

Information about the nasal flu vaccine and 'viral shedding'



Although vaccinated children are known to shed virus a few days after vaccination, the vaccine virus that is shed is less able to spread from person to person than the natural infection. The amount of virus shed is normally below the levels needed to pass on infection (transmit) to others and the virus does not survive for long outside of the body. This is in contrast to natural flu infection, which spreads easily during the flu season. In schools using vaccine, therefore, the overall risk of influenza transmission is massively reduced by having a large number of children vaccinated.

Despite the overall low risk of transmission, some parents of children with immune problems may be concerned about their child being exposed to vaccinated children in the two weeks following vaccination. In the US, where there has been extensive use of LAIV for many years, serious illness amongst immunocompromised contacts who are inadvertently exposed to vaccine virus has never been observed.

Furthermore, there have been no reported cases of live vaccine virus transmission in health care workers who administer the vaccine or in close contacts, including those who are pregnant. As a precautionary measure, however, very severely immunocompromised healthcare workers should not administer LAIV.

Should immunocompromised children or staff be excluded from school when LAIV is being administered?

Excluding children or staff from school during the period when Fluenz Tetra is being offered is not necessary. The only exception to this would be if the person is extremely immunocompromised (for example has just had a bone marrow transplant). These people are normally advised not to attend school/work because of the more definite and higher risk of them acquiring other infections.

What vaccine should I use if the child is living in the same house as someone who is immunocompromised?

There is a theoretical potential risk of transmission of the live attenuated flu virus in Fluenz Tetra to very severely immunosuppressed contacts (for example bone marrow transplant patients requiring isolation) for one to two weeks following vaccination. The NIAC guidelines advise that "Children who live with severely immunosuppressed persons requiring isolation (e.g. post haematopoietic stem cell transplant) should not receive the Quadrivalent Live Attenuated Influenza (LAIV) nasal vaccine". This is a precautionary measure. As the vaccine viruses are cold adapted, they cannot replicate efficiently at body temperature. Millions of doses of LAIV have been administered in the US for over 10 years and serious illness amongst immunocompromised contacts inadvertently exposed to vaccine virus has never been observed. Any child living with a person who is immunocompromised by treatment or disease may have the LAIV vaccine unless the person has to live in total isolation room.