

Hand Foot and Mouth Disease (HFMD)

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The disease

Hand, foot and mouth disease (HFMD) is a common infection caused by several different viruses in the enterovirus group including *coxsackie A16*, and *enterovirus 71* (E71). The disease is present throughout the world. It typically occurs among infants and children, though adults can contract it. Most patients experience a mild illness that clears up without treatment. However, the disease can cause more serious symptoms that may be life threatening, such as encephalitis and meningitis. These cases are uncommon.

Symptoms

Patients usually begin having symptoms 3-7 days after being infected. Illness often begins with a fever, reduced appetite, fatigue, sore throat and a general sick feeling (malaise). Within one to two days, the classic symptoms of HFMD usually appear: painful ulcers in the mouth and a rash on the hands, feet, and buttocks. This rash is not itchy and looks like small blisters. The most common complication of the disease is dehydration, since mouth sores can make it painful to eat or drink.

When HFMD is caused by the E71 virus, more serious symptoms may occur. Infrequently, patients develop meningitis, a poliomyelitis-like paralysis or encephalitis (inflammation of the brain), which can be fatal.

How it spreads

HFMD spreads from person-to-person, usually via the oral-oral or oral-fecal route. The virus is contained in the bodily secretions (feces, mucus, saliva, blister pus) of infected people. A healthy person contracts it when they put contaminated food, beverages or objects into their mouth, or when they inhale the virus.

Patients are most contagious for the 7-10 days of their illness, but remain contagious even after symptoms abate. The virus may stay in the feces for several weeks after the illness has disappeared.

Diagnosis

HFMD is usually diagnosed by taking a detailed health history and observing clinical symptoms. Laboratory testing is not usually required, and it often takes 2 to 4 weeks to obtain results. Nevertheless, medical professionals sometimes perform tests to determine which virus caused the illness. These are done via throat swab or stool specimen.

Treatment

People usually recover without treatment within 7 to 10 days. To relieve uncomfortable symptoms, patients often use over the counter pain relievers/fever reducers. Aspirin should not be administered to children unless recommended by a medical professional. Other treatment includes rest and consuming adequate fluids to prevent dehydration. Patients who develop nervous system symptoms may require hospitalization for treatment.

Prevention

There is no vaccine available.

Strict hygiene measures must be followed to prevent the infection from spreading. Wash hands thoroughly and frequently, especially after changing a diaper or using the toilet. Do not share food, drink or eating utensils. Cover mouth and nose when sneezing, and be sure to wash hands afterwards. Avoid close contact (such as hugging, kissing) with infected persons. Avoid contact with a patient's oral and respiratory secretions for up to 2 weeks after symptoms have disappeared.

HFMD-causing viruses are resistant to many disinfectants, so contaminated surfaces and items must be sanitized by washing with a diluted chlorine-containing product (such as bleach) or an iodized disinfectant.

Reference

International SOS - Country Guides

<http://www.internationalsos.com>

CDC - Hand, Foot and Mouth Disease (HFMD)

<http://www.cdc.gov/hand-foot-mouth/index.html>

