A person with smallpox becomes contagious when they get a fever. A person becomes more contagious when they get the rash. At this stage, the infected person is usually very sick and not able to move around in the community. The infected person is contagious until the last smallpox scab falls off.

Immunization

Have you ever heard of smallpox? Has anyone in your family had smallpox? You probably answered that no one in your family has had smallpox. This is because scientists have discovered how to prevent smallpox through **vaccination**. Edward Jenner was one of the first scientists to discover how to protect people from diseases through vaccination. He listened to stories about who got sick and who did not get sick and made sense of the reports he heard. He figured out how **immunization** might work based on these reports. These reports are called **case studies**.

The year was 1796. There were no cars, no telephones, and no electricity in houses. Edward Jenner heard that milkmaids, girls who milked cows, did not get smallpox. However, milkmaids did get a disease similar to smallpox from milking the cows. It was called cowpox. Unlike smallpox that killed many victims, the milkmaids only had a few blisters, felt a little tired, and had some aches.



This picture shows Jenner transferring fluid from a cowpox blister into a cut on a boy's arm.

vaccination: the process by which a substance that protects a person from a disease is given.

immunization: a medical treatment that helps protect you from disease.

case study: an observation of a person or group to use as a model.