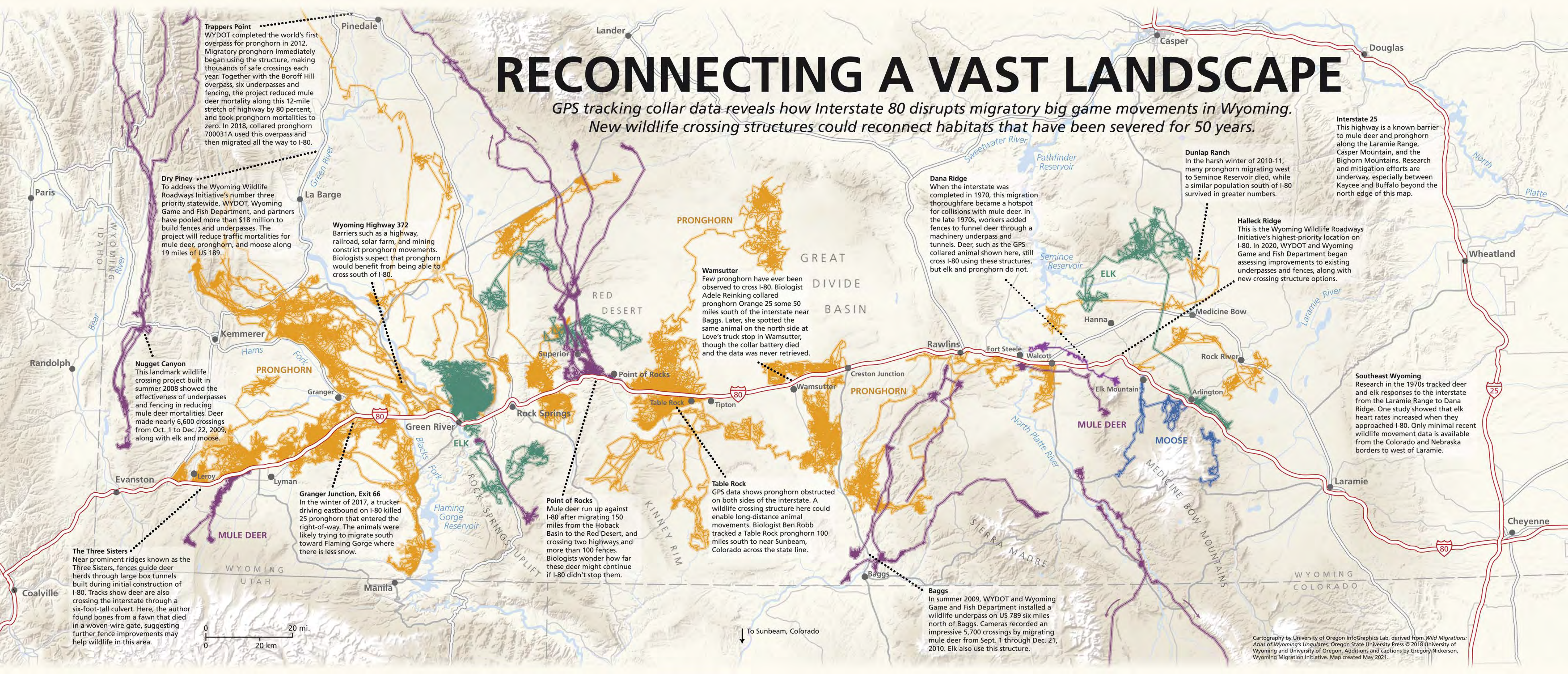


RECONNECTING A VAST LANDSCAPE

GPS tracking collar data reveals how Interstate 80 disrupts migratory big game movements in Wyoming.
New wildlife crossing structures could reconnect habitats that have been severed for 50 years.



Trappers Point
WYDOT completed the world's first overpass for pronghorn in 2012. Migratory pronghorn immediately began using the structure, making thousands of safe crossings each year. Together with the Boroff Hill overpass, six underpasses and fencing, the project reduced mule deer mortality along this 12-mile stretch of highway by 80 percent, and took pronghorn mortalities to zero. In 2018, collared pronghorn 700031A used this overpass and then migrated all the way to I-80.

Dry Piney
To address the Wyoming Wildlife Roadways Initiative's number three priority statewide, WYDOT, Wyoming Game and Fish Department, and partners have pooled more than \$18 million to build fences and underpasses. The project will reduce traffic mortalities for mule deer, pronghorn, and moose along 19 miles of US 189.

Wyoming Highway 372
Barriers such as a highway, railroad, solar farm, and mining constrict pronghorn movements. Biologists suspect that pronghorn would benefit from being able to cross south of I-80.

Nugget Canyon
This landmark wildlife crossing project built in summer 2008 showed the effectiveness of underpasses and fencing in reducing mule deer mortalities. Deer made nearly 6,600 crossings from Oct. 1 to Dec. 22, 2009, along with elk and moose.

Granger Junction, Exit 66
In the winter of 2017, a trucker driving eastbound on I-80 killed 25 pronghorn that entered the right-of-way. The animals were likely trying to migrate south toward Flaming Gorge where there is less snow.

The Three Sisters
Near prominent ridges known as the Three Sisters, fences guide deer herds through large box tunnels built during initial construction of I-80. Tracks show deer are also crossing the interstate through a six-foot-tall culvert. Here, the author found bones from a fawn that died in a woven-wire gate, suggesting further fence improvements may help wildlife in this area.

Point of Rocks
Mule deer run up against I-80 after migrating 150 miles from the Hoback Basin to the Red Desert, and crossing two highways and more than 100 fences. Biologists wonder how far these deer might continue if I-80 didn't stop them.

Wamsutter
Few pronghorn have ever been observed to cross I-80. Biologist Adele Reinking collared pronghorn Orange 25 some 50 miles south of the interstate near Baggs. Later, she spotted the same animal on the north side at Love's truck stop in Wamsutter, though the collar battery died and the data was never retrieved.

Table Rock
GPS data shows pronghorn obstructed on both sides of the interstate. A wildlife crossing structure here could enable long-distance animal movements. Biologist Ben Robb tracked a Table Rock pronghorn 100 miles south to near Sunbeam, Colorado across the state line.

Dana Ridge
When the interstate was completed in 1970, this migration thoroughfare became a hotspot for collisions with mule deer. In the late 1970s, workers added fences to funnel deer through a machinery underpass and tunnels. Deer, such as the GPS-collared animal shown here, still cross I-80 using these structures, but elk and pronghorn do not.

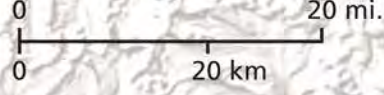
Dunlap Ranch
In the harsh winter of 2010-11, many pronghorn migrating west to Seminoe Reservoir died, while a similar population south of I-80 survived in greater numbers.

Halleck Ridge
This is the Wyoming Wildlife Roadways Initiative's highest-priority location on I-80. In 2020, WYDOT and Wyoming Game and Fish Department began assessing improvements to existing underpasses and fences, along with new crossing structure options.

Interstate 25
This highway is a known barrier to mule deer and pronghorn along the Laramie Range, Casper Mountain, and the Bighorn Mountains. Research and mitigation efforts are underway, especially between Kaycee and Buffalo beyond the north edge of this map.

Southeast Wyoming
Research in the 1970s tracked deer and elk responses to the interstate from the Laramie Range to Dana Ridge. One study showed that elk heart rates increased when they approached I-80. Only minimal recent wildlife movement data is available from the Colorado and Nebraska borders to west of Laramie.

Baggs
In summer 2009, WYDOT and Wyoming Game and Fish Department installed a wildlife underpass on US 789 six miles north of Baggs. Cameras recorded an impressive 5,700 crossings by migrating mule deer from Sept. 1 through Dec. 21, 2010. Elk also use this structure.



To Sunbeam, Colorado

Cartography by University of Oregon InfoGraphics Lab, derived from *Wild Migrations: Atlas of Wyoming's Ungulates*, Oregon State University Press © 2018 University of Wyoming and University of Oregon. Additions and captions by Gregory Nickerson, Wyoming Migration Initiative. Map created May 2021.