

MEASLES: THE FACTS

The measles outbreak in Texas has sickened at least 250 people who were not vaccinated or whose vaccination status is unknown as of March 14th. The large majority are children. More than 30 children have been hospitalized, several in the ICU. One has died.

Fourteen other states have reported cases of measles, including New York, New Jersey, Pennsylvania and Maryland. Most of these nearby cases have been sporadic cases from travelers outside of the United States.

Typical symptoms of measles are high fever, cough, runny nose, and red watery eyes. That is followed by a red “bucket of rash” poured over the child’s head that begins on the face & hairline, and then spreads downward. If there are no complications, the symptoms will usually resolve in about a week. Why is this outbreak of measles such a big deal?

Measles is a very serious viral infection. Prior to the availability of the measles vaccine in 1963, the World Health Organization reported that major measles epidemics occurred every 2 to 3 years resulting in 2.6 million deaths globally in each epidemic year. In the United States measles caused 3-4 million cases, 48,000 hospitalizations and 400-500 deaths annually. The vaccine eliminated measles by the year 2000. Elimination means that the virus

is not spreading within a community. That elimination status is on the brink. In 2024 there were 285 cases and 16 outbreaks (3 or more cases in a community). We are only three months into 2025 and we have already exceeded these numbers, and the situation is only getting worse.

One out of 5 children with measles will be hospitalized. One out of 10 will develop ear infections and potentially permanent deafness. One out of 20 will develop pneumonia, the most common reason that a child with measles will end up hospitalized. One out of 100 end up with encephalitis (brain inflammation). One to three out of every 1000 patients will die. Measles can also cause “immune amnesia” by killing immune memory cells. That makes the child at increased risk for other infections, including some that they previously had immunity against. This increased susceptibility to other illnesses and even death can last for 2-3 years.

Measles is extremely contagious, perhaps the most contagious virus that exists. It is much more contagious than Covid or the flu. Nine out of 10 people who are not immunized that are exposed to measles will be infected. Each measles patient infects an average of 12-18 people. In comparison, each Covid patient infects 2 other people. Measles virus lingers in small droplets in the air and on surfaces for 2 hours. Just being in a room that a person with measles was in two hours before is enough to lead to

infection. Patients are contagious for 4 days before (before any symptoms at all) and 4 days after the characteristic rash.

The care for a patient with measles consists of isolation or quarantine, fluids, and control of fever/discomfort. Vitamin A can be given to patients who are sick with measles. It can help fight measles. This is most important in developing countries where vitamin deficiency is very common. But Vitamin A should only be given as prescribed/advised by a health care provider. It is toxic at high doses. Vitamin A does not prevent measles. Only the vaccine prevents measles. One dose of the vaccine is 95% effective. Two doses are at least 97% effective. People exposed to measles should receive MMR (measles, mumps, rubella) vaccine within 72 hours of the exposure. Immune globulin can be given within 6 days of exposure.

When vaccines eliminated measles and other childhood illnesses, fortunately and unfortunately, the success of those vaccines also helped us start to forget these childhood infections and how serious they can be. Vaccines are becoming victims of their own success.

Since Edward Jenner developed the smallpox vaccine more than 200 years ago, vaccines have been the first line of defense against deadly infectious diseases. They have saved more lives than ANY other medical intervention in human history. Globally, vaccines have saved 154 million lives and trillions of dollars in economic and healthcare

costs over the past 50 years. As a physician who has been practicing pediatrics for over 45 years, I have had the misfortune of seeing deaths from Haemophilus influenza, meningitis, chicken pox, whooping cough, Covid, the flu, and other “routine” childhood illnesses. Vaccines will not always keep your child from getting a disease, but they will almost always keep your child from ending up in the hospital or worse. Risks from vaccines are almost always minor, and far outweigh the risks of the diseases for which they are given. It has been definitively proven in hundreds of studies done all around the world that vaccines, including MMR, do not cause autism.

A child has died from measles. In Texas. In the United States. In 2025. The child was unvaccinated but otherwise healthy. This is the first measles death in the United States in a decade. One child dying from a preventable disease is one too many, and is probably not the last.

For truthful, reliable, and scientifically based information regarding measles, vaccines, illnesses, safety, and many other issues concerning children, I highly recommend the parenting website of the American Academy of Pediatrics:

[healthychildren.org](https://www.healthychildren.org). Please call your child’s pediatrician’s office if you have any questions about vaccines or any other child health related questions.

Have a healthy and happy 2025.