

What is typhus?

Typhus fevers are a group of diseases caused by bacteria that are spread to humans by fleas, lice, and chiggers. Typhus fevers include scrub typhus, murine typhus, and epidemic typhus. Chiggers spread scrub typhus, fleas spread murine typhus, and body lice spread epidemic typhus. In the United States, the most common type of typhus is murine typhus.

Who gets typhus and how is it spread?

Typhus is not transmitted from person to person like a cold or the flu. There are three different types of typhus, and each type is caused by a different type of bacterium and transmitted by a different type of arthropod.

- **Epidemic typhus:** Epidemic typhus, also called louse-borne typhus, is a disease caused by a bacteria called *Rickettsia prowazekii*. While previously responsible for considerable illness worldwide, it is now considered rare.
- **Scrub typhus:** Scrub typhus, also known as bush typhus, is a disease caused by a bacteria called *Orientia tsutsugamushi*. Scrub typhus is spread to people through bites of infected chiggers (larval mites). Most cases of scrub typhus occur in rural areas of Southeast Asia, Indonesia, China, Japan, India, and northern Australia.
- **Murine typhus:** Murine typhus, also called endemic typhus or flea-borne typhus, is a disease caused by a bacteria called *Rickettsia typhi*. Murine typhus is spread to people through contact with infected fleas. People get sick with murine typhus when infected flea feces are rubbed into cuts or scrapes in the skin. Most cases of murine typhus in the United States are reported in people from California, Hawaii, and Texas. In most areas of the world, rats are the main animal host for fleas infected with murine typhus.

What are the symptoms of typhus?

The most common symptoms of typhus are fever, headache, and sometimes rash. Depending on the type of typhus, other symptoms may include nausea, vomiting, stomach pain and enlarged lymph nodes.

How soon after exposure do symptoms appear?

Depending on the type of typhus, symptoms may appear from five to 14 days after exposure to the bacteria. Travelers who get typhus while traveling abroad may not experience symptoms until they return home. For this reason, it is important to tell your doctor about any recent trips if you have any of the above symptoms.

How is typhus diagnosed?

The diagnosis of typhus depends on the type, but is often based on signs and symptoms of illness, as well as laboratory tests of skin or blood.

What is the treatment for typhus?

Endemic typhus fever is treated with antibiotics. Healthcare providers choose the antibiotic based on the patient's symptoms and the results of laboratory tests.

How can typhus be prevented?

While prevention measures vary depending on the type of typhus, in general, the following measures help reduce the risk of exposure to fleas, lice and chiggers:

- Keep rodents and animals away from your home, workplace, and recreational areas. Remove brush, rock piles, junk, cluttered firewood, and food supplies, especially pet food.
- Use an Environmental Protection Agency approved insect repellent during activities such as camping, hiking, or working outdoors.
- Treat clothing and camping gear with permethrin or purchase permethrin-treated items.
- Keep fleas off of your pets.

There is no vaccine available for any form of typhus.

How can I get more information about typhus?

- If you have concerns about typhus, contact your healthcare provider.
- Call your local health department. A directory of local health departments is located at <https://www.vdh.virginia.gov/local-health-districts/>.
- Visit the Centers for Disease Control and Prevention website at <https://www.cdc.gov/typhus/index.html>.

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