Cape Lookout National Seashore Shackleford Banks Horses 2024 Annual Report

National Park Service Cape Lookout National Seashore 131 Charles Street Harkers Island, NC 28531

Site Location and Description

Cape Lookout National Seashore (the park) is located in the southern Outer Banks of North Carolina between Beaufort Inlet and Ocracoke Inlet. Here, the National Park Service (NPS) manages 56 miles of barrier islands. Shackleford Banks is the southernmost island in the park between Beaufort Inlet to the west and Barden's Inlet to the east. It lies south of the Town of Beaufort and Harkers Island. Shackleford Banks is approximately 8 miles long and ranges from less than 0.5 mile wide to nearly 1.5 miles wide where the eastern marsh islands are included.

Management Directives

Federal legislation passed in 1998 as 16 U.S.C. §459g-4 [1] and the subsequent 2005 Amendment by Congress 109-117;119-§2526 [2] to the legislation protects the wild horses within Cape Lookout National Seashore. The horses are cooperatively managed by the park and the nonprofit Foundation for Shackleford Horses, Inc., (Foundation). This annual report on the status of the herd covers the 2024 calendar year.

Horse Population

The population is managed with a legislated target range of 120 to 130 horses [2]. At the end of 2024 there were 119 horses on Shackleford Banks. Since 2005, when the last roundup was conducted, the year-end population has ranged between 105 and 126. No roundups are planned in the foreseeable future.

Gender and Age Structure

At the end of 2024, the herd was 61% female and 39% male. Part of the reason that there are more females is that some females are living longer. All 17 of the horses 20 years of age and older are female; the oldest male is 19. The oldest horse living on the island is a 30-year-old mare who has three generations of descendants. Contraception has been linked to increased longevity among treated females [3].

Birth and Mortality

In 2024, 14 foals were born. Herd mortality was 9% (11 horses). This is above the 6% average mortality from 1999 through 2024, inclusive, but does not change that average. The 11 horses include a 29 year old stallion that was the oldest male in the herd. He lived approximately a decade longer than most males but he did not work as hard; he held only one harem for a short time during his life. A 25 year old mare and 17 year old stallion died in old age. Two 6 year old mares passed: one is suspected to have died of a natural injury and the other was euthanized for a hip injury. Two 4 year old females died: one failed to thrive and the other was euthanized because she was, in the

opinion of the attending veterinarian, also failing to thrive and suffering. A 3 year old female and 1 year old male were very thin when last seen. A 6 month old colt was no longer sighted with his dam. One newborn foal was documented by fishermen but not found subsequently.

Genetics Data

Dung was collected from the foals of 2024 by standard collection protocol [4] to determine offspring genotypes. Analysis was done according to protocol by the Laboratory for Ecological, Evolutionary and Conservation Genetics at the University of Idaho [5]. The maternal and paternal genotypes are known from previous analyses, and, using them, foal paternity is being determined. The resulting lineage data will be used for decision making for management actions by the park and Foundation.

Contraception

Contraception has been used adaptively to manage the wild horse population beginning in 2000 [6,7,8,9,10]. Contraceptive doses are additive, with one dose providing, on average, one year of birth control. Judicious contraception use, along with natural births and mortality, should keep the herd near the prescribed population range. Eight mares who had recent foals were contracepted in 2024.

Junior Ranger Activity: Wild Horse Protector

Junior Ranger Wild Horse Protector activities continued on Shackleford Banks. This activity is designed for students in grades 6 through 8 but can be adapted to younger or older students. An adult checks out a backpack holding binoculars, handheld GPS, salinity meter, range finder, a glossary, and instructions. Participants work though activities like those the wild horse Biologist performs during census work. On completion, students receive an award and are certified as Wild Horse Protectors.

Education Campaign

The Wild Horse Public Education Campaign (WHPEC), begun in 2011, continues. This is a collaboration between the park, the Foundation, and the nearby Rachel Carson Reserve. The aim of the campaign is to educate people about the horses with an emphasis on the safety of the horses, park and Reserve visitors, and pets. The general message is to watch the horses without interacting with them or interrupting their natural behavior.

The acclaimed Pony Patrol continued in 2024 with 34 Volunteers in Parks (VIPs) making an average of 18 visitor contacts per day over 109 days during the summer. Applications for Pony Patrol VIPs for the 2025 season are open until Friday, February 21, 2025; go to <u>https://tinyurl.com/PonyPatrol2025</u> to apply. Interest is high for a limited number of positions so 2025 will be more competitive.

Foundation for Shackleford Horses

During the year, the Foundation contributed over 4570 volunteer hours performing diverse work related to the Shackleford Banks horses both on and off the island [11]. Its Board of Directors is comprised of ten volunteers; additional volunteers contribute significantly. Any horses removed from the island are turned over to the Foundation. Removed horses are likely cared for at the FSH

rescue farm and may be made available for adoption, if possible. The Foundation raises money to help fund wild horse program needs.

Citations

- 1. US Government Publishing Office Federal Digital System document, accessed February 22, 2016, https://www.gpo.gov/fdsys/granule/USCODE-2011-title16/USCODE-2011-title16-chap1-subchapLXIII-sec459g-4.
- 2. US Government Publishing Office Federal Digital System document, accessed February 22, 2016, http://uscode.house.gov/statutes/pl/109/117.pdf.
- 3. Jay Kirkpatrick, et al., "The practical side of immunocontraception: Zona proteins and wildlife." Journal of Reproductive Immunology 83 (2009): 151-157.
- 4. Lisette Waits, "Scat Collection Protocol," January 10, 2009.
- 5. Adams, Jennifer and Lisette Waits, "Paternity Analysis of Nine Foals Using Fecal Samples", Preliminary Report, January 11, 2016.
- 6. National Park Service, Cape Lookout National Seashore, Management Plan for the Feral Horse Herd on Shackleford Banks, 1996.
- 7. National Park Service, Cape Lookout National Seashore, Management Plan for the Feral Horse Herd on Shackleford Banks, 1999.
- 8. National Park Service, Cape Lookout National Seashore, Management Plan for the Shackleford Banks Horse Herd, 2005.
- 9. National Park Service, Cape Lookout National Seashore, Management Plan for the Shackleford Banks Horse Herd, 2010.
- 10. National Park Service, Cape Lookout National Seashore, Management Plan for the Shackleford Banks Horse Herd, 2024.
- 11. Foundation for Shackleford Horses. "Foundation for Shackleford Horses Volunteer Hours 2023-2024."



A cattle egret, looking for insects stirred up by the horse, accompanies an alpha stallion as he walks while grazing. Photo credit: NPS – S. Stuska. This photo was taken with a telephoto lens and cropped.

To the press: this photo is available as a JPG; please inquire.