

Chickenpox (Varicella-Zoster Infections)

What is chickenpox?

A respiratory illness caused by the varicella-zoster virus

What are the signs or symptoms?

- Rash (ie, small, red bumps blistering over 3–4 days, then forming scabs).
- Blister crops will come out over several days, so the person who has chickenpox for more than a day or so will have some red bumps, blisters, and scabbed-over blisters all at the same time.
- Rash is more noticeable on the trunk than exposed parts of the body.
- Rash may appear inside mouth, ears, genital areas, and scalp.
- Fever, runny nose, cough.

What are the incubation and contagious periods?

- Incubation period: Usually 14 to 16 days, occasionally as short as 10 days and as long as 21 days after contact.
- Contagious period: The most contagious period is from 1 to 2 days before the rash appears until right after it appears. An infected person no longer spreads the virus when all the blisters have scabs and no new blisters are forming.

How is it spread?

- Chickenpox is highly contagious. Even brief exposure or shared airflow poses a high risk of infection for people who have not had the disease before or have not been protected by the chickenpox vaccine.
- Primarily from direct contact with mucus from the eyes, nose, or mouth and from fluid inside the blisters of an infected person.
- Airborne via mouth or nose droplets from coughing or sneezing.
- Can be spread by someone with uncovered shingles lesions, as the virus that causes shingles is reactivated chickenpox virus in someone who previously had chickenpox.

How do you control it?

- Vaccinate all children 12 months of age or older.
- Vaccinate young adults and other adults who are susceptible.
- Exclude infected children and caregivers/teachers until rash is crusted over.



Child with chickenpox rash

AAP, COURTESY OF EDGAR O. LEDBETTER, MD

- Practice good hand washing and surface sanitation.
- Ventilate room air with fresh outdoor air.
 - ~ Children with chickenpox who are mildly ill and able to come to a program that cares for children who are ill require a room with separate ventilation with exhaust to and air exchange with the outside.
- Exclusion for a chickenpox rash is necessary even if the child has received varicella vaccine, unless the child can have a viral culture performed that determines the virus is from the vaccine and not wild chickenpox virus and the lesions can be covered.

What are the roles of the caregiver/teacher and the family?

- Report the infection to staff designated by the child care program or school for decision making and action related to care of ill children. That person, in turn, alerts possibly exposed family members and staff to watch for symptoms.
- Report the infection to the health department, as the health professional who makes the diagnosis may not report that the child who has the infection is a participant in a child care program or school, and this could lead to precious time for controlling the spread of the disease being lost.
- Specifically notify all adults who have not had chickenpox or the chickenpox vaccine and who may have been exposed (eg, families, staff, volunteers—especially those who are or might be pregnant or have an immune system disease). Suggest that they check with their health professionals about what to do.
- Wash hands carefully at routine times (see “Hand Washing Steps” on page 17) and after any contact with soiled articles or blisters.

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