

## BASICS

Canine Distemper is a **HIGHLY CONTAGIOUS** disease caused by a paramyxovirus. It is a widespread disease primarily affecting raccoons, gray foxes, and skunks in the spring and fall.

**CLINICAL SIGNS** begin 10-14 days after infection and include discharge from the eyes and nose, dyspnea (difficulty breathing), coughing, and pneumonia. Fever, anorexia and respiratory tract issues are **MOST COMMON**.

Canine distemper virus (CDV) also causes gastrointestinal illness, thickening of the nose and foot pads, and a **NEUROLOGIC** phase that has symptoms similar to **RABIES**.

**TRANSMISSION** occurs from contact with infected saliva, urine, feces or respiratory secretions. Animals can shed up to 2 weeks after they recover. The virus can **SURVIVE** long periods in the environment if the temperatures are below freezing.

Canine distemper can be **DIAGNOSED** by detection of DNA from nasal or ocular swabs or from tissue samples such as foot pads, bladder or lung.

There is **NO CURE**, only supportive care, so preventative measures to reduce the risk of spreading the virus are key. This virus is nearly 100% fatal for mustelids.



**SEEN IN  
SPRING &  
EARLY FALL**

**DIRECT  
CONTACT &  
INHALATION**

**WILD &  
DOMESTIC  
CARNIVORES**



## DETAILS

The disease is found in canids (domestic dogs, coyotes, wolves, foxes) as well as raccoons, javelinas, and some marine mammals. Mustelids (black footed ferrets, mink, and skunks) are especially **SUSCEPTIBLE** to the disease. One case has been reported in a black bear and cases have been reported in monkeys. It can cause high mortality in large exotic cats (tigers and lions).

**TRANSMISSION** The virus is transmitted by inhalation of aerosolized particles and direct contact. It is shed in the urine, feces, and secretions of infected animals. The virus is resistant to cold and the majority of cases in domestic dogs occur in the fall and winter.

The disease is often fatal with a mortality rate of 50% in adult dogs and 80% in puppies. Most wildlife cases occur in the spring and fall. However, there are cases year round. The **MORTALITY RATE** is close to 100% in mustelids.

**CLINICAL SIGNS** The virus causes respiratory issues and fever. It also causes gastrointestinal illness including vomiting and diarrhea, as well as thickened skin on the nose and footpads (hyperkeratosis).

The **NEUROLOGIC PHASE** of the disease affects the central nervous system and can cause disorientation and weakness along with progressive seizures. The “chewing gum fit” is the classic distemper sign that begins with snapping and jaw spasms that progress to seizures. Wild animals with late neurologic stage distemper have can exhibit fearlessness, aimless wandering, and aggressiveness.

**TREATMENT** The treatment for canine distemper is supportive care as there is no cure. Therefore, prevention is important in preventing mortality from CDV.

**PRECAUTIONS AND PREVENTION** CDV is not transmissible to humans. Preventative measures include vaccination of domestic species, removal of infected carcasses, and decontamination of areas where infected animals were treated.

### EXAMPLE OF FOOT PAD THICKENING

