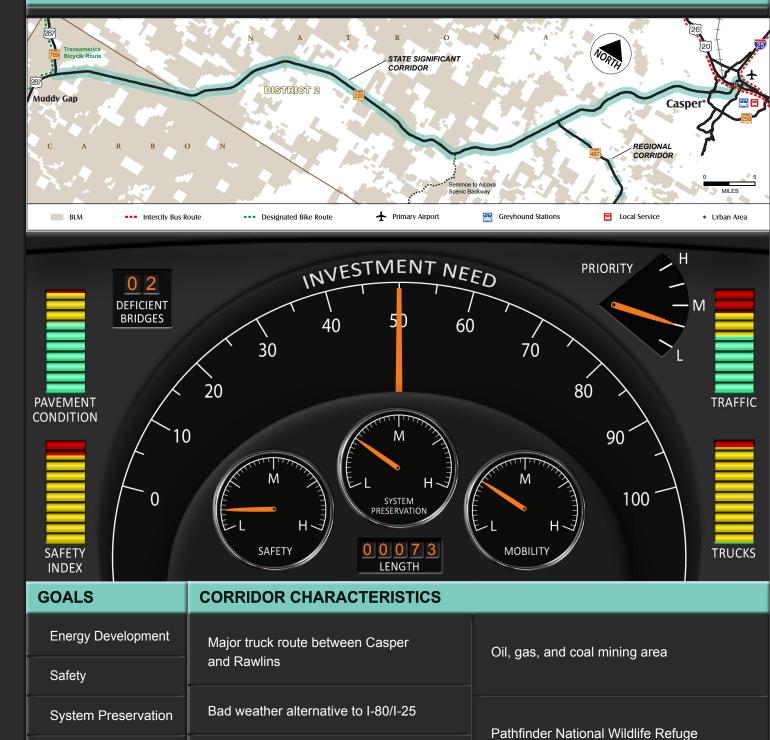




CORRIDOR 11

Muddy Gap to Casper WYO 220





PRIMARY INVESTMENT TYPE: SYSTEM PRESERVATION

Recreational travel

Trucks

The primary investment need on this corridor is to preserve the existing system, especially roadway surface conditions and the rehabilitation and replacement of deficient bridges. Increases in truck traffic will accentuate the resurfacing need. Additional investments in spot safety improvements should be investigated in the corridor plan, especially with respect to the relatively high percentage of trucks. Currently, two bridges are listed as deficient and should be programmed for rehabilitation or replacement.

CORRIDOR CHARACTERISTICS

Corridor Description

State Significant Corridor (SSC) 11, from Muddy Gap to Casper, is 73 miles long and passes through Carbon and Natrona counties in mostly plains or rolling terrain. It follows WYO 220 through the town of Alcova before entering Casper. WYDOT has considered major widening on WYO 220 to provide a safer route for the sometimes dangerous mix of tourists and trucks.

Environmental Context

WYO 220 lies along the famous Oregon Trail. The Rattlesnake Range and the Shirley Mountains are north of the highway. Martin's Cove, Devil's Gate, and Independence Rock are well-known landmarks along the Oregon Trail. Devil's Gate is a narrow passageway for the Sweetwater River as it travels the extreme north end of the Red Desert. Independence Rock, a famous resting stop known as "The Great Register of the Desert," is located along WYO 220 southwest of Casper. Pioneers inscribed their names into the rock, which can still be read today.

East of Independence Rock and south of SSC 11 is the Pathfinder Bird Refuge and Reservoir.

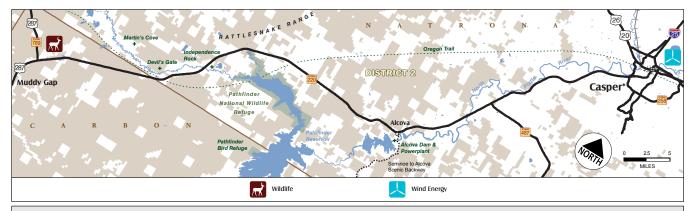
Pathfinder National Wildlife Refuge (NWR) was established in 1928 on Pathfinder Reservoir as a refuge and breeding ground for native birds. The Refuge wetlands provide feeding and resting areas for waterfowl during their annual migrations.

Located just south of the town of Alcova is the Alcova Dam and Powerplant. Located on the North Platte River about 30 miles from Casper, Wyoming, the reservoir covers 2,470 surface acres. WYO 220 parallels the North Platte which flows from the south, through Casper, and east along the northern reach of the Laramie Mountains onto the Great Plains.

Corridor Interests:

- Wildlife Connectivity,
 Habitat Fragmentation
- Cultural and Historic Resources

ENVIRONMENTAL CONTEXT



The above map identifies issues and environmental constraints that form the basis for environmental review. Future projects in the corridor will take these and other issues under consideration prior to final design.

Key Issues and Emerging Trends

Major Traffic Generators

- Energy industry Casper
- Truck route Rawlins to Casper
- Recreation traffic –
 Seminoe State Park and
 Reservoir, Pathfinder Bird
 Refuge and Reservoir,
 Alcova Reservoir
- 8 WYO 220 is a truck route between Casper (I-25) and Rawlins (I-80). The impact of the energy industries means that truck passing lanes, bridge repair or replacement, and preservation of the roadway condition will need attention.
- ₩YO 220 is used as an alternative route during road closures on I-80.
- This corridor is used for recreational access to the Alcova Reservoir, camping and fishing sites, and the Pathfinder Bird Refuge. Passing lanes, turnouts, and enhanced signage would improve conditions for recreational travel.
- Safety improvements are needed for roadway geometry, passing lanes, and sight distances.
- Safety improvements are needed on regional route WYO 487 and local route WYO 77, which connect to Medicine Bow and onto Laramie.
- 8- Several bridges are in need of rehabilitation or repair.

Goals & Strategies

Goals for the corridor represent issues communicated by participants in the planning process. These goals lay groundwork for the development of a financially feasible multimodal transportation plan designed to support the planning, engineering, construction, operation, and maintenance of the State's transportation system.

By identifying broad goals that are both visionary and practical, and that respond to the values of this region, the focus of future actions is readily identified. The goals are further defined with specific supporting strategies to attain each goal. For SSC 11, the impact of the energy industry on the road system was an important factor in determining goals. Goals focused on preserving the system and making improvements for the increasing number of trucks along this corridor.

GOALS	STRATEGIES		
	Surface treatment/overlays		
Plan for continuing energy industry impacts to road system	Reconstruction		
	Develop impact agreements		
	Auxiliary lanes if warranted (passing, turn, accel/decel)		
Reduce fatalities, injuries, and property damage crash rate	Rumble strips in high crash areas		
	Safety - general improvements		
Preserve the existing transportation system	Bridge rehabilitation/replacement		
Accommodate growth in truck freight transport	Truck passing lanes		

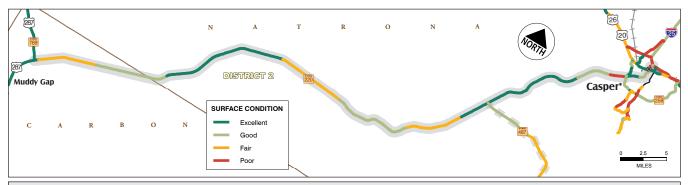
Primary Investment Type

SYSTEM PRESERVATION – The primary investment need on this corridor is to preserve the existing system, especially roadway surface conditions and the rehabilitation and replacement of deficient bridges. Increases in truck traffic will accentuate the resurfacing need. Additional investments in spot safety improvements should be investigated in the corridor plan, especially with respect to the relatively high percentage of trucks. Currently, two bridges are listed as deficient and should be programmed for rehabilitation or replacement.

Roadway Characteristics

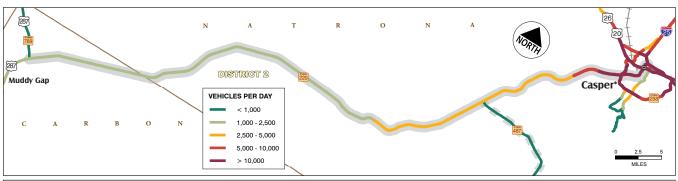
The following maps identify conditions on the corridor with respect to surface condition, total traffic, truck traffic, safety, and bridges. The data represent the most recent available and are subject to change over time as projects are completed or other factors affect existing conditions. The system data play a big part in determining current operating characteristics, the type of need, and the extent of improvements necessary to achieve corridor goals.

PAVEMENT SURFACE CONDITION



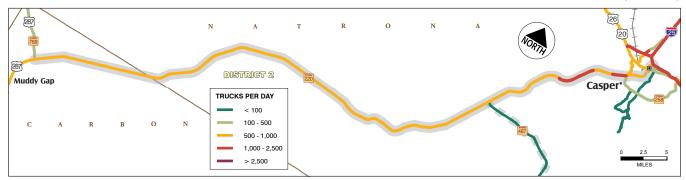
The pavement surface conditions on SSC 11 are rated good/excellent for 69 percent of the corridor. The rest of the corridor is rated Fair with the exception of a short segment entering Casper that is rated Poor.

AVERAGE ANNUAL DAILY TRAFFIC (AADT)



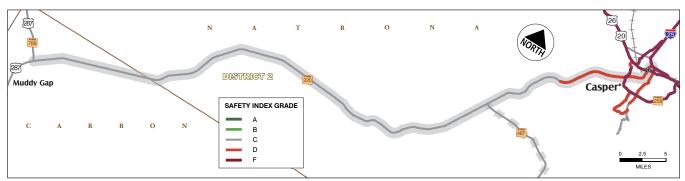
The AADT for the southwestern half of SSC 11 averages 1,000 to 2,500 vehicles per day (vpd). The AADT for the northeastern half averages 2,500 to 5,000 vpd and increase to over 10,000 vpd as it enters Casper.

AVERAGE ANNUAL DAILY TRUCK TRAFFIC (AADTT)



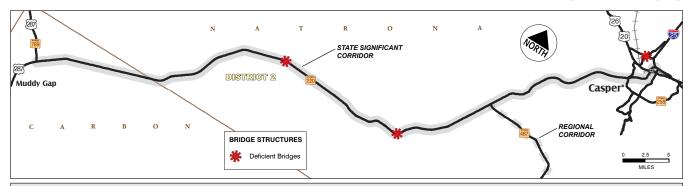
The truck traffic along most of SSC 11 averages 500 to 1,000 trucks per day. The truck traffic increases to 1,000 to 2,500 trucks per day entering Casper.

SAFETY INDEX



An 11 mile section of the corridor southwest of Casper has a below average Safety Index grade of D. This is about 15 percent of SSC 11.

DEFICIENT BRIDGES



There are two deficient bridges along SSC 11 located on WYO 220 between US 287/WYO 789 and WYO 487. All deficient bridges visible in the map window are displayed, regardless of designation as SSC, Regional, or Local Routes.

REGIONAL REFERENCE INFORMATION

REGIONAL ROUTES

WYO 487 is located 11 miles northeast of Alcova and heads south through the Shirley Basin to its intersection with US 30/287 in the town of Medicine Bow.

LOCAL ROUTES

LOCAL ROUTE COUNTY		FROM	то	
WYO 77	Carbon	WYO 487	WYO 487	

Source: Official State Highway Map of Wyoming

URBAN AREAS

Casper is the only urban area along SSC 11 and has a population greater than 5,000. Urban areas are discussed in detail in the Urban Corridors section later in the document.

INTERMODAL FACILITIES

Intercity Bus Routes

None

Class 1 Railroads

None

Public Transportation Agencies

PROVIDER AGENCY NAME	LOCATION	TYPE OF SERVICE	SIZE OF FLEET	ANNUAL PASSENGER TRIPS FY08	
Casper Area Transportation Coalition	Casper Area	Public; Fixed Route; Demand Response	19 Vehicles	173,874	

Source: WYDOT

DEMOGRAPHIC CHARACTERISTICS

SSC 11 passes through two counties: Carbon County to the south and Natrona County to the north. There are no cities or towns located along SSC 11 within Carbon County; however, Rawlins is located south of Muddy Gap, which generates a significant amount of track traffic to Casper.

Casper, Bar Nunn, Evansville, and Mills are in Natrona County, population 73,129, and are located at the north end of SSC 10. The major employment for Natrona County is Education & Health at 21 percent. Retail is second at 14 percent, and Arts & Recreation accounts for nine percent. Areas in this county have experienced significant growth in population, especially towns near Casper.

In 2006, Bar Nunn led the State of Wyoming with its population growth rate of 95 percent. The rapid growth in Bar Nunn and Natrona County has been attributed to the boom in Wyoming's energy sector. See Appendix B for more details about employment by county. See Appendix B for more details about employment by county.

POPULATION: 2000-2008					
COUNTY	CITY	2000	2008	% GROWTH	% STATE TOTAL (2008)
Carbon County		15,639	15,624	-0.1	2.9
	Baggs	348	400	14.9	
	Dixon	79	81	2.5	
	Elk Mountain	192	200	4.2	
Encampment		Х	452	2.0	
	Hanna	873	866	-0.8	
	Medicine Bow	274	267	-2.6	
	Rawlins	8,538	8,740	-3.0	
	Riverside	59	63	6.8	
	Saratoga	1,726	1,759	1.9	
	Sinclair	423	405	-4.3	
Natrona County		66,533	73,129	9.9	13.7
	Bar Nunn	936	1,828	95.3	
	Casper	49,644	54,047	8.7	
	Edgerton	169	176	4.1	
	Evansville	2,255	2,393	5.9	
	Midwest	408	435	6.6	
	Mills	2,591	3,143	11.0	

Source: Population Division, US Census Bureau, July 1, 2009

Airport Information

AIRPORT NAME (Associated City)	NPIAS ROLE & HUB TYPE ¹	NPIAS	WYDOT CLASSIFICATION (2008)	WYDOT CLASSIFICATION (FUTURE)	TOTAL AIRPORT OPERATIONS	BASED AIRCRAFT	TOTAL PASSENGERS (2006)
Natrona County International Airport (Casper)	P - N	NPIAS	Commercial	Commercial	61,297	85	146,813
Medicine Bow Airport (Medicine Bow) (non- paved)		Non- NPIAS	Local	Local	40	0	N/A

Notes: P - Primary Commercial Service, N - Non-hub Facility, GA - General Aviation

¹NPIAS (National Plan of Integrated Airport Systems) Role and Hub Type are same for both existing (2007) and 5-year federal forecast

Source: WYDOT and FAA