

## Dengue Fact Sheet

### What is dengue?

Dengue (den-gee) is a disease caused by any one of four closely related dengue viruses that are spread by mosquitoes. The mosquitoes that spread dengue are named *Aedes aegypti* (yellow fever mosquito) and *Aedes albopictus* (Asian tiger mosquito). These *Aedes* mosquitoes live in many parts of the world, and [up to 400 million people](#) are infected with dengue virus every year.

### Where does dengue occur?

Dengue is common in many tropical and sub-tropical areas of the world where *Aedes* mosquitoes thrive. These areas include parts of Africa, the Middle East, South Asia, Southeast Asia, South America, Central America, North America (specifically Mexico), and the Caribbean. According to the U.S. Centers for Disease Control and Prevention (CDC), almost half of the world's population, about 4 billion people, live in [areas with risk of dengue](#).

Dengue is rare in the United States, but local outbreaks have occurred in some states where *Aedes* mosquitoes are found, including parts of southern Florida, southern Texas, and Hawaii. Dengue is common in many U.S. territories, including Puerto Rico and American Samoa. In California, almost all reported cases of dengue are in people who have traveled to areas of the world where dengue is common. However, rare cases of limited local dengue transmission have been reported in California.

### How do people get dengue?

People get dengue from the bite of an infected *Aedes* mosquito. Dengue virus cannot spread directly from person to person. An *Aedes* mosquito becomes infected when it bites a person who has dengue virus in their blood. About a week after a mosquito bites an infected person, the mosquito is able to transmit the virus to other people when it bites.

The mosquitoes that spread dengue, *Aedes aegypti* and *Aedes albopictus*, are not native to California, but have become established in [multiple counties](#). Local transmission of dengue in California is very rare but is possible under the right conditions.

### What are the symptoms of dengue?

Not everyone who is infected with dengue virus gets sick. About 3 out of every 4 people who are infected never develop any symptoms. If a person does get sick with dengue, their symptoms can be mild or severe.

## Mild Dengue (or “Dengue Fever”)

The most common symptoms of dengue fever include **fever** and any of the following:

- Severe headache
- Pain behind the eyes
- Muscle pain
- Joint and bone pain
- Rash

Symptoms of dengue fever usually last 2-7 days and can be confused with other illnesses that cause fever. Most people get better in about a week.

## Severe Dengue

Severe dengue usually starts with fever and other mild symptoms of dengue fever. However, once the fever starts to go away, signs and symptoms of severe dengue develop within a few hours. The warning signs of severe dengue include:

- Bleeding from the nose or mouth (gums)
- Severe pain in the stomach or abdomen
- Vomiting (at least 3 times in 24 hours)
- Blood in the vomit or stool

Severe dengue causes blood vessels in a person’s body to leak, causing swelling and fluid build-up in the stomach and around the lungs. If not treated, severe dengue can result in death. **Severe dengue is a medical emergency.** People who have had dengue once before, are older than 60, or have a health condition like diabetes are more likely to develop severe dengue.

**If you think you have severe dengue or any warning signs of severe dengue, go to the emergency room immediately.** Be sure to tell the doctor or healthcare provider if you have traveled recently or if you have had dengue before. If you remember being bitten by mosquitoes recently, let your doctor know.

## **How is dengue treated?**

There is no specific treatment for dengue. If you have mild symptoms of dengue, you can treat the symptoms and see a healthcare provider:

- Rest as much as possible
- Drink plenty of fluids (such as water or drinks with added electrolytes) to stay hydrated
- Take acetaminophen (such as Tylenol®) to control fever and pain
  - **Do not** take aspirin or nonsteroidal anti-inflammatory drugs (NSAIDs) like ibuprofen or Advil® because these medicines can increase your risk of bleeding.

Severe dengue may require hospitalization and intensive medical care.

### **If a person has had dengue before, can they get it again?**

Yes. There are four closely related viruses that can cause dengue (DENV-1, DENV-2, DENV-3, and DENV-4). For this reason, a person can get dengue as many as four times in their life. People who have had dengue once before are more likely to get severe dengue if infected with a different strain of dengue virus.

### **How can I help prevent dengue?**

The best way to prevent dengue is to prevent mosquito bites, especially when traveling in tropical and subtropical areas of the world. People who travel to areas where dengue is found should use [Environmental Protection Agency \(EPA\)-registered repellent](#) on clothes and exposed skin to prevent mosquito bites. Other ways to help prevent mosquito bites while traveling or staying in areas where dengue is found include:

- Wearing long sleeves and pants to cover exposed skin
- Using air conditioning (if available) or screens on windows and doors to keep mosquitoes out of places where you are staying
- Sleeping under a mosquito bed net

If you have dengue or have recently traveled to an area with dengue, it's also important to protect your community when you return home. *Aedes* mosquitoes in California can spread dengue if they bite someone that is infected, so it's important to use mosquito repellent and prevent mosquito bites for three weeks **after you return home** so you don't spread dengue to mosquitoes in your community.

You can also help prevent the spread of dengue by preventing the spread of *Aedes* mosquitoes in California. Mosquitoes lay eggs and develop in standing water – you can keep mosquitoes from breeding and biting by removing any standing water in and around your home. Learn more about mosquito control: [CDC Mosquito Control at Home](#).

### **Where can I find more information about dengue?**

- [California Department of Public Health \(CDPH\) Dengue webpage](https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/Dengue.aspx)  
(<https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/Dengue.aspx>)
- [CDPH \*Aedes aegypti\* and \*Aedes albopictus\* webpage](https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/Aedes-aegypti-and-Aedes-albopictus-mosquitoes.aspx)  
(<https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/Aedes-aegypti-and-Aedes-albopictus-mosquitoes.aspx>)
- [U.S. Centers for Disease Control and Prevention Dengue website](http://www.cdc.gov/dengue/)  
(<http://www.cdc.gov/dengue/>)
- [World Health Organization Dengue and Severe Dengue webpage](https://www.who.int/news-room/fact-sheets/detail/dengue-and-severe-dengue)  
(<https://www.who.int/news-room/fact-sheets/detail/dengue-and-severe-dengue>)

Updated September 2024