

Incorporation of the Chinati Mountains State Natural Area into the existing Big Bend Ranch State Park International Dark Sky Park Designation

June 2020

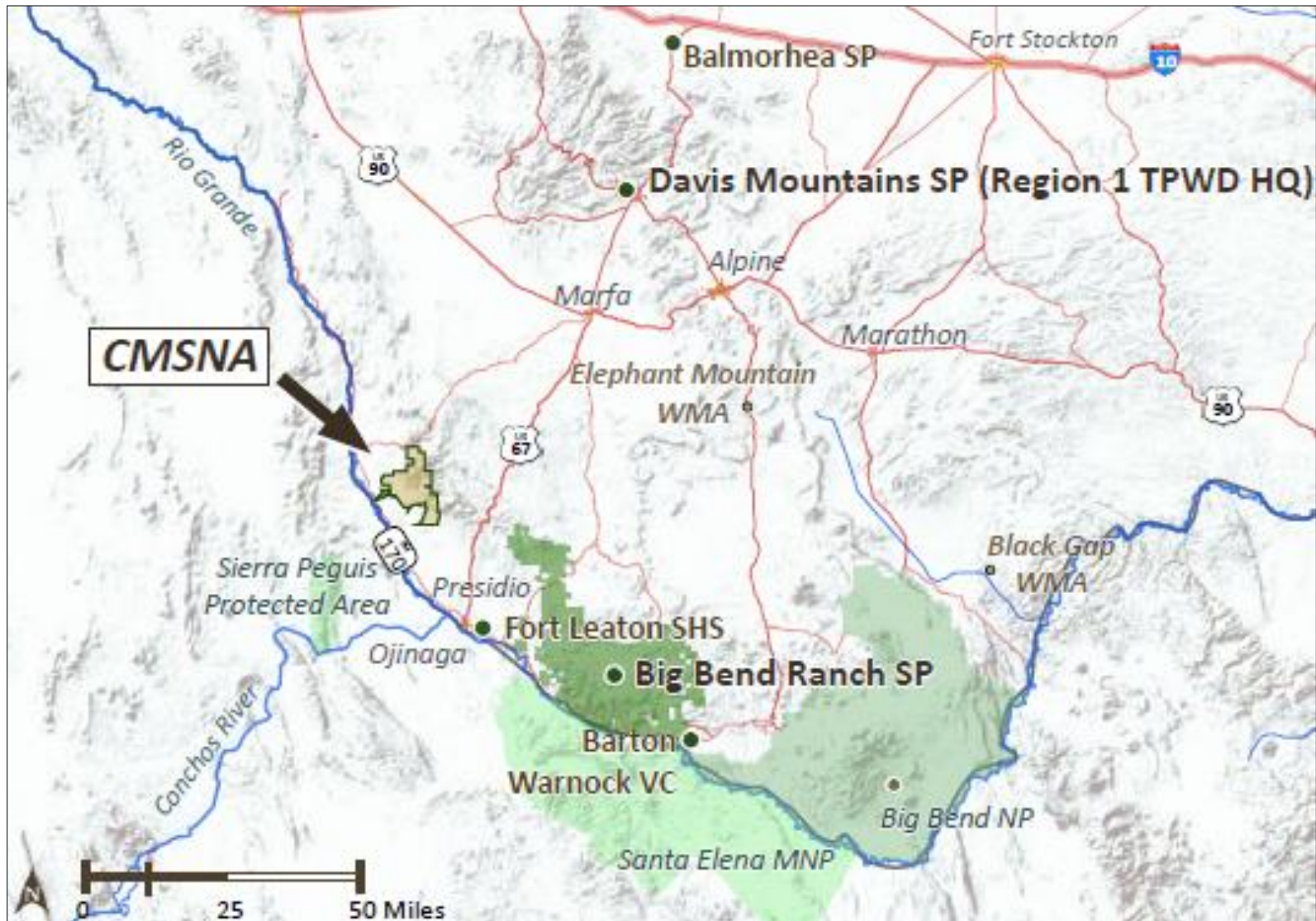
Introduction

This document serves to add the Chinati Mountains State Natural Area (CMSNA) to the Big Bend Ranch State Park (BBRSP) Dark Sky Park 2017 designation. While they are not contiguous, CMSNA is managed as part of the BBRSP Complex, administered by Texas Parks and Wildlife Department (TPWD). As described in the original BBRSP application, BBRSP includes the Barton Warnock Visitor Center, Fort Leaton State Historic Site and Saucedo Ranger Station. The CMSNA is approximately 40,000 acres and together these lands encompass approximately 355,000 acres. The figure below shows the location of the CMSNA within the larger Big Bend Region.

The CMSNA was acquired by TPWD in 1996 and was established as a State Natural Area (SNA). Additional tracts of land have been added since 1996. With the most recent acquisition (2018), full access to FM 170 can now be gained via an existing road. It is currently not open to the public and is managed and maintained by staff at BBRSP. Park management anticipates opening the SNA for limited use by approved commercial outfitters within the next year. Public Use Plans are being developed to establish a long-term, phased opening to the public and associated improvements. Development of any new facilities are still several years out.

Location

The CMSNA is located approximately 25 miles northwest of the City of Presidio and occupies a remote and rugged stretch of the high Chihuahuan Desert along the Rio Grande and International border with Mexico. Named for its location in the Chinati Mountains, the SNA is part of a larger regional network of parks and conservation lands administered by TPWD and the National Park Service. Other nearby lands administered by TPWD include Elephant Mountain and Black Gap Wildlife Management Areas (WMA). Big Bend National Park (BBNP) is located a short distance from BBRSP and was designated as an IDSP in 2014. Much of the land immediately across the border from BBNP and BBRSP is also protected for conservation purposes. The Sierra Peguis Protected area is visible from the CMSNA.



Resources

Like BBRSP, the SNA contains significant natural and cultural resources. The rugged, mountainous terrain sets it apart from the lowlands of BBRSP as much of it is situated at generally higher elevations, ranging from 4-7,000 feet – the highest point at BBRSP is Oso Peak at 5200 feet.

Because of its location in the mountains, historical land use has had less of an environmental impact and much of the areas grassland and mixed prairie environments are still intact. Deep canyons and arroyos that have developed over millions of years bisect the property and offer habitat that supports a diverse range of plants and animals.

Prehistoric human occupation is evidenced by artifact scatters, rock shelters, stone features and temporary camps left by nomadic bands of hunter-gatherer populations dating back several thousands of years. The SNA is located a short distance from one of the most significant archaeological sites in the region, La Junta de los Rios, with an occupation dating back at least 3,000 years ago. The historic occupation is characterized by the remains of the ranching and mining eras dating from the 1880s through late 1970s.

Management Objectives

According to the Public Use Plan (2019 draft) the purpose of the CMSNA is to:

- *Manage the property according to SNA classification so that the aesthetic quality, and the natural, cultural and historic resources are preserved for the benefit of the people of Texas in perpetuity.*
- *Maintain the natural and wild character of the site while providing compatible public use to remote conservation lands through sustainable resource-based outdoor recreation.*
- *Provide opportunities to experience desert solitude in a natural setting dedicated to the preservation of threatened resources, including dark skies, and natural view and sounds.*
- *Serve as an outdoor laboratory for scientific exploration and education in an area managed for the conservation and stewardship of natural systems.*

Description of Facilities

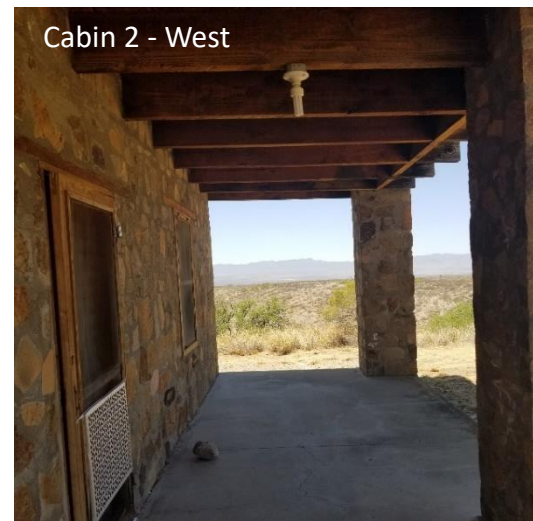
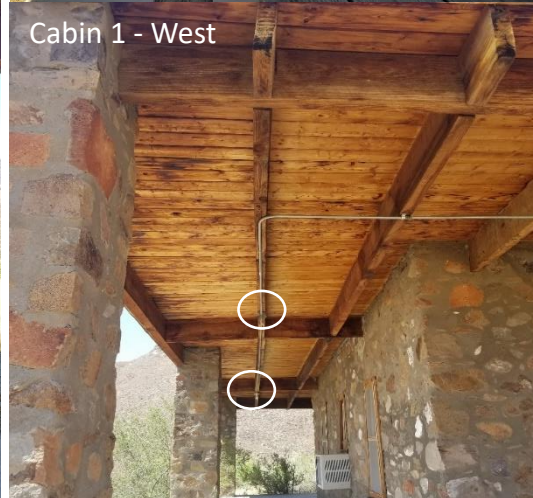
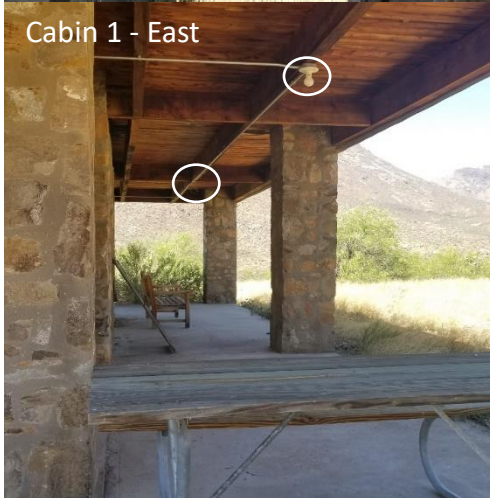
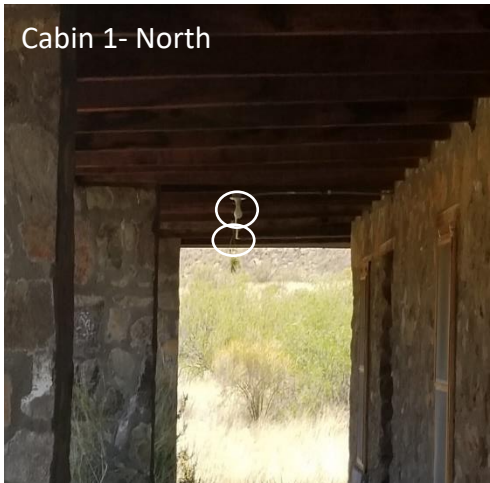
Much of the CMSNA is undeveloped. There are approximately 54 miles of mostly unmaintained doubletrack road, 4 stone cabins, stone shade ramadas, remnants of historic ranching and mining (windmills, corrals, tanks) operations and the ruins of a homestead with an adobe structure that was constructed in 1915. Only two of the four cabins have electricity and outdoor lighting. No other outdoor lighting exists on the property. For the purposes of this document, the cabins will be referred to as Cabin 1 and Cabin 2.

The images below show Cabins 1 (left) and 2 (right). All four cabins are constructed of the same materials and are nearly identical in style with a central room and covered porches. Cabin 1 has a full wrap-around porch and Cabin 2 has a covered porch on two sides.



Lighting Inventory

As shown below, there are total of 10 outdoor light sockets at Cabins 1 and two at Cabin 2. Currently, half of the sockets are outfitted with bare bulbs that are controlled with manual switches to be used as needed.



The position of the sockets under the porch covering makes it so they do not contribute to sky glow, however exposed bulbs create glare that is uncomfortable to the eye. Park management has committed to install shields for all exposed bulbs at each cabin within one year (May 2021).

Proposed development requiring outdoor lighting will include the construction of a residence, visitor center and maintenance area (2019, PUP unpublished draft). The construction of any new facilities with outdoor lighting is still years away. All improvements and new construction will follow the Lightscape Management Plan established for BBRSP.