

West Nile Virus

What is it?

West Nile virus is a virus commonly found in Africa, West Asia, and the Middle East. It is not known how long it has been in the United States, but the Centers for Disease Control and Prevention (CDC) believe the virus probably has been in the eastern United States since early summer 1999. It is closely related to St. Louis encephalitis virus found in the United States. The virus can infect humans, birds, mosquitoes, horses, and some other animals.

How can I reduce my risk of getting West Nile virus?

Preventing mosquito bites is the best way to avoid becoming infected with the West Nile virus. Remember the “Four Ds” of DEET, Dress, Dusk and Dawn, and Drain:

1. Apply insect repellent that contains **DEET** (N, N-diethyl-m-toluamide), picaridin, or oil of lemon eucalyptus. Spray exposed skin and clothing with repellent. Another option is to use permethrin, which should be applied only to clothing. Be sure to read label instructions on any repellent.
2. **Dress** in long sleeves and long pants when you are outside.
3. Stay indoors at **dusk and dawn**, times when infected mosquitoes are most active.
4. **Drain** standing water in your backyard and neighborhood; old tires, flowerpots, and clogged rain gutters are mosquito-breeding sites.

What are the symptoms?

Most people infected with West Nile virus will not have any signs of illness. Twenty percent of people who become infected will have mild symptoms such as fever, headache, body aches, and occasionally a skin rash on the trunk of the body and swollen lymph glands.

The symptoms of severe infection (West Nile neuroinvasive disease) include headache, high fever, neck stiffness, stupor, disorientation, coma, tremors, convulsions, muscle weakness, and paralysis. Only about one out of 150 people infected with West Nile virus will develop this more severe form of the disease.

The incubation period of West Nile virus in humans is three to 14 days. Symptoms of mild disease may last a few days. Symptoms of severe disease may last several weeks, although neurological effects may be permanent. Rarely, death can occur.

How is it spread?

West Nile virus is spread by the bite of an infected mosquito and can infect people, horses, many types of birds, and some other animals. There is no evidence that West Nile virus can be spread from person to person or from animal to person.

Who is at risk for West Nile virus?

People older than 50 have the highest risk of severe disease, and people with weakened immune systems are at an increased risk for West Nile virus.

How is West Nile virus treated?

There is no specific treatment for West Nile virus infection. In severe cases, intensive supportive therapies are indicated, such as intravenous fluids and medicine to control fever or pain. Antibiotics may be given for any secondary bacterial infection.

Can I be vaccinated for West Nile virus?

Currently there is no vaccine for West Nile virus, but several companies are working toward developing a vaccine.

Is this a seasonal virus?

Cases of West Nile neuroinvasive disease usually occur in the late summer or early fall. However, Texas has a variety of climates; when temperatures are mild, West Nile virus can be transmitted year round. It is best to try to protect yourself all year.

How likely am I to be bitten by an infected mosquito?

Fewer than 1 percent of those bitten by infected mosquitoes become severely ill. If you have the symptoms mentioned in this fact sheet, contact your doctor immediately.

Where can I get more information?

Contact your local health department. West Nile virus information can be found on the Texas Department of State Health Services website at www.dshs.state.tx.us and the CDC website at www.cdc.gov/ncidod/dvbid/westnile/.