

# The flu vaccine: debunking the myths

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#### Introduction

The flu season is upon us again. Influenza or "flu" is an acute viral respiratory infection caused by seasonal influenza viruses. Some people may not experience any symptoms or may only experience mild flu symptoms after being infected. However, flu can also cause severe illness, which can result in serious complications, hospitalisation or death. The flu vaccine is one of the most effective methods to reduce the chance of becoming infected with flu.

The flu vaccine can be given from six months of age and is recommended for everyone, but particularly for those at high risk of complications of flu and for healthcare workers.

This article will be focusing on some of the misconceptions about the flu vaccine.

## Misconceptions about the flu vaccine

## Misconception No 1: The flu vaccine can give you flu

The flu vaccines available in South Africa are inactivated vaccines. This means that the flu vaccine viruses have been "inactivated" or "killed" and therefore cannot cause flu.

The points below contain possible explanations as to why some people may still get flu symptoms, even after they have been vaccinated against flu:

 The flu vaccine only provides protection against flu viruses; the flu vaccine cannot protect against other circulating viruses. Other circulating viruses may cause symptoms similar to flu, for example, a common cold is caused by rhinoviruses.

- The flu vaccine only provides protection against the
  different strains of flu viruses included in the vaccine.
  The trivalent vaccines available in South Africa provide
  protection against the three different strains included in
  the vaccine. Therefore, if a person has been exposed to a
  flu virus that is different from the viruses in the vaccine, he/
  she may still develop flu.
- After receiving a flu vaccine, it takes about two weeks
  for the body to develop immune protection. Therefore, if
  a person is exposed to the flu virus shortly before being
  vaccinated, or during the two-week period after vaccination
  (before protection from the vaccine takes effect), the
  person may not be protected and he/she may develop flu.
- Side-effects such as body aches and mild fever from the flu vaccine may be confused with symptoms of flu. However, side-effects from the vaccine are usually mild and clear within a day or two.
- Some people, for example immunocompromised people, may not develop a good enough response to the vaccine and may therefore still be at risk of developing flu.

## Misconception No 2: If you had the flu vaccine last year, you don't need it this year

For the flu vaccine to work optimally, it is important that the vaccine strains match the circulating strains in the environment as closely as possible. However, the flu viruses have the ability to change or "mutate" in unpredictable ways. If the virus changes enough from one season to the other, the flu vaccine from the previous season will not be effective.

Every year, the World Health Organization recommends which flu virus strains should be included in the flu vaccines. Their recommendations are based on the circulating flu virus for the current flu season. This means that the current flu vaccine may differ from the flu vaccine used in the previous season. Hence the need for an updated flu vaccine every year.

In addition, immune protection produced by the flu vaccine declines over time. To ensure optimal protection, it is necessary to vaccinate against flu every year; even when the flu viruses in the current season have not changed from the previous season.

## Misconception No 3: Adults should receive two flu vaccines during the same flu season

Adult patients should only receive one dose of flu vaccine in the same season; studies have not shown any benefit for adults receiving more than one dose of flu vaccine during the same flu season.

However, some children need two doses of the flu vaccine, for example, children six months through eight years who are being vaccinated against flu for the first time. The immune system is "primed" with the first dose. The second dose provides immune protection and should be administered at least 28 days after the first dose.

#### Misconception No 4: It is too late to be vaccinated

The flu season in South Africa is usually during the winter months; it usually begins in the first week of June. However, the flu season can vary and in the past years, it has "started as early as the last week of April or as late as the first week of July".

The best way to prevent flu is to be vaccinated, preferably, before the flu season starts. However, it is never too late to be vaccinated; getting the flu vaccine later will still provide protection during the rest of the season.

## Misconception No 5: The flu vaccine cannot be given during pregnancy

Pregnant women are considered to be at risk for severe/complicated influenza disease. The flu vaccine is therefore recommended during pregnancy and can be given in all stages of pregnancy and during the post partum period. Vaccination

during pregnancy protects women during and after pregnancy and also protects a baby after birth against flu.

### **Summary**

There are quite a few misconceptions about the flu vaccine, which may prevent people from having an annual flu vaccine. The pharmacist's assistant is in an ideal position to dispel these myths. In addition to the flu vaccine, other important measures to prevent the spread of viruses include basic hand hygiene (wash your hands often or use a hand sanitiser) and cough etiquette (cough/sneeze into your elbow or a tissue to limit the spread of germs).

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