

## ANTHRAX FACT SHEET

### What is anthrax?

Anthrax is an infectious disease caused by a species of bacteria called *Bacillus anthracis*. Anthrax is seen most commonly in grazing animals such as cattle, sheep, and goats. It can also cause severe illness and death in people.

### How common is anthrax?

Human anthrax infections are extremely rare in the United States. Only four naturally acquired cases have been reported in the United States in the last ten years, all among persons who had contact with contaminated animal products from Africa. In 2001, 22 people were infected when envelopes containing the organism were sent through the mail. This was considered an act of bioterrorism. The last confirmed case of human anthrax in California was in 1976 and the source of infection was yarn made of wool imported from Pakistan.

### How does a person get anthrax?

A person could become infected with anthrax from:

- *Skin contact with tissues from infected animals*, such as hides or wool, or products made from them. This is the most common form of anthrax and accounts for more than 95% of cases worldwide.
- *Eating meat from an animal with anthrax*. This is seen chiefly in undeveloped countries.
- *Inhaling anthrax spores*. Spores present in carcasses or tissues of an infected animal can be stirred up into the air when those tissues are handled or disturbed. After an infected animal is buried, anthrax spores can survive in the soil for many years. Flies and other animals that feed on carcasses can carry spores for many miles.
- *Non-natural exposures* such as in a laboratory, through contaminated substances (e.g. heroin), and by malicious release (bioterrorism) are rare.
- Anthrax is not spread person-to-person.

### What are the symptoms of anthrax?

The symptoms of anthrax vary depending on the type of exposure.

- *Skin contact*. A painless lesion, similar to an insect bite, appears 5-7 days after exposure. The lesion typically enlarges, forms a blister, and then becomes a black swollen scab. With proper treatment, deaths from this form of anthrax are very rare.
- *Eating contaminated meat*. Some patients experience fever, sore throat, and swelling around the neck, while others have abdominal pain, nausea, vomiting, and diarrhea, sometimes with blood. Historically, about half of the patients with this form of anthrax have died.
- *Inhaling anthrax spores*. Early symptoms resemble the flu-- fever, lethargy, muscle aches- which worsen within 2-3 days to severe breathing difficulty. Historically, about 90% of patients with this form of anthrax have died.

**How is anthrax diagnosed?**

Anthrax is diagnosed by growing the bacteria from blood or other tissues. Final identification of the bacteria must be done by a public health laboratory.

**What is the treatment for anthrax?**

Antibiotics are used to treat anthrax and should be given as soon as possible. Antibiotics are also given to people who have been exposed to aerosolized anthrax but have yet to develop illness.

**How can anthrax be prevented?**

People should avoid touching or handling potentially infected animals, their carcasses, and products made from these animals. Vaccination against anthrax is limited to persons with frequent or potential high-risk exposure to the bacterium such as laboratory workers and military personnel.

**Where can I find more information about anthrax?**

More information on anthrax can be found at the U.S. Centers for Disease Control and Prevention's website: <http://emergency.cdc.gov/agent/anthrax>

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