



# Importance and Effectiveness of Chickenpox Vaccine

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## DESCRIPTION

Chickenpox is a highly contagious viral infection that is common in children. While most cases of chickenpox are mild, the infection can lead to serious complications in some cases. Chickenpox, also known as varicella, is a highly contagious viral infection that is characterized by a blister-like rash, itching, and fever. The infection is caused by the Varicella-Zoster Virus (VZV) and is spread through direct contact with an infected person or through airborne respiratory droplets.

In the United States, there are two licensed chickenpox vaccines: ProQuad® and Varivax®. Varivax® is approved for use in both children and adults and only contains the chickenpox vaccine. The chickenpox vaccine and the Measles, Mumps, and Rubella (MMR) vaccine are included in the ProQuad® combination vaccine. ProQuad® has been approved for use in children aged 12 and older.

The chickenpox vaccine is a live vaccine and contains a small amount of weakened chickenpox-causing virus. The vaccine stimulates the immune system to produce antibodies against the virus, which provides protection against future chickenpox infections. The vaccine is highly effective in preventing chickenpox, with studies showing that it can reduce the risk of developing chickenpox by up to 90%.

## Types of chickenpox vaccines

There are two types of chickenpox vaccines, the varicella vaccine and the MMRV vaccine. The varicella vaccine contains a weakened form of the varicella-zoster virus, which causes chickenpox. The MMRV vaccine contains the varicella vaccine in addition to vaccines for measles, mumps, and rubella.

## Effectiveness of chickenpox vaccines

Chickenpox vaccines are highly effective in preventing chickenpox. According to the Centers for Disease Control and Prevention (CDC), one dose of the varicella vaccine is about 90%

effective in preventing chickenpox, while two doses are about 98% effective. The MMRV vaccine is also highly effective in preventing chickenpox.

## Safety of chickenpox vaccines

Chickenpox vaccines are safe and well-tolerated by most people. The vaccines are thoroughly tested for safety before they are approved for use. However, like all vaccines, chickenpox vaccines can cause side effects. The most common side effects of chickenpox vaccines are mild and include pain and redness at the injection site, fever, and rash.

## Side effects of chickenpox vaccines

While the side effects of chickenpox vaccines are generally mild, some people may experience more serious side effects. Rarely, chickenpox vaccines can cause allergic reactions. Additionally, the MMRV vaccine has been associated with an increased risk of febrile seizures in children. However, the risk of serious side effects from chickenpox vaccines is very low. It is important to note that the chickenpox vaccine is not recommended for everyone. As the chickenpox vaccine is a live vaccine, people with weakened immune systems, such as those undergoing chemotherapy or with HIV, cannot receive the vaccine themselves. However, people who live with or care for individuals with weakened immune systems should receive the vaccine to protect themselves and their loved ones from chickenpox.

## CONCLUSION

Chickenpox vaccines are a safe and effective way to prevent chickenpox. The vaccines are highly effective in preventing chickenpox and are generally well-tolerated. While the vaccines can cause side effects, serious side effects are rare. The CDC recommends that all children receive two doses of the varicella vaccine, and adults who have not had chickenpox or have not been vaccinated should also receive the vaccine.

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