

By Dr HUSNA MUSA

SMALLPOX, chickenpox, cowpox, and monkeypox are all “pox” diseases, referring to skin infections with eruptive sores.

But chickenpox is different from the others caused by orthopoxviruses; it is caused by the varicella-zoster virus, which only infects humans.

Chickenpox (also known as varicella) is a viral infection that causes itchy rashes with small, fluid-filled blisters.

The varicella-zoster virus is highly contagious and up to 90% of unimmunised individuals who are exposed to the virus can get infected.

About 90% of all cases occur in young children, especially those under two years old.

But older children and adults who have never been infected or vaccinated are also at risk of being infected.

Chickenpox is spread through direct contact with the rash or blister fluids from an infected individual.

It can also spread by breathing in respiratory droplets (i.e. from coughs or sneezes) from an infected person.

An infected person can spread the disease one to two days before the rash appears, until all blisters have dried up and formed crusts.

The most common and identifiable chickenpox symptom is an itchy rash.

Some general symptoms may appear a few days before the rash, such as:

- > Fever
- > Loss of appetite
- > Headache
- > Body ache
- > Fatigue.

Chickenpox rashes can appear 10 to 21 days after exposure to the virus and typically last about five to 10 days.

The rash will appear on the face, chest and back first, but it can spread to the rest of the body, too.

In some cases, the rash can form in the mouth, eyes, anus or genitals.

The rash will undergo three phases:



# It's not just a rash

## Children can get chickenpox at any age and most will recover without any complications.

> Papules: Raised bumps, which break out over a few days.

> Vesicles: Small fluid-filled blisters, which will later break and leak.

> Scabs: Crusts that cover the broken blisters and will heal in a few days.

During the course of the disease, all three rash phases may appear at the same time on different parts of the body.

### Effects of chickenpox

Apart from the itchy rashes and painful sores, chickenpox can also cause severe complications.

Babies who have not yet been vaccinated are at a higher risk of developing chickenpox complications.

Teens, adults and individuals with a weakened immune system

due to cancer, HIV or other conditions are also at risk.

Here are some possible complications:

> Shingles: The varicella-zoster virus stays in one's nerve cells for years after recovery from chickenpox.

Then, the virus can become active again years later and cause shingles, which causes painful blisters that form on either side of the body or face.

Only people who had chickenpox can get shingles and the risk is higher in the elderly.

> Dehydration

> Secondary bacterial infections due to open wounds

> Toxic shock syndrome

> Encephalitis (brain inflammation)

> Reye's syndrome (swelling of the brain and liver in children with chickenpox who take aspirin)

> Pneumonia

> Congenital varicella syndrome (in newborns whose mothers had chickenpox during pregnancy)

> Death (very rare).

In addition to the physical complications, chickenpox patients and their parents also have to deal with other consequences.

For example, children with chickenpox should not attend day care, kindergarten or school to prevent the spread of infection to other children; hence, they may miss valuable lessons during their absence.

Parents also have to incur medical expenses and take leave from work to care for their children.

### Managing chickenpox

Fortunately, in most cases, chickenpox is a mild disease in healthy children and can be managed at home.

Here are some steps to manage chickenpox:

#### • Alleviate symptoms

Give paracetamol to your child if he has a high fever or painful sores.

To relieve itchiness, dab calamine lotion on itchy spots.

Get plenty of rest.

#### • Don't scratch

Scratching can cause open wounds and lead to a bacterial skin infection and scarring.

Let your child wear gloves and make sure that their fingernails are trimmed.

If they accidentally scratch their rash, ask them to wash their

Give your child paracetamol so he can sleep off and rest to alleviate symptoms of fever, irritation and itching. — Positive Parenting

hands to avoid spreading the virus to others.

#### • Stay cool and hydrated

Avoid heat and sweating because these can intensify itchiness.

Drink lots of fluids, preferably plain water, to prevent dehydration.

Avoid hard, spicy or salty foods if there are sores in the mouth.

### Keep protected

Vaccination is the best way to prevent chickenpox.

The varicella-zoster vaccine is not included in the National Immunisation Programme but is available at private healthcare institutions.

It is offered as the monovalent vaccine or as the quadrivalent vaccine MMRV, which protects against measles, mumps, rubella and chickenpox.

The vaccine can be given to children as early as 12 months old.

People working in childcare or school settings are also recommended to be vaccinated.

Consult your doctor to learn more about chickenpox vaccinations.

Dr Husna Musa is a paediatrician and lecturer at Universiti Putra Malaysia. This article is courtesy of the Malaysian Paediatric Association's Positive Parenting programme in collaboration with expert partners. For further information, please email [starhealth@thestar.com.my](mailto:starhealth@thestar.com.my). The information provided is for educational and communication purposes only, and it should not be construed as personal medical advice. Information published in this article is not intended to replace, supplant or augment a consultation with a health professional regarding the reader's own medical care. *The Star* does not give any warranty on accuracy, completeness, functionality, usefulness or other assurances as to the content appearing in this column. *The Star* disclaims all responsibility for any losses, damage to property or personal injury suffered directly or indirectly from reliance on such information.