



www.immune.org.nz

Mumps

Fact Sheet for Parents & Caregivers

What is mumps?

Mumps is an infectious disease caused by a virus that can cause deafness. Humans are the only known hosts of the virus.

What are the symptoms of mumps?

Classical mumps is an acute viral illness characterised by fever, headache, swelling, and tenderness of one or more salivary glands. (The swelling usually shows just below the ear lobe.) At least 30% of mumps infections in children have no symptoms.

How serious is mumps?

Adults are more likely to experience severe mumps disease. Viral meningitis occurs in up to 15% of mumps cases. Encephalitis (brain inflammation) occurs in 1 in 6,000 cases, of whom 1 in 100 die. Deafness occurs in 1 in 15,000 cases. Orchitis (testicle inflammation) affects 1 in 5 adult males. Mumps orchitis has been reported to be a risk factor for testicular cancer. Oophoritis (ovary inflammation) affects 1 in 20 females. In very rare cases orchitis and oophoritis can lead to sterility.

How do you catch mumps?

Mumps is spread by droplet infection (breathing, coughing and sneezing) and also by direct contact with the saliva of a mumps-infected person. Mumps patients may be infectious from 6 days before the salivary glands swell until 9 days after.

How common is mumps?

Before immunisation there were mumps epidemics every 3-4 years in New Zealand. Between 1970 and 1991 there were over 2,000 hospital admissions for mumps. There have been recent outbreaks of mumps in the United Kingdom (2004) and in the USA (2006). This has affected mainly young adults who have either never received a MMR (measles, mumps and rubella) vaccine or had only had one dose of mumps-containing vaccine.

Who is at most risk from mumps?

Unvaccinated adolescents and adults are most at risk. Mumps infection during the first 3 months of pregnancy is associated with an increased rate of miscarriage. Most reported cases of mumps are in children aged 5-9 years.

How do you prevent mumps?

Immunisation given on time is the best method of preventing mumps. Children who have mumps must be kept away from school or early childhood services until 9 days after the appearance of swollen glands. Unimmunised contacts with no history of prior mumps infection are advised NOT to attend school or early childhood services until 26 days after the appearance of swollen glands in the last case.

Vaccines and vaccination against mumps

The measles, mumps, rubella vaccine (MMR) is given as part of the standard immunisation schedule at 15 months and 4-5 years of age. In New Zealand there is no single mumps vaccine available.

How effective is the vaccine against mumps?

Mumps vaccine, as contained in the MMR vaccine, is 95-96% effective at preventing disease. Those who are not protected after the first MMR dose almost always develop protection after the second dose



Child very swollen under the jaw and in the cheeks due to mumps

(Photo Courtesy of Centers for Disease Control and Prevention: Mumps meningoencephalitis and unilateral deafness were common place prior to routine immunisation with the mumps vaccine.)

Who should get the vaccine?

In New Zealand, the first dose is offered at 15 months as maternal antibodies passed from mother to baby before birth may inactivate vaccine given to younger infants. The second dose is offered at 4-5 years.

Who shouldn't have the vaccine?

The general contraindications, which apply to all immunisations, apply to the MMR vaccine. These people should not be vaccinated:

- Anyone who has experienced anaphylaxis to a previous dose of MMR or any mumps containing vaccine, or to neomycin or gelatin.
- Anyone who has received another live vaccine (BCG or chickenpox vaccine) within the previous month, immune suppressed individuals.
- Anyone who has received immunoglobulin or a transfsion within the last 11 months.
- HIV infected individuals who are severely immune compromised.
- Pregnant women should not be vaccinated, and women are advised to avoid pregnancy for one month after being given the MMR vaccine.
- Babies under 12 months should not be vaccinated except in a measles outbreak situation and on advice from a Medical Officer of Health.

Who should seek more advice before having the vaccine?

Anyone who has had a serious reaction to a previous dose of theMMR vaccine or any of its components. Egg allergy is no longer considered a contraindication to MMR (rather a precaution depending on the severity of the reaction).

Do you need all the doses?

2 doses of MMR vaccine at least one month apart are required to assure protection of nearly all recipients.

Is the vaccine safe?

The risk of MMR vaccine causing serious harm is extremely small (refer to the table below for side effects). MMR vaccine is far safer than getting mumps (or measles or rubella) infection.

FAQs

Does MMR vaccine cause mumps?

There has been one poorly documented case report of transmission of mumps vaccine strain from a vaccine that is no longer in production.

Can the MMR vaccine cause autism?
There is no evidence that the MMR vaccine causes autism,
Crohns disease or ADHD,

Does the MMR vaccine contain thiomersal (or mercury)? No.

Mumps

A highly contagious viral infection spread by saliva; causes swollen neck glands and fever.

Effects of Disease

- Aseptic meningitis (15 %)
- Orchitis (20% post pubertal males)
 Rarely, sterility may occur
- Oophoritis (5% post pubertal females)
- Encephalitis (1 per 6000) Death in these individuals is 1.4%
- Overall case fatality rate of 1.8 per 10,000
- Mumps contracted during pregnancy increases the risk of miscarriage

Side Effects of Vaccine

- Local reactions are rare. The most common reaction is mild rash and fever (< 5 %)
- Aseptic meningitis from the mumps component (1 per 100.000)
- Encephalitis (1 per million)
- Anaphylaxis (<1 per million)

Vaccines are prescription medicines. Talk to you nurse, doctor or midwife about any risks and the benefits of immunisation.

TAPS NA 2944 Mump-P-2944 May 2008