What is coccidioidomycosis and what causes it?

Coccidioidomycosis (cock-sid-EE-oy-do-my-co-sis) is a fungal infection that affects numerous species of animals, including humans. It is caused by *Coccidioides immitis* (cock-sid-EE-oy-dees im-mitt-tis), a fungal organism found in soil. The disease occurs regularly (endemic) in the southwestern U.S. and parts of Mexico and South America due to the dry desert soils found in these areas.

What animals get coccidioidomycosis?

Dogs are the most severely affected species but *Coccidioides immitis* can cause infection in many other species, including horses, cattle, and other livestock.

How can my animal get coccidioidomycosis?

Inhalation (aerosol) of the fungal spores is the only known route of transmission. The fungal spores become aerosolized through contaminated soil disturbed either by humans (as in construction sites) or by natural causes (such as an earthquake or dust storm).

How does coccidioidomycosis affect my animal?

In animals, the disease can vary from no signs of illness to severe illness and death. Respiratory signs are the most common signs seen in animals and may include high fever (104-105°F), lethargy, loss of appetite, and a dry, harsh cough.

In some cases, the fungus may also spread to other parts of the body. This is especially common in dogs. The bones may be infected and cause lameness, limping, or joint swelling. There may be draining lesions (abscesses) in the skin.

Can I get coccidioidomycosis?

Yes. People can get coccidioidomycosis by inhaling (aerosol) the spores in contaminated dust or soil. They do not get the disease from infected animals.

Respiratory signs are most commonly reported. This may include fever, coughing, chest pains, chills, and sore throat.

A severe form of the disease can also occur in people and is most common in men, people with weakened immune systems, the elderly, and certain ethnic groups. This form may take weeks, months, or years to develop after infection.

The fungus may invade any number of internal organs as well as the skin. Symptoms include low grade fever, weight loss, muscle aches and stiffness, sweats and weakness.

Who should I contact, if I suspect coccidioidomycosis?

In Animals – Contact your veterinarian immediately.

In Humans – Contact your physician immediately.

How can I protect my animal from coccidioidomycosis?

In endemic areas (places where the organism is known to be in the soil), precautions must be taken to minimize soil disruption and prevent spore release (aerosolization) from the fungus.

How can I protect myself from coccidioidomycosis?

Maintain good health. If possible, avoid traveling to areas where the soil is known to be contaminated. This is especially important for people with weakened immune systems.

For More Information

CFSPH Technical Fact Sheets. Coccidioidomycosis at http://www.cfsph.iastate.edu/DiseaseInfo/

CDC website. Coccidioidomycosis at http://www.cdc.gov/fungal/coccidioidomycosis/