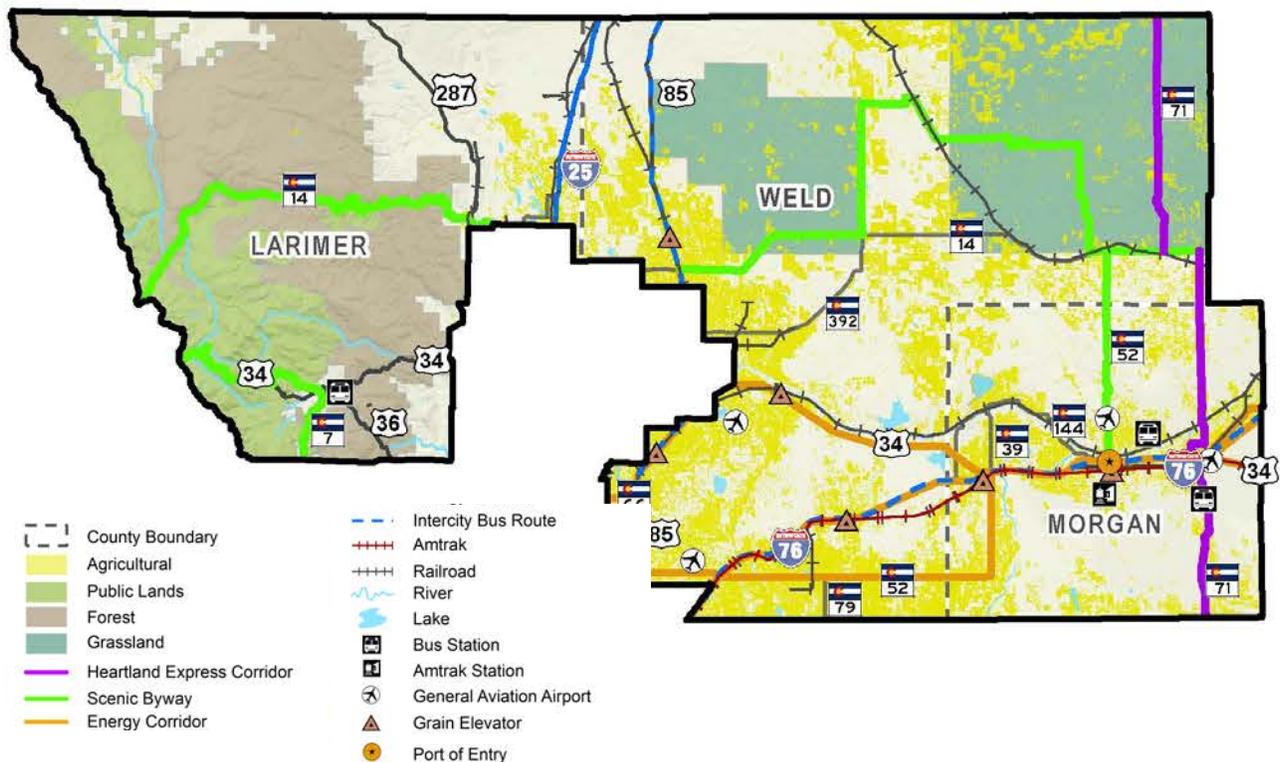
**8** local/human services transit providers

**Amtrak** passenger rail service

**3** intercity/regional bus providers:

- NECALG—County Express: serving Morgan County in the Upper Front Range; Logan, Segwick, Phillips, Washington, and Yuma Counties
- Town of Estes Park
- Via Mobility Services: serving Larimer and Weld counties and the Town of Estes Park in the Upper Front Range; Adams, Arapahoe, Boulder, Broomfield, and Gilpin counties

Source: CDOT

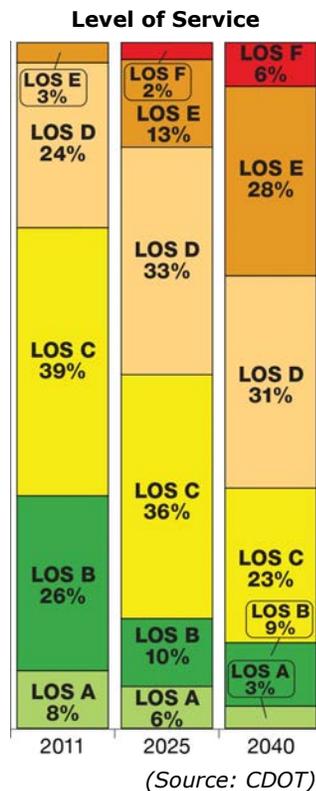


## Population Growth

The population of the Upper Front Range TPR is expected to grow approximately 2.1 percent annually through the year 2040 (from 95,300 residents in 2010 to 177,000 residents by 2040). This is a slightly higher growth rate than the statewide annual average of 1.5 percent. People 65 years of age or older make up the fastest growing segment of the population, both in the Upper Front Range and statewide.

## Traffic

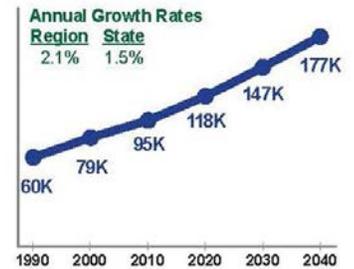
Traffic, in general, is growing in the TPR. Between 2011 and 2040, the vehicle miles VMT in the TPR is estimated to grow at an annual rate of 1.8 percent. This is higher than the 1.6 percent rate anticipated for the state. Due to this growth, several highways in the TPR are expected to become congested by the 2040 horizon year.



Roadway Level of Service (LOS) is a measure of congestion delay. It can be thought of as a grading scale, where LOS A is excellent and implies high levels of mobility and ease of maneuverability. LOS F represents failure and indicates that the road is experiencing heavy traffic volumes, significant congestion, and stop-and-go conditions. LOS A through LOS D are considered acceptable.

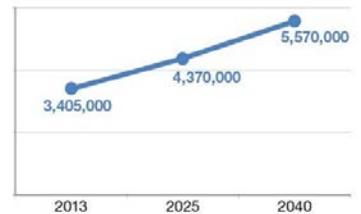
The adjacent figure and the map on page 12 provide details on predicted traffic conditions in the TPR. Some congestion exists on the state highway system today in the TPR. However, by the year 2040, about 34 percent of state highways in the region are projected to be congested. Most of this congestion is expected to occur on US 36 and US 34 through Estes Park and on I-76 and US 85 through areas adjacent to the DRCOG and North Front Range MPOs.

## Population



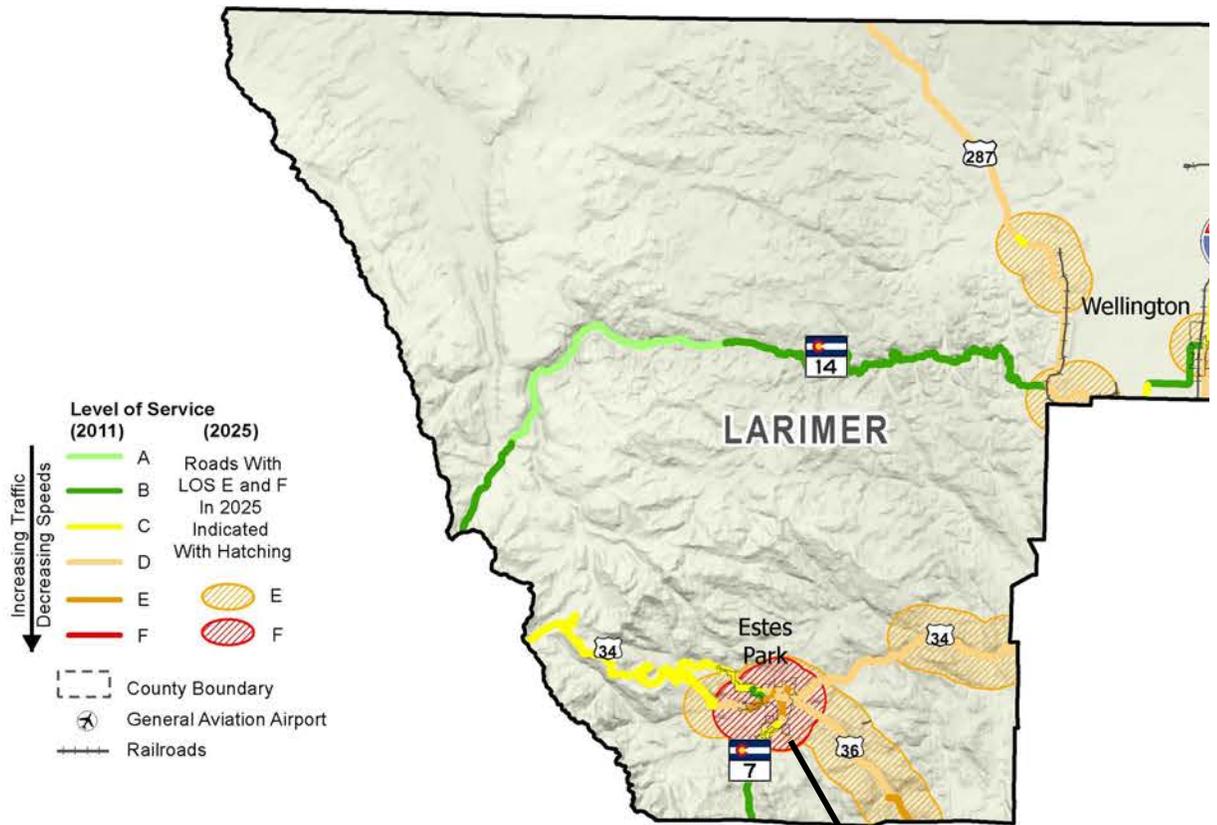
*Population in the Upper Front Range TPR is expected to grow at a slightly higher rate than the rest of the state. The region's population is expected to increase by 61 percent by 2040 compared to today. (Source: Colorado Department of Local Affairs)*

## Vehicle Miles Traveled

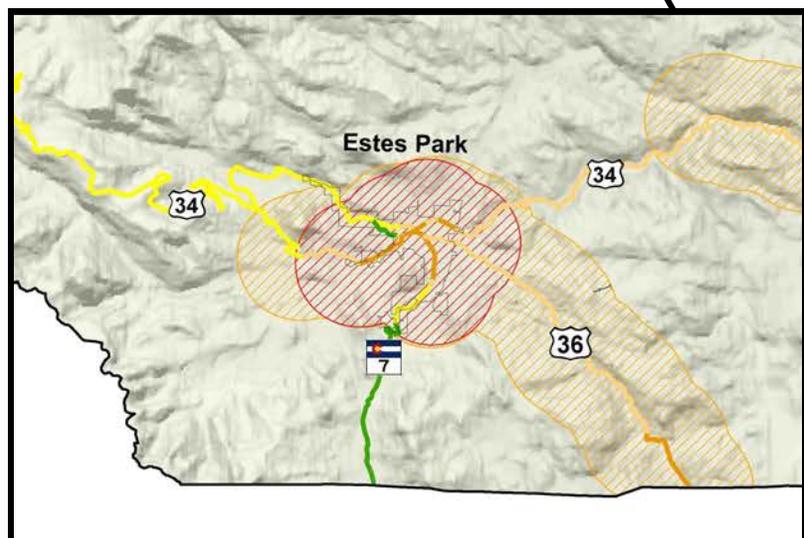


*Between 2011 and 2040, the VMT in the TPR will grow at an annual rate of 1.8 percent. (Source: CDOT)*

## Existing and Future Traffic Congestion in the Upper Front Range TPR



*In the next 10 years, the congestion is expected to occur on US 34 and US 36, particularly within Estes Park as well as along SH 52 in Hudson and Fort Lupton. (Source: CDOT)*





## Roadway Drivability and Bridges

Characteristic of rural regions, the Upper Front Range TPR has a high ratio of highway lane miles relative to its population and traffic. The TPR's population makes up 1.0 percent of the state of Colorado, yet it has 6.9 percent of the state highway lane miles and 1.5 percent of the annual VMT in the state.

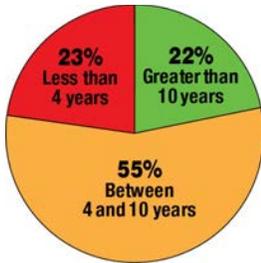
### Drivability Life

Pavement condition is described in terms of drivability. Drivability is a function of roadway smoothness, pavement distress, and safety. Drivability life (DL) is an indication, reported in years, of how long a highway will have acceptable driving conditions.

A DL of greater than 10 years may be considered high DL, while a highway with a DL of less than four years is considered a low DL. A DL is considered moderate when it is between four and 10 years. In the Upper Front Range TPR, approximately 77 percent of highways have a DL of high or moderate, while approximately 23 percent of highways have a low DL.

DL will improve the system by taking a more consistent and pragmatic approach to surface treatment. This means strategically utilizing limited surface treatment funds to maximize cost-benefit and minimize unacceptable driving conditions. Unacceptable driving conditions mean drivers have to reduce speeds to compensate for unsafe factors, navigate around damaged pavement, or endure rough rides. By reporting pavement conditions using DL, CDOT is able to identify which roadways will reach unacceptable driving conditions and then determine the most appropriate method of repair. The DL method also will proactively direct financial resources toward maintaining pavement to extend the life of a road and avoid or delay more costly rehabilitation or reconstruction. DL will result in a statewide network with the most drivable roads, due to routine surface treatment, across the entire pavement network.

### Drivability Life

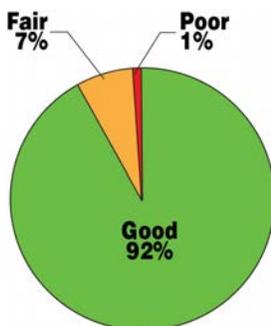


*In the Upper Front Range TPR, approximately 77 percent of highways have a DL of high or moderate, while approximately 23 percent of highways have a low DL. (Source: CDOT, 2014)*

### Bridges

The TPR's transportation system has 249 bridges owned by CDOT, according to 2014 CDOT data. Bridge condition in the TPR is good, with 99 percent of bridges being in good or fair condition. The small number of bridges rated as poor are operational and safe, but may not meet current design standards or are weight restricted.

### Bridge Condition



*(Source: CDOT, 2011-2013)*



*Bridge C-15-U in Big Thompson Canyon*

## Highway Safety

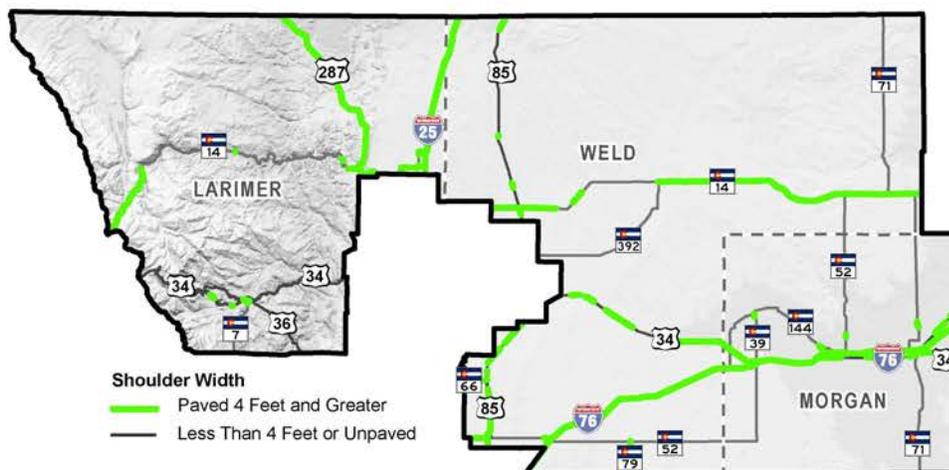
With increasing traffic and population growth, enhancing safety for travelers is a top priority of the TPR. In general, safety issues are related to several factors: the presence of slow-moving vehicles, high travel speeds, rail crossings, and wildlife on the roads. Highway crash rates and crash types are some of the indicators used by the region for understanding regional transportation safety trends. In the Upper Front Range TPR, the average crash rate was 0.99 crashes per million vehicle miles traveled for 2010–2011, which is lower than the overall state average rate of 1.70 crashes for the same period. The top crash types for this same period include rollovers, rear-end impacts, and wild animal collisions.

Maintaining railroad crossings is particularly important for safety in the Upper Front Range. There are 58 crossings within the TPR; a majority of these are in Weld County (62 percent), Morgan County has 26 percent of crossings, and Larimer County has the remaining 12 percent. Out of the total crossings, 19 percent are reported to be in “fair-poor” or “poor” condition. Characteristics that commonly make up poor conditions include rough approaches to a rail crossing, ruts in the roadway adjacent to rail lines, and severe wearing of crossing panels. These conditions present both safety and mobility issues for motorists, since they can cause damage to passing vehicles and potentially cause crashes at rail crossing locations.

Bicycle use on state highways is another important safety consideration for the Upper Front Range. In the region, bicycling is primarily for tourism and recreational purposes. Bicyclists often use shoulders where off-street facilities are not present. In western portions of the TPR surrounding tourism destinations, such as the town of Estes Park and Rocky Mountain National Park, bicyclists use the highway system to exercise and enjoy the natural surroundings.



*At-grade crossing equipment and issues of safety and security are among the Upper Front Range TPR's priorities for improving the rail system.*



*A paved shoulder four feet or greater provides added safety for vehicles. Slow-moving and oversized loads create a need for passing lanes and shoulders. Many highways in the region have sufficient shoulder widths, yet several gaps exist—particularly on US 85 and mountainous portions of the region in Larimer County. (Source: CDOT)*

## Disaster Response and Recovery

The Upper Front Range TPR includes locations that were massively impacted recently by wildfires and floods. These events have drastically increased the need to improve road conditions in the region.

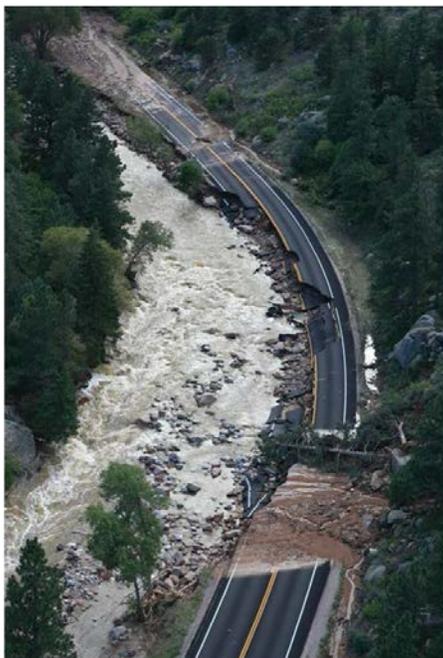
In June of 2012, the High Park Fire burned 87,000 acres of Larimer County, becoming the second largest wildfire in Colorado history. The burned hillsides are now a major concern for debris, sediment, and mudslides during rain events, which can overtop roads and clog culverts. Larimer County has invested nearly \$1 million in culvert enlarging projects and bank stabilization.

In the fall of 2013, devastating floods caused the closure of 486 miles of state highway and caused damage to more than 200 state bridges and culverts, not to mention substantial damage to homes and locally owned infrastructure. Damage to the transportation system ranged from debris on roads to long sections of highways that were completely washed out. Over 140,000 cubic yards of debris was removed from the affected area.

Major transportation projects that resulted from the flood recovery effort include:

- US 34 in the Big Thompson Canyon
- US 36, Lyons to Estes Park
- SH 7, Lyons to SH 72
- SH 39
- SH 71
- SH 72 through Coal Creek Canyon
- US 34 from east of Greeley to Kersey

Effects of these and potential future disasters have a direct impact on regional mobility, economic vitality, and the livelihood of the communities in the Upper Front Range. CDOT is working with the Federal Emergency Management Agency and local agencies to develop a program for increased resiliency in repairs and replacement of damaged roadways.



*Flooding caused severe damage to state and local roads. Although some of the most extensive damage occurred to roadways through mountain canyons (left), as flood waters moved east, roads and bridges in the plains were impacted as well. SH 66 is shown below.*



## Recent Accomplishments

The transportation system is constantly changing in the Upper Front Range TPR. Several projects completed since the prior TPR plan addressed transportation needs identified in the region, including:

- US 85: North of Rockport (\$10.7M)—bridge structures and surface treatment (pictured below left)
- I-76: Fort Morgan to Brush (\$35.9M)—slope flattening, paving, structure replacement (pictured below right)



## Key Takeaways

The Upper Front Range TPR is unique in many ways. The following takeaways and features have been identified as key considerations in the preparation of the RTP's recommendations for improving the transportation system. These factors are important to the region and have been key factors in developing the region's mission statement and goals listed on the following page.

- The region serves as a transition between urban, rural, and mountain rural environments—traffic patterns support commuters, tourists, freight, and local daily traffic.
- Booming agriculture and energy industries raises new issues of access and increasing impacts of freight on local roads and the highway system.
- The region is focused on safety considerations where slow-moving traffic is present and passing lanes and shoulders are lacking.
- The floods and fires in recent years have forced the region to replace several key transportation assets and to prioritize disaster mitigation and emergency preparedness.

## 2040 RTP Mission Statement & Goals

### Mission:

*The Upper Front Range TPR will work together to provide a multimodal transportation system that promotes economic vitality.*

### Goals:

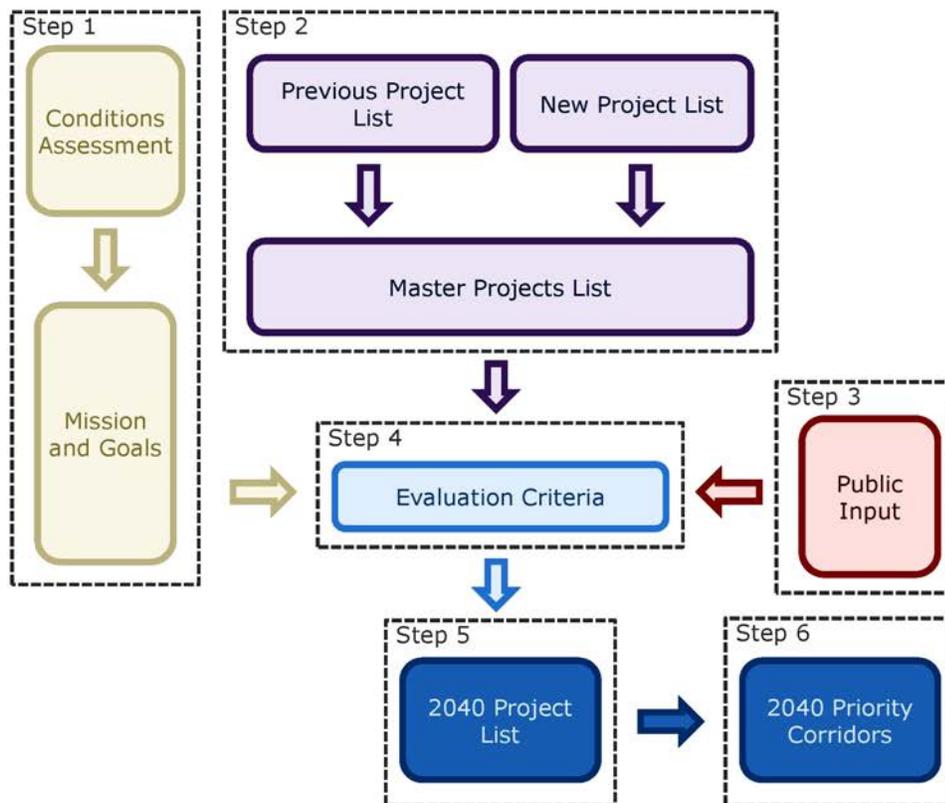
- Improve safety throughout the transportation system.
- Provide a multimodal transportation system for the efficient movement of people and goods.
- Preserve the functional integrity of the existing transportation system and correct identified deficiencies.
- Promote vibrant communities while preserving farm and forest land, water resources, and air quality.
- Further the creation of natural gas infrastructure and the use of compressed and liquefied natural gas and alternative transportation fuels.
- Support mitigation strategies to address potential natural disasters throughout the region.
- Prioritize projects to anticipate and utilize all funding opportunities.
- Deliver transportation system investments cost-effectively, incorporating life cycle costs.
- Collaborate and communicate with other agencies to implement regional transportation priorities.
- Integrate transportation and land use planning throughout system design and implementation.
- Coordinate projects with other entities within the region, including Rocky Mountain National Park, adjacent communities, TPRs, and states.
- Engage the public throughout the development of the RTP and its implementation.

### Project Prioritization Process

TPR members and stakeholders identified priority projects during a series of meetings that included several steps and considerations. During the development of the RTP, the most pressing transportation issues and project needs were identified. This iterative process allowed the TPR to determine the relative importance of each project by the goals they had determined at the beginning of the RTP development.

The process for developing a list of highway projects for the Upper Front Range was **directly tied to the region's Mission and Goals and based upon the existing and expected needs of the region**, as described in Chapter 2. The process for developing a prioritized list of projects included the following steps:

1. Assess existing conditions and develop the mission and goals for the TPR
2. Identify incomplete projects from previous planning processes; add new projects to create a master list
3. Share information with the public and gain feedback
4. Develop project evaluation criteria to score each project
5. Rank projects relative to all projects on the master list
6. Develop a list of priority corridors



---

## Preliminary Identification of Potential Projects

Projects were preliminarily identified by CDOT and by members of the TPR. CDOT provided a list of projects that were at one time identified by the TPR as a priority, but remain incomplete. New projects were added to the project list by TPR members based on input provided by the public. A list of non-state highway system projects also was gathered during this process. These projects were not prioritized, but are included as **an appendix to the RTP and are included on CDOT's planning website.**

## Development of Project Evaluation Criteria

After all of the region's priority projects had been gathered, regional projects were scored based on how well they met evaluation criteria, each of which is related to the goals established by the Upper Front Range TPR. The six primary evaluation criteria developed, and their definitions, are listed below:

- **Economic vitality**—The project supports economic development in regional industries, including agriculture, energy, and tourism.
- **Safety**—The project minimizes a safety issue (range of hazardous conditions from crash rate performance to perceived safety issue).
- **Mobility**—The project creates new travel options and increases connectivity and system continuity.
- **Transportation system integrity**—The project improves a condition related to pavement DL and LOS related to the asset management program.
- **Land use**—The project is integrated with existing and planned land uses.
- **Cost effectiveness**—The project meets more goals for the lowest cost.

The addition of two evaluation criteria will serve as a "bonus" for projects as they relate to specific strategies of the Upper Front Range TPR. These are:

- **Alternate fuels**—The project supports the development of natural gas infrastructure and the use of compressed and liquefied natural gas fuels.
- **Disaster mitigation**—The project addresses potential natural disaster events.

## Weighting of Evaluation Criteria

It was recognized that the relative importance of each criterion could be different for each project. Therefore, a weighted system was developed by the Executive Board for **each criterion based upon the TPR's priorities and values (see below)**. Scoring guidelines were prepared to provide guidance on how a project should be scored—with scores ranging from 0 to 3 for each criterion. These scores then were multiplied by the assigned weight for each criterion and summed to obtain the total points for a project. The weighted points then were used to rank projects within each project category. The safety, economic vitality, mobility, and transportation system integrity criteria generally have the highest weights, representing the highest priorities for the region.

<b>Evaluation Criteria</b>	<b>Assigned Weight</b>
Economic vitality	20
Safety	25
Mobility	20
Transportation system integrity	20
Land use	5
Cost effectiveness	10
<b>TOTAL</b>	<b>100</b>
Alternate fuels	Bonus +15
Disaster mitigation	Bonus +15



*The Upper Front Range is the top agricultural producer in the state. The sale of livestock is among the agricultural activities that contribute to the economic vitality of the TPR. (Photo: Charles Miles © Creative Commons, 2.0 Generic via Flickr)*

## Ranked Project List

After projects had been scored per the weighted evaluation criteria, the projects were sorted into a ranked project list. The **outcome of the project prioritization process was a list of 68 regional highway projects, included as an appendix on CDOT's planning website.** This list of projects is not intended to dictate the exact order of funding and implementation of transportation projects. Instead, the list will provide guidance to decision makers as they communicate the relative importance of particular transportation planning issues and projects in the future. The top 20 projects prioritized by the region are:

ID	Road	County	Location	Project Description	Rank
A	I-76	Weld	SH 52 Interchange	Interchange reconstruction	1
B	I-76	Morgan	I-76 MP 92.61—MP 101.5	Reconstruction	2
C	US 287	Larimer	<b>Ted's Place to Wyoming Border</b>	Passing lanes and other safety improvements	3
D	US 85	Weld	US 85 Frontage Road	Relocation/realignment improvements (Priorities in Platteville, Gilcrest)	4
E	US 34	Morgan	US 34 and CR 16, Morgan County	Intersection improvements	5
F	US 36	Larimer	US 36 Estes Park to Boulder County Line	Major widening/passing lanes/pullouts	6
G	US 287	Larimer	US 287 at SH 14— <b>Ted's Place</b>	Intersection improvements	6
H	US 287	Larimer	US 287 at CR 72 (Owl Canyon Road)	Intersection improvements	8
I	US 85	Weld	US 85 and WCR 18	Intersection improvement—safety/operations	8
J	SH 14	Larimer	SH 14: US 287 to Larimer County Line	Passing lane and geometric improvements	10
K	SH 392	Weld	SH 392 and WCR 43	Intersection improvements	10
L	US 34	Larimer	US 34/US 36 Intersection in Estes Park	Major widening/safety/traffic ops/TSM	12
M	US 34	Morgan	US 34 and CR 24	Intersection improvements	12
N	US 287	Larimer	US 287 and LCR 80C (West)	Intersection improvements (NB left)	14
O	US 34	Larimer	Estes Park	Safety and system preservation improvements in Estes Park	15
P	SH 39	Morgan	SH 39 North of Wiggins	Safety widening and shoulders	16
Q	SH 52	Morgan	SH 52 South of Wiggins	Safety widening and shoulders	16
R	I-76	Weld	WCR 49	Interchange improvements at WCR 49 in Hudson	16
S	US 85	Weld	US 85 and SH 60	Partial interchange	16
T	SH 1	Larimer	SH 1 and LCR 9—Meyers Corner	Intersection improvements	20
U	SH 1	Larimer	SH 1 and Douglas Road	Intersection improvements (signal and auxiliary lanes)	20
V	SH 52	Weld	SH 52	Access control plan	20
W	US 34	Morgan	Barlow Road	Intersection Improvements	20

---

## Identification of Priority Corridors

Corridor-based planning connects broad transportation policies to strategies, allows the evaluation of needs and performance on a larger scale, and links long-range transportation plans to the shorter-term STIP and the project priorities identified in this plan.

While all transportation corridors contribute to the system, some corridors connect to more towns and recreation and tourist destinations; carry more traffic; support the industries that contribute to the economic vitality of the region; and are critical routes for accessing otherwise isolated areas of the region. The following are priority corridors for the Upper Front Range TPR:

- I-25
- I-76
- US 6
- US 14
- US 34
- US 36
- US 85
- US 287
- SH 1
- SH 7
- SH 52
- SH 71
- SH 392

### Corridor Profiles

The Upper Front Range TPR has developed a corridor profile for each corridor in the region. Development of the 2030 and the 2035 RTPs included extensive work on the corridor profiles. The 2040 RTP builds upon those efforts by updating the corridor profiles to reflect the changes that have occurred since adoption of the 2035 RTP. Updated corridor profiles for the Upper Front Range are in an appendix to this plan and **are available on CDOT's planning website. The primary purpose of a corridor vision is** to look toward the future and describe how the corridor can meet the desired community and transportation needs. The elements of the profile include community values, primary type of travel, corridor characteristics, the industries it supports, and the types of improvements that will be needed in the future. The corridor goals describe general objectives that the corridor needs to obtain to meet the vision. The benefits describe discrete improvements that can be tracked and reported, then used to measure progress.

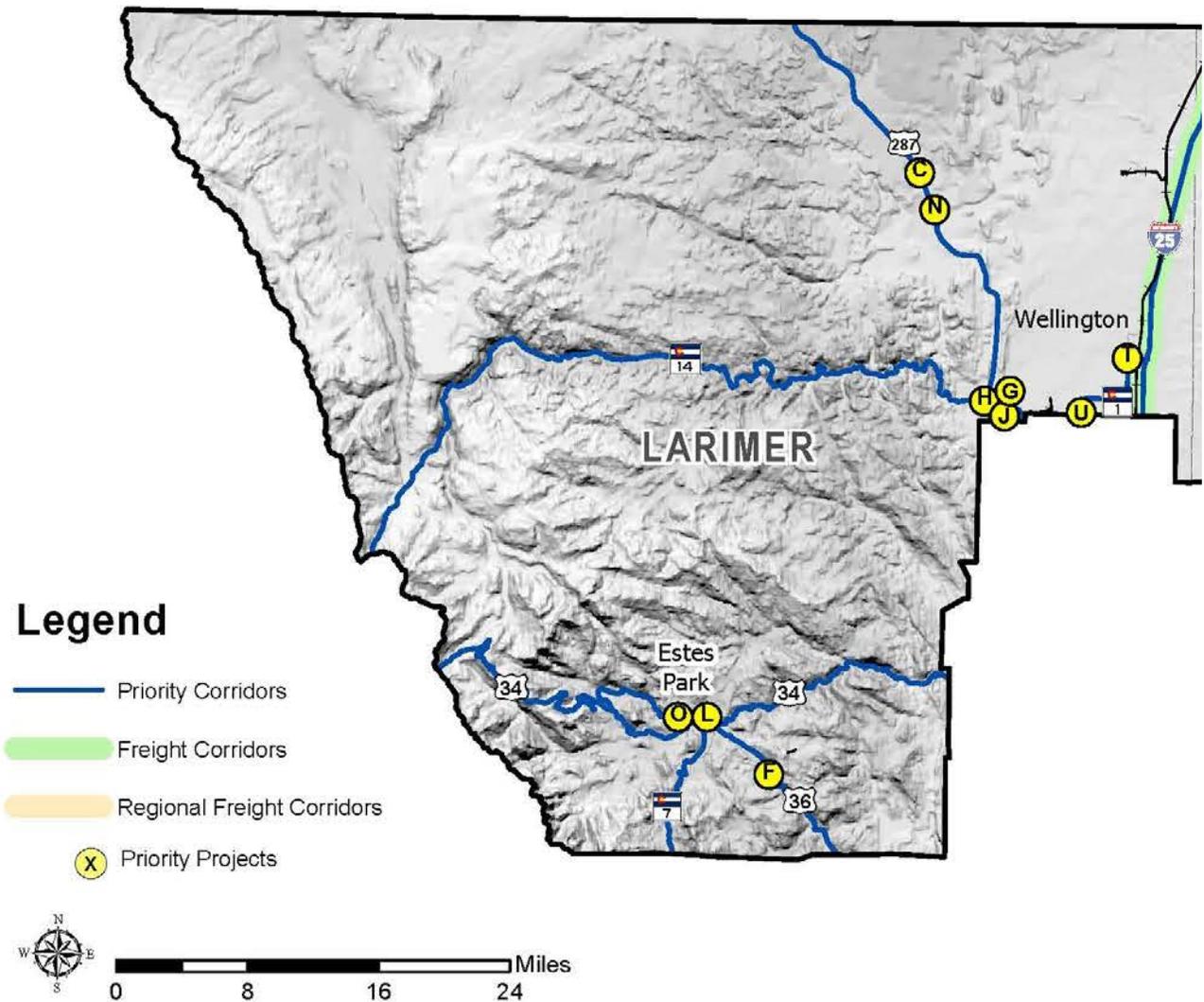
Corridor profiles assist CDOT with understanding the characteristics and transportation needs of the corridors. The benefits identified on the corridor profile sheets will be used to track progress on corridor goals after plan adoption.

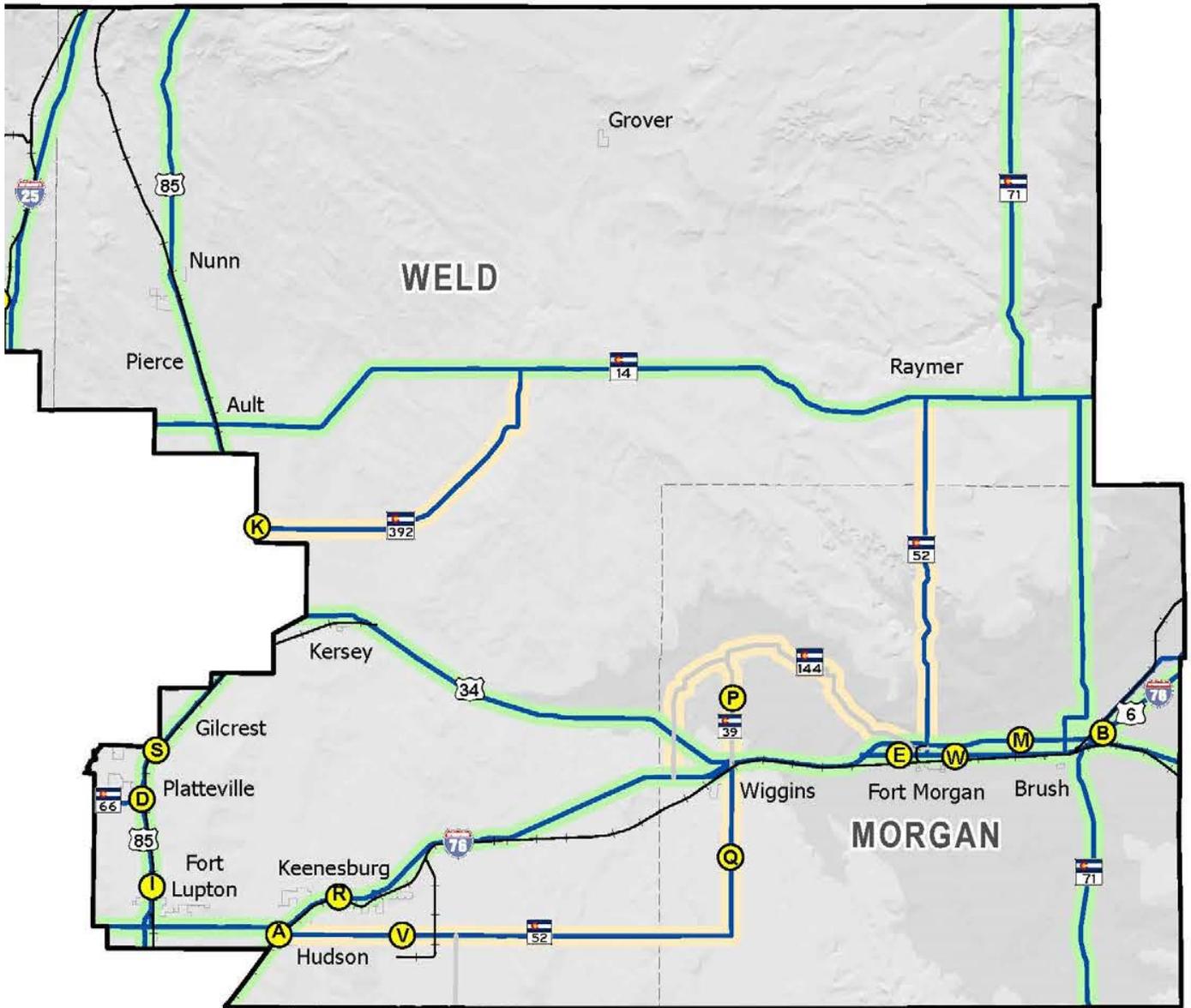
The identification of priority corridors and regional priority projects that are based upon **the TPR's goals will help assist the TPR to communicate their interests in improving the** regional transportation system. Additionally, the TPR is better able to apply funding scenarios and implementation strategies.

## Priority Projects and Corridors of the Upper Front Range TPR

Identification of priority corridors in this plan is an update to previously identified priority corridors in the 2035 RTP.

**Locations identified on the map refer to projects listed on page 22.**





---

This page is intentionally left blank

# Chapter 4

## Transportation Needs and Revenue

### Statewide Regional Priority Program Distribution

In the adopted program distribution, the Colorado Transportation Commission sets aside \$50 million per year statewide in Regional Priority Program (RPP) funding to distribute these funds to CDOT regions. The statewide formula for the distribution of RPP funds to the CDOT regions is based on a calculation of 50 percent population, 35 percent on-system lane miles, and 15 percent on-system truck VMT.

In this plan, the Upper Front Range TPR has identified a range of transportation needs through the year 2040 and has prioritized regional issues that are most important to the transportation system, particularly for the next 10 years. Because of the limited availability of funding for transportation, the TPR must have a plan that allows them to focus on those priorities that could be realistically accomplished, but also to have a contingency plan in case they receive more or less transportation funding. This chapter **lays out the process for applying available funding toward the region's list of priority transportation projects.**

This process is particularly important for the first 10 years of the planning horizon. Within this period, both transportation needs and funding availability are better understood. Beyond the RTP, the identification of priorities for the first 10 years will be used in the development of the STIP, a federally required, fiscally constrained program of projects.

### Upper Front Range TPR Priorities for Funding

Transportation funding comes from several sources, including the Regional Priority Program (RPP), Funding Advancement for Surface Transportation and Economic Recovery (FASTER), Surface Treatment, Bridge, and others, such as the FASTER Transit.

RPP is the most flexible funding source for CDOT Regions to use with input from the TPRs. RPP funding is intended to help the TPRs address their regional transportation priorities. The TPR expects RPP funding may be combined with other funding sources to fund individual projects.

CDOT Region 4 is projected to receive approximately \$11.0 million of RPP funding in FY 2016 and a total of \$110 million by the end of the first 10 years. This is split between the Upper Front Range TPR and other planning areas within CDOT Region 4, including the Eastern TPR, the North Front Range MPO, and DRCOG.

The Colorado Legislature passed FASTER in 2009 to provide additional funds for transportation, primarily through increased vehicle registration fees. FASTER funds used to improve safety and replace poor bridges. A provision in the legislation also designates the distribution of FASTER funds into the State Transit and Rail Fund. Grants to local governments for transit projects, such as new bus stops, bike parking, maintenance facilities or multimodal transportation centers, and transit projects of state and inter-regional significance are funded by the State Transit and Rail Fund.

### Baseline Revenue Scenario

The Baseline Revenue Scenario is a forecast of reasonably expected resources for CDOT as a component of the 2040 Statewide Transportation Plan. The Upper Front Range TPR discussed how RPP funds should be used to address transportation priorities with current statewide RPP funding expectations.

To increase the effectiveness of funding available to the region, the TPR decided to use the prioritized list of projects as the foundation for future decisions on how to program RPP funds. Because of the range of costs for projects included in the prioritized list, and because of uncertainty in expected funds available to the region, the TPR will remain flexible in how projects on the list are programmed—projects that receive **funding may not necessarily be the region's top priority. Instead, funding will be matched with projects based on cost and the potential for the project to receive other funding, such as FASTER or local funds.**

### Priority Project Costs

The costs of the priority projects in the Upper Front Range total more than **\$300 million**. (Shown below are the top 10 projects in priority order, which total nearly \$100 million). Under the Baseline Revenue Scenario, the TPR will select projects from the full prioritized list of projects considering their overall ranking among other priority projects.

Road	Location	Project Description	Cost (millions)
I-76	SH 52 Interchange	Interchange reconstruction	\$25.0
I-76	I-76 MP 92.61—MP 101.5	Reconstruction	\$25.0
US 287	<b>Ted's Place to Wyoming Border</b>	Passing lanes and other safety improvements	\$20.0
US 85	US 85 Frontage Road	Relocation/realignment improvements (Priorities in Platteville, Gilcrest)	\$6.0
US 34	US 34 and CR 16, Morgan County	Intersection improvements	\$0.6
US 36	US 36 Estes Park to Boulder County Line	Major widening/passing lanes/pullouts	\$8.0
US 287	US 287 at SH 14— <b>Ted's Place</b>	Intersection improvements	\$1.6
US 287	US 287 at CR 72 (Owl Canyon Road)	Intersection improvements	\$2.0
US 85	US 85 and WCR 18	Intersection improvement—safety/operations/TSM	\$0.6
SH 14	SH 14: US 287 to Larimer County Line	Passing lane and geometric improvements	\$10.0

### Less-Than-Baseline Revenue Scenario

The Less-Than-Baseline Revenue Scenario establishes a plan for less than expected revenue. With less money available, some CDOT programs—such as snow and ice removal, bridge maintenance, and roadway maintenance—could be reduced. The Upper Front Range TPR identified which CDOT programs should be prioritized in the event of less-than-expected revenues. The TPR determined safety to be a top priority. This recommendation will be one of the factors considered for future project selection should there be a decrease in funding available to the TPR for transportation improvements from any funding resource, including RPP. For example, safety could be weighted more heavily during a project prioritization process should this scenario occur.

### Additional Revenue Scenario

To prioritize improvements with the availability of additional funds, the Upper Front Range TPR will continue to use the prioritized list of projects for the region and will have the opportunity to program some of the high-cost projects at the top of the prioritized list.

## Regional Multimodal Needs

Multimodal issues and regional trends for the Upper Front Range TPR were considered throughout this planning effort. Highway needs are described in **Chapter 3, Project Prioritization**. Detailed needs for transit, aviation, freight, and rail have been developed through CDOT modal plans. All plans referenced below are available on [CDOT's planning website](#).

### Freight

Colorado freight corridors are roadways that are critical to the inter-regional, intra-state, inter-state, or national freight movement, and play an important role in the regional and state economy. The CDOT designated freight corridors in the Upper Front Range TPR are:

- I-25
- I-76
- US 34 (WCR 47.5 to Washington County Line)
- US 85
- US 287
- SH 14
- SH 71

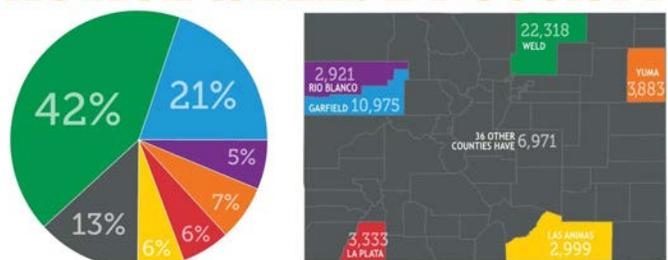
The Upper Front Range TPR also identified the following corridors as important to local and regional freight movement:

- SH 39
- SH 52
- SH 144
- SH 392

The Upper Front Range TPR boasts three of the top agriculture producing counties in the state. Additionally, Weld County accounts for approximately 80 percent of the oil and gas energy production and 23 percent of the wind energy produced in the state. (Sources: Colorado Oil and Gas Conservation Commission and Colorado Energy Office.) Our vision is to provide the road map our region and state needs to stay competitive and expand our economy.

Our vision is to provide the road map our region and state needs to stay competitive and expand our economy.

## OIL & GAS ACTIVE WELLS BY COUNTY



Source: Colorado Oil & Gas Conservation Commission, April 2015

Upper Front Range TPR freight goals are:

- Assess the condition and performance of the regional freight network.
- Identify highway bottlenecks that cause significant freight congestion.
- Forecast freight volumes.

- Identify emerging inter-regional freight corridors.
- Assess barriers to improved freight transportation performance.
- Identify routes providing access to energy areas.
- Mitigate the impacts of freight movement on communities.
- Provide a process for addressing multi-state projects and strategies to improve freight intermodal connectivity.

The Colorado Freight Plan contains a broad discussion of the Colorado Freight Corridors and measures to improve freight movement throughout the state. The freight plan has a statewide list of potential projects for the first year, but no costs are associated with the potential projects. Projects proposed in the Freight Plan address needs for intersection and geometric improvements, addition of pullouts and passing lanes, shoulder widening, and general safety improvements.

The Colorado Freight Plan was undertaken in response to MAP-21, which established a national freight policy to improve the condition and performance of the national freight network and to ensure that the national freight network provides the foundation for the United States to compete in the global economy.



*SH14 and WCR 29*

National freight policy goals are to invest in infrastructure improvements and to implement operational improvements that:

- Strengthen the contribution of the national freight network to the economic competitiveness of the United States
- Reduce congestion
- Increase productivity, particularly for domestic industries and businesses that create high-value jobs
- Improve the safety, security, and resilience of freight transportation
- Improve the state of good repair of the national freight network
- Use advanced technology to improve the safety and efficiency of the national freight network
- Incorporate concepts of performance, innovation, competition, and accountability into the operation and maintenance of the national freight network
- Improve the economic efficiency of the national freight network
- Reduce the environmental impacts of freight movement on the national freight network

#### Transit

Transit needs and services and funding gaps are described in the Upper Front Range Regional Coordinated Transit and Human Services Plan (2014). Transit needs include expanding existing operation and capital investments; establishing regional transit

---

services and coordination; and increasing coordination with railroads to explore rail transit opportunities.

A transit working group comprised of public and private transit agency representatives, elected officials, and others from the Upper Front Range TPR developed the following transit vision and goals:

*The transit vision for the Upper Front Range is to improve regional mobility for all residents through effective coordination, planning, and delivery of transit services.*

Transit Goals:

- Preserve and expand existing systems and infrastructure
- Provide regional connections
- Improve regional coordination
- Coordinate with rail

#### Local Roadways

Although this RTP does not contain specific guidance on prioritizing improvements on locally owned, off-system roads, the TPR made an effort to develop a list of local road needs to be used for future reference. In this list, TPR members included resurfacing projects, intersections, and safety improvements. Several of these projects have the potential to be regionally significant (i.e., widening of Weld County Road 49) and are important considerations for environmental and traffic impacts. A full list of off-system projects is provided on CDOT's planning website.

#### Aviation

Statewide estimates to fund aviation needs are detailed in the 2011 Colorado Aviation System Plan for the intermediate and minor general aviation airports within the Upper Front Range TPR. Improved emergency access and pavement maintenance are needs identified at the four general aviation airports in Fort Morgan, Brush, Platte Valley, and Eaton.

#### Rail

The Colorado State Freight and Passenger Rail Plan discusses statewide-level needs for rail improvements and includes cost estimates for making those improvements. As discussed in **Chapter 2, Existing Conditions and Trends** of this RTP, the safety issues surrounding railroad crossing are a high priority of the region. Other rail-related needs include a rail overpass at US 85 and O Street, a connection of the Union Pacific line with the Great Western in Greeley, and general safety and security improvements. Rail lines through the Upper Front Range are owned and operated by Burlington Northern Santa Fe (BNSF) and Union Pacific. Amtrak provides passenger service through Fort Morgan.

*Rail is important for the movement of freight and Amtrak passengers through the TPR. (Photo: M. Loughlin © Creative Commons, 2.0 Generic via Flickr)*



## Statewide Multimodal Needs

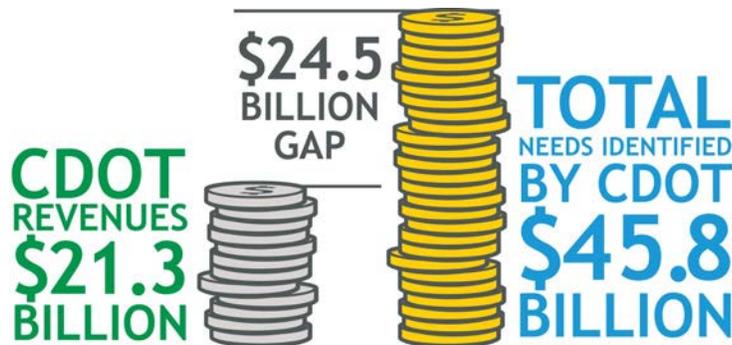
The needs and priorities that are identified at the regional level are combined with the needs of other regions to make up the transportation needs of the state. Concurrently developed with the RTPs, the statewide transportation planning process emphasizes multimodal needs made up of costs for highway, transit, freight, rail, aviation, and non-motorized modes of transportation for the first 10 years of the plan. The horizons for statewide planning match those of the regions (10-year and 25-year). Factors considered in identifying needs include: preserving transportation infrastructure and assets (i.e., pavement and bridges), addressing safety and operational concerns, and expanding the transportation system. Similar to the Upper Front Range TPR regional multimodal needs, the statewide transportation needs were derived from relevant data and stakeholder input.

The Colorado Transportation Commission considered variations of assumptions for projected future funding and adopted a statewide baseline revenue scenario as a forecasting tool for the 2040 Statewide Plan. Besides making reasonable projections for future revenues, good planning also requires preparing for when revenues are more or less than projected.

Future projections show baseline revenues will fall short of addressing all of the statewide transportation needs. Comparing cost estimates for statewide needs to the baseline revenue scenario reveals a funding gap. For the 10-year planning horizon, from 2016 until 2025, the gap between projected revenues and the estimated cost of transportation improvements needs is \$8.8 billion.

For the longer-term, 25-year planning horizon, the projected revenues are \$21.3 billion while the total identified needs are estimated to cost \$45.8 billion. This results in an approximate \$24.5 billion funding gap. CDOT will have to consider other revenue sources, such as public-private partnerships and tolling, to close this funding gap and fulfill future statewide transportation needs.

### 25-Year System Funding Gap (2016-2040)



Estimated amounts in 2016 dollars. Source: CDOT, 2014

## Statewide Revenue Scenario Planning

The 2040 forecast includes three revenue scenarios: baseline, additional, and less-than-baseline. The Colorado Transportation Commission adopted the baseline scenario as the expected revenue projection for the Colorado Statewide Transportation Plan (TC Resolution #3070). This statewide forecast forms the basis for projections of revenues for the TPR.

### Less-Than-Baseline Revenue Scenario

- No federal or state General Fund transfers

Under this scenario, revenues in 2016 would drop from \$1.4 billion to \$1.2 billion and then hold steady at about \$1.2 billion per year through 2040. **This represents an estimated 15-percent decrease from the Baseline Revenue Scenario.**

*Source: March 2014  
Transportation Commission  
Revenue Projection Packet*

### Baseline Revenue Scenario

- Based on current law and current economic assumptions
- Average annual National Gross Domestic Product increases by 2.5 percent
- Federal transportation revenues increase 1 percent per year for fiscal years 2016 to 2020.
- Federal revenues and General Fund transfers are adjusted from 2021 to 2040 to match the Congressional Budget Office (CBO) forecast
- Off-the-top transfers are based on CDOT projections
- Senate Bill 09-228 will create a transfer of funds to CDOT in fiscal years 2016 to 2020

Except for the brief addition of SB 09-228 funds during the time period from 2016 to 2020, baseline revenues are projected to be flat, at around \$1.3 billion per year, rising to just under \$1.4 billion per year in 2040. More recent forecasts of revenues, however, suggest that funds from SB 09-228 may be substantially reduced or eliminated. The latest forecast calls for only a little over \$100 million as compared to the nearly \$800 million over five years included in the Baseline Revenue Scenario.

*Source: Colorado Transportation  
Commission Resolution #3070*

### Additional Revenue Scenario

- Baseline revenue scenario
- SB 09-228 revenues anticipated in 2016 through 2020 would be replaced by some other revenue source of similar magnitude.

Under this scenario, revenues in 2021 would increase from \$1.3 billion in the Baseline Revenue Scenario to \$1.5 billion per year and increase to nearly \$1.6 billion in 2040. **This represents approximately a 10 percent increase from the Baseline Revenue Scenario over the period extending to 2040.**

*Source: March 2014  
Transportation Commission  
Revenue Projection Packet*

---

This page is intentionally left blank

# Chapter 5

## Implementation Actions and Moving Forward

The following discussion contains information about actions that the TPR will take to implement its RTP. Implementation actions are meant to be near-term, **practicable measures related to the Upper Front Range TPR’s vision, goals, and** corridor profile strategies and benefits. Actions presented below are likely to be initiated before the next update of the RTP and will have limited funding needs, focusing primarily on education, coordination, research, and advocacy. The following actions have been developed as a way for the RPC members to actively promote the RTP.

### Implementation Actions for the Upper Front Range TPR

Implementation Action	Applicable RTP Mission and Goals
Advocate for shoulder improvements as an effective safety measure.	Improve safety throughout the transportation system.
Continue to advance regional rail crossing improvements through regular updates to the rail inventory and crossing replacement program.	Improve safety throughout the transportation system.
Work with both agriculture and fossil fuel development industries to identify locations and specific problems hindering efficient movement of commodities.	Provide a multimodal transportation system for the efficient movement of people and goods.
Coordinate with tourism industry partners to identify transportation issues surrounding popular tourist destinations.	Provide a multimodal transportation system for the efficient movement of people and goods.
Identify agencies that would contribute to the implementation of regional transportation priorities, including the Colorado Farm Bureau, U.S. Department of Agriculture, State Highway Patrol, emergency response managers, Federal land managers, etc.	Collaborate and communicate with other agencies to implement regional transportation priorities.
Work with industry representatives to identify locations and opportunities for increasing the accessibility of alternate fuels.	Further the creation of natural gas infrastructure and the use of compressed and liquefied natural gas and alternative transportation fuels.
Work toward accomplishment of RTP freight goals. (See pages 28—29.)	Provide multimodal transportation system for the efficient movement of people and goods. Collaborate and communicate with other agencies to implement regional transportation priorities.

The actions discussed in this chapter will help achieve the benefits identified in the RTP corridor profiles as documented in **Chapter 3, Project Prioritization**. The corridor profiles for the Upper Front Range TPR are available for review on CDOT’s [planning website](#). These benefits include **aviation, pedestrian and bicycle, transit, capacity, economic development, environmental stewardship and sustainability, freight, operations, rail, safety, system preservation, and leveraging partnerships**.

In addition, the Regional Transit Plan identified several high priority transit strategies for implementation over the next 15 to 20 years to guide the region in making meaningful investments in transit. These strategies address the transit needs identified in region through surveys, Transit Working Group meetings and public input. Each strategy falls in line with the regional transit vision and goals, and supports the overall statewide transit vision, goals and objectives. Strategies include, but are not limited to coordination activities, maintaining, expanding and/or enhancing of transit service, and

facility improvements. For more information on the high priority transit strategies for the Upper Front Range TPR, please see the [Upper Front Range Regional Coordinated Transit and Human Services Plan on CDOT’s planning website](#).

## High Priority Transit Strategies for the Upper Front Range TPR

Regional Transit Goal	Transit Strategy
Preservation and Expansion of Existing Transit Systems and Infrastructure	<ul style="list-style-type: none"> <li>Maintain existing transit service levels and infrastructure for Northeastern Colorado Association of Local Governments (NECALG), the Town of Estes Park, and Via Mobility Services within their respective service areas.</li> <li>Expand service levels and infrastructure for Northeastern Colorado Association of Local Governments (NECALG), the Town of Estes Park, and Via Mobility Services within their respective service areas, as funds become available.</li> </ul>
Provide Regional Connections	<ul style="list-style-type: none"> <li>Implement regional service along US 85 connecting to the Regional Transportation District in the Denver Metro area. Estimated at 5 days per week, 3 round trips per day</li> <li>Implement regional service along US 34 connecting Estes Park with I-25. Estimated at 3 days per week (1,250 annual hours).</li> <li>Implement regional service along US 34 connecting Fort Morgan to Greeley. Estimated at 2 days per week (416 annual hours).</li> <li>Implement regional service along I-76 connecting Fort Morgan with Denver. Estimated at 3 days per week (624 annual hours).</li> <li>Provide service south on SH 71 connecting to I-70. Estimated at 1 day per week (416 annual hours).</li> <li>Explore the need and feasibility of other regional services and connections based on the outcome of the Intercity and Regional Bus Network Plan.</li> </ul>
Improve Regional Coordination	<ul style="list-style-type: none"> <li>Identify grant and other funding opportunities to maximize regional financial resources and coordination opportunities.</li> <li>Integrate private transportation providers into the regional transit network.</li> <li>Improve connectivity among local, intercity, and regional transit services and other modes through better sharing of information and schedules.</li> <li>Identify opportunities for coordination that focus on rural transit outside current service areas and rural Weld County.</li> <li>Perform a regional needs analysis to analyze service gaps and perform demand analysis to establish needs.</li> </ul>
Coordinate with Rail	<ul style="list-style-type: none"> <li>Begin discussions with railroads to identify opportunities for coordination.</li> </ul>

## Moving Forward with the RTP

After adoption of the RTP, the TPR will work with CDOT to develop activities that carry forward implementation actions. This will keep the plan actionable. In addition, regularly assessing progress on the plan based on these implementation actions can help the TPR decide whether to add or remove actions, as appropriate. **To find out about how you can get involved in the Upper Front Range TPR’s ongoing transportation planning process, please visit CDOT’s planning website.**