
Trichinellosis

What is trichinellosis?

Trichinellosis (TRICK-a-NELL-o-sis), also called trichinosis (TRICK-a-NO-sis), is a foodborne illness caused by a microscopic parasite.

How does someone get trichinellosis?

It is caused by eating raw or undercooked pork and wild game products infected with the larvae of a species of worm called *Trichinella*. Infection occurs commonly in certain wild carnivorous (meat-eating) animals but may also occur in domestic pigs. Human infections may occur worldwide, but are most common in areas where raw or undercooked pork, such as ham or sausage, is eaten.

What are the symptoms of a trichinellosis infection?

Nausea, diarrhea, vomiting, fatigue, fever, and abdominal discomfort are the first symptoms of trichinosis. Headaches, fevers, chills, cough, eye swelling, aching joints are the first symptoms. If the infection is severe, patients may experience difficulty coordinating movements, and have heart and breathing problems. In severe cases, death can occur. For mild to moderate infections, most symptoms subside within a few months.

How soon after infection will symptoms appear?

Abdominal symptoms can occur 1-2 days after infection. Further symptoms usually start 2-8 weeks after eating contaminated meat. Symptoms may range from very mild to

severe and relate to the number of infectious worms consumed. Often, mild cases of trichinosis are never specifically diagnosed and are assumed to be the flu or other common illnesses.

Does past infection with trichinellosis make a person immune?

Partial immunity may develop from infection.

How does infection occur in humans and animals?

When a human or animal eats meat that contains infective *Trichinella* cysts, the acid in the stomach dissolves the hard covering of the cyst and releases the worms. The worms pass into the small intestine and, in 1-2 days, become mature. After mating, adult females lay eggs. Eggs develop into mature worms, travel through the arteries, and are transported to muscles. Within the muscles, the worms curl into a ball and encyst (become enclosed in a capsule). Infection occurs when these encysted worms are consumed in meat.

Am I at risk for trichinellosis?

If you eat raw or undercooked meats, particularly pork, bear, wild feline (such as a cougar), fox, dog, wolf, horse, seal, or walrus, you are at risk for trichinosis.

Can trichinellosis be spread from person to person?

No. Infection can only occur by eating raw or undercooked meat containing *Trichinella* worms.

What should I do if I think I have trichinellosis?

See your health care provider who can order tests and treat symptoms of trichinellosis infection. If you have eaten raw or undercooked meat, you should tell your health care provider.

How is trichinellosis infection diagnosed?

A blood test or muscle biopsy can show if you have trichinellosis.

How is trichinellosis infection treated?

Several safe and effective prescription drugs are available to treat trichinosis. Treatment should begin as soon as possible and the decision to treat is based upon symptoms, exposure to raw or undercooked meat, and laboratory test results.

Is trichinellosis common in the United States?

Infection was once very common; however, infection is now relatively rare. From 1991-1996, an annual average of 38 cases per year were reported. The number of cases has decreased because of legislation prohibiting the feeding of raw meat to hogs, commercial and home freezing of pork, and the public awareness of the danger of eating raw and undercooked pork products. Cases are less commonly associated with pork products and more often associated with eating raw or undercooked wild game meats.

How can I prevent trichinosis?

- Cook meat products until the juices run clear or to an internal temperature of 170 degrees Fahrenheit.
- Freeze pork less than 6 inches thick for 20 days at 5 degrees Fahrenheit to kill any worms.
- Cook wild game meat thoroughly. Freezing wild game meats, unlike freezing

pork products, even for long periods of time, may not effectively kill all worms.

- Cook all meat fed to pigs or other wild animals.
- Do not allow hogs to eat uncooked carcasses of other animals, including rats, which may be infected with trichinosis.
- Clean meat grinders thoroughly if you prepare your own ground meats.
- Keep in mind that curing (salting), drying, smoking, or microwaving meat does not consistently kill infective worms.

For specific concerns or questions about trichinellosis, call the New Hampshire Department of Health and Human Services, Bureau of Infectious Disease Control at 603-271-4496 or 800-852-3345 x4496. For further information, refer to the Centers for Disease Control and Prevention website at www.cdc.gov or the NH Department of Health and Human Services website at www.dhhs.nh.gov