

# Anthrax



Anthrax was detected in domestic cattle in Sedgwick County, Colorado in July, 2022. Although no wildlife cases have been detected at this time, Colorado Parks and Wildlife is working with state and federal partners to monitor for this disease and prevent human cases.

## What is anthrax?

Anthrax is caused by the bacteria *Bacillus anthracis*. This bacteria forms hardy spores that can remain dormant in the soil for decades. Outbreaks of anthrax occur when spores are uncovered, or brought to new locations (for example by drought or flooding). Affected animals are often suddenly found dead and bloated. The legs extending from the bloated carcasses sometimes provide a “sawhorse” appearance. If the carcass is left alone the bacteria will be eliminated by natural processes, but if the carcass is opened, by scavengers or humans, spores can be released into the environment. Because these spores remain in the soil the disease may reoccur, and recurrent disease events may be several years apart.



## Does anthrax cause disease in Colorado wildlife?

CPW has not detected anthrax in wildlife species during recent outbreaks in cattle. However, many of our wildlife species are susceptible to the disease. Anthrax is of most concern for ruminants such as deer, elk, moose, bighorn sheep, mountain goats, or pronghorn, in which death can occur within days or even hours. Predatory species such as mountain lions, bears, and coyotes are less susceptible to anthrax than ruminants, but they can develop a more prolonged form of the disease. Signs in predatory species include swollen lymph nodes of the throat, other swollen tissues, or gastrointestinal upset. Death is a less likely outcome of anthrax in predatory species than in ruminants. Birds are also unlikely to develop disease. Although predators and scavengers are unlikely to be affected by anthrax, they can spread the disease through contaminated feces after feeding on infected carcasses.

## Human health concerns

People can also get anthrax. The types of symptoms that develop in people will depend on how the disease was contracted. For example, infection through a scratch will cause a skin infection while inhaling or consuming spores will cause more general signs such as fever, nausea, and muscle aches. The disease can develop rapidly or be prolonged. If anthrax in people is not treated quickly it can be fatal.

### Precautions for hunters and recreators:

- If you encounter a dead animal, DO NOT OPEN the carcass.
- Contact your local CPW office to report suspicious carcasses.
- If you have human health questions, contact your doctor or the Colorado Department of Public Health and Environment (<https://cdphe.colorado.gov/>).

## Domestic animal health concerns

Anthrax in livestock is similar to anthrax in wild ruminants and typically results in sudden death. Dogs and cats are relatively resistant to the disease, but can show signs as described above for wild predators.

- For questions regarding livestock, please contact the Colorado Department of Agriculture (<https://ag.colorado.gov>)
- For questions regarding pets, please contact your local veterinarian.

## References

Gates, CC, Elkin B, and Dragon, D. Anthrax. In: Diseases of Wild Mammals, 3<sup>rd</sup> edition. Editors Williams and Barker. 2001. Iowa State University Press, Ames, IA.  
Centers for Disease Control and Prevention (<https://www.cdc.gov/anthrax/index.html>)