

# Immunity and Vaccination



Antibodies make the person immune to diseases.

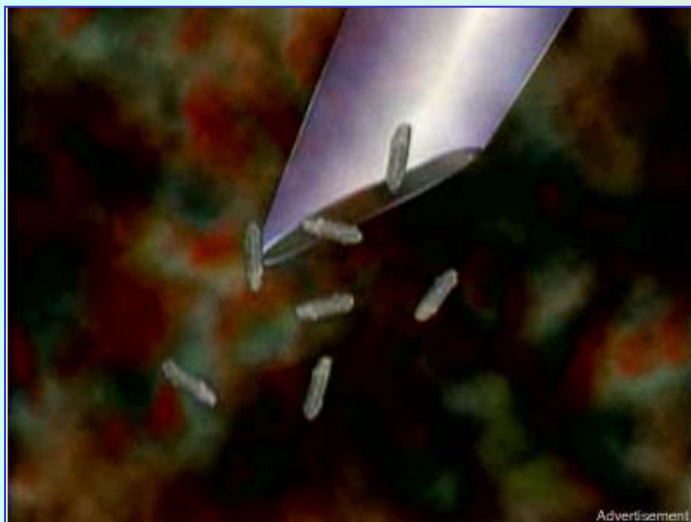
Immunity means that once the person becomes sick with the disease she can't become sick again with the same disease.

Becoming sick with the disease is the only way to get immunity.

Vaccination can also provide protection.



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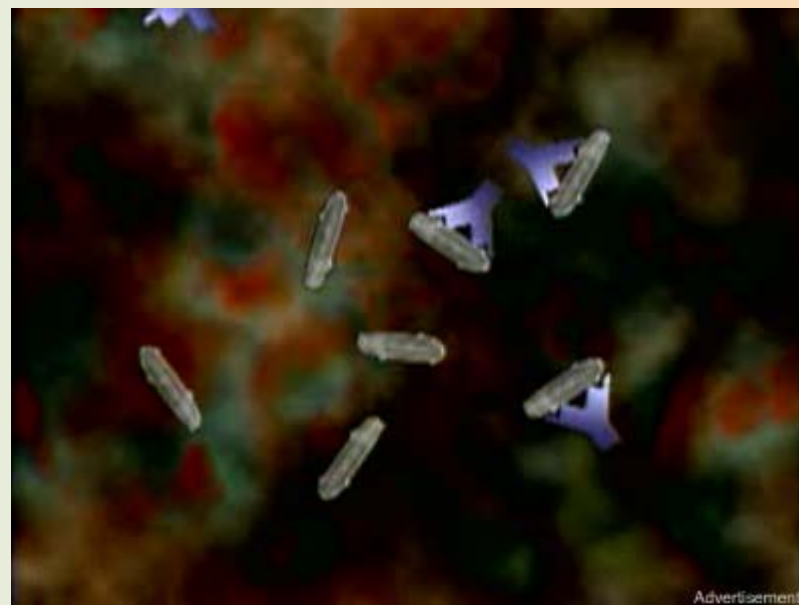


A vaccine contains weakened or dead forms of the germ.

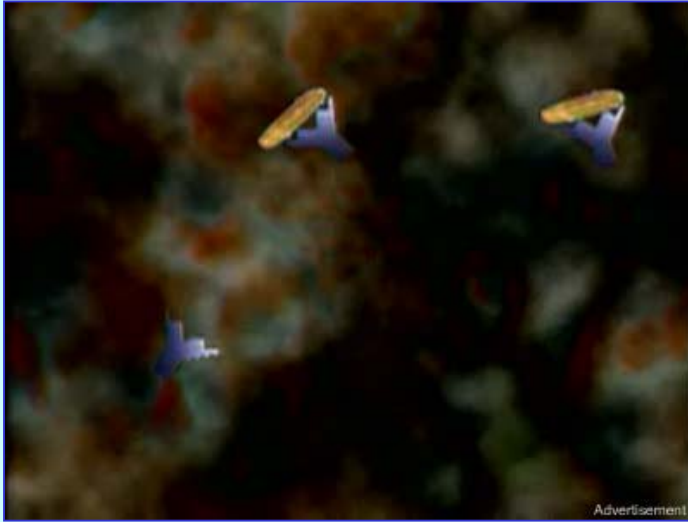
These germs can't cause any harm but even though they are harmless they have the same antigen markers on their surface as the strong living pathogens.

The body's immune system reacts as if they were dangerous by producing antibodies.

The body also remembers for the future what the markers are.



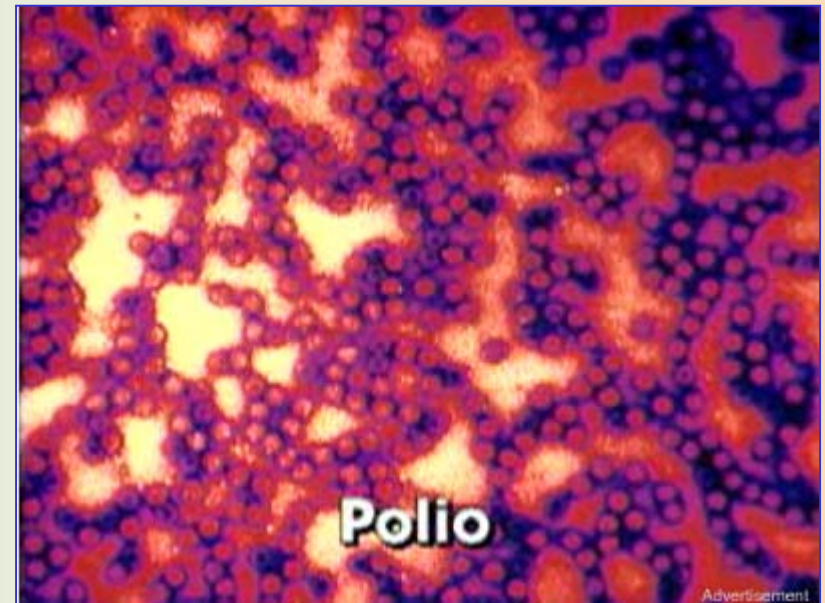
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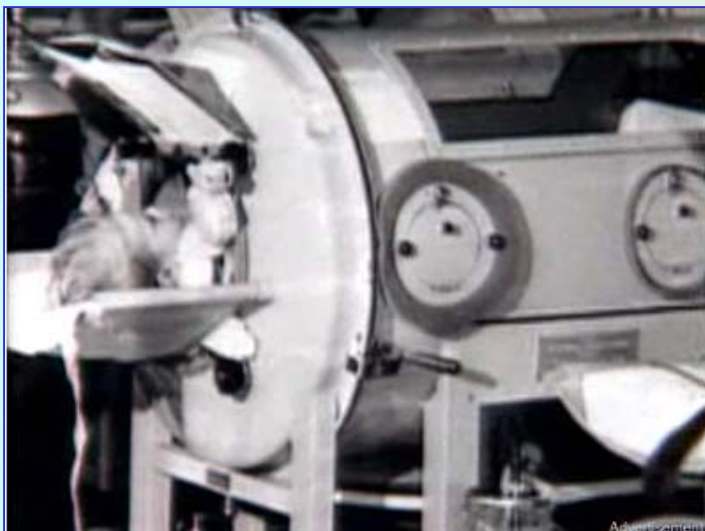
It means that if we are exposed later to the alive and powerful germs later there will be some protective antibodies ready to attack and the body will be able to quickly produce more antibodies.

The polio virus attacks the nervous system. 50 years ago there were no vaccine against this virus.

In some cases, the victim's legs were seriously weakened or paralysed.



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In other cases it affected the person's ability to breathe. Thousands of patients depended on cumbersome iron lungs to stay alive.

Many people died from polio. Children were particularly at risk.

But in 1955, Dr Jonas Salk developed an effective vaccine.

