



Public Health
England

**The children's flu vaccination
programme, the nasal flu vaccine
Fluenz and porcine gelatine**

Your questions answered

Why are healthy children being offered flu vaccine?

Flu is a disease that spreads very rapidly, potentially causing widespread illness, especially in those who are already vulnerable because of their age or medical condition. So if children are vaccinated against flu they will not only benefit directly by being protected themselves, they will also reduce the spread of flu and help protect the whole population. In particular, they will help to protect those children and adults who cannot or do not have the vaccine. This includes children under the age of two and children with illnesses like severe asthma who can become very unwell but who cannot have the vaccine because it is not suitable.

Why is the Fluenz nasal spray vaccine being used?

The flu virus enters the body through the nose and mouth. From there it is transmitted to the throat and upper airways where it rapidly replicates and goes on to cause the symptoms of flu. Because Fluenz also enters the body through the nose it mimics the flu virus and results in a better immune response than an injected vaccine. This means that, compared with injected and less active vaccines, Fluenz:

- is more effective
- provides protection for longer
- may offer protection against slightly different types of flu virus
- is easier to give and more comfortable to have

Because Fluenz reduces the amount of flu among all children, not just the ones who have the vaccine, there should be less demands on doctors and nurses during the busy winter season and fewer days missed from childcare, nursery and school. In turn, this means less worry for parents and less time away from work and other activities, caring for children who are unwell.

But doesn't Fluenz contain ingredients that come from pork? What does that mean for children from some faith groups?

The nasal flu vaccine does contain gelatine that comes from pork as one of its additives. Gelatine is commonly used in a range of medicines, including many capsules and some other vaccines. The gelatine used in Fluenz is a highly purified product used to stabilise this live viral vaccine. Very many stabilisers were tried out by the manufacturers and this gelatine was chosen. A change to the stabiliser would require a major programme of additional testing before it could be approved for use in children.

The following statements from representatives of the Jewish community may help parents reach a decision about having their child vaccinated:

Rabbi Abraham Adler from the Kashrus and Medicines Information Service, said:

"It should be noted that according to Jewish laws, there is no problem with porcine or other animal derived ingredients in non-oral products. This includes vaccines, including those administered via the nose, injections, suppositories, creams and ointments."

Why has PHE issued this clarification?

When the vaccine programme was launched in 2013, PHE referred to a document written by a Muslim representative of the World Health Organization (WHO) some years ago in response to queries from Muslims about gelatine in vaccines and other medicines.

After being informed that the WHO document is not acceptable to Muslims of many schools of Islamic jurisprudence (madhahib), PHE has consulted further with leading Muslim organisations. PHE is aware that Islamic scholars of the Hanafi school from the UK have classified Fluenz as not permissible.

Why is PHE still recommending a vaccine that may not be permissible for the parents of Muslim children?

PHE is still recommending the use of Fluenz because, compared with injected, inactivated vaccines, Fluenz:

- is more effective
- provides protection for longer
- may offer protection against slightly different types of flu virus
- is easier to give and more comfortable to have

PHE would like to inform the Muslim communities of the UK of the issues surrounding the vaccine so that they can make an informed decision about whether or not it is acceptable for their children.

Does the flu vaccine contain any DNA from pigs?

No; very sensitive scientific tests have shown that the flu vaccine does not contain any detectable DNA from pigs.

This analysis indicates that the gelatine is so degraded that the original source cannot be identified.

What should I do if I can't have the nasal flu vaccine?

Having fully informed yourself of the advantages and disadvantages of having or not having your child vaccinated, the consent decision is your's. If you or your child have any underlying medical conditions that put you at specific risk of flu, please talk to your doctor.