

### Answers to questions about the Zika virus

January 29 2016



John E. Swartzberg, MD, is an infectious disease specialist at the UC Berkeley School of Public Health and Chair of the Editorial Board of BerkeleyWellness.com. Here he answers seven important questions about the Zika virus, how it spreads, and how you can protect yourself.

# What is the Zika virus and why is it suddenly spreading?

The Zika <u>virus</u> is in a family of viruses, called Flaviviruses, that are spread by mosquitoes. Other viruses in this family that cause disease in humans are West Nile, yellow fever, dengue, and St. Louis encephalitis.



Zika virus was discovered in 1947 in the Zika forest in Uganda, and remained localized to Africa and Micronesia for most of the past 70 years.

The spread of the virus exploded over a year ago for reasons that aren't totally clear. One idea is that international visitors to the 2014 World Cup soccer games in Brazil brought the virus to the Americas; another is that the virus was introduced by Pacific Island competitors in the 2014 international canoe event in Brazil that same year. Today the virus is found throughout South America, Central America, and the Caribbean.

#### Will the Zika virus spread to the United States?

It's only a matter of time before we start seeing the Zika virus in the United States. The World Health Organization <u>estimates</u> that three to four million people in the Americas will be exposed to the virus in the next 12 months, and the mosquitoes that spread the virus exist in the US. The virus is primarily spread by Aedes aegypti, the type of mosquito that also spreads <u>yellow fever</u> and dengue. This mosquito is common in the warm, humid climates of Florida, Hawaii, and Gulf Coast states. Zika can also be spread by the Asian tiger mosquito (Aedes albopictus), which is also found in the US. (Although rare, it is possible that the Zika virus may also be spread through sex or blood transfusions.)

But my guess is that we won't see the Zika virus explode in the States to the extent it did in South America. Our cooler climate makes it more difficult for the mosquitos to spread. We have more aggressive and effective mosquito control. And we have air conditioning in most buildings in the South, which helps reduce contact with mosquitoes.

Also, humans are the primary hosts for Zika—the only reservoir for the virus. With the West Nile virus, which is found in nearly every state, birds are the primary host, which makes that virus harder to control.



## Who is most at risk from infection with the Zika virus?

Pregnant women, especially in their first trimester, are at greatest risk, and the risk is really to the fetus, not to the mom. The epidemiological evidence from Brazil suggests that Zika can cause brain damage—microcephaly—in developing fetuses. From October 2015 to January 2016 there were more than 4,000 babies born with microcephaly in Brazil, compared with an average of 150 cases a year. The virus has been found in amniotic fluid, spinal fluid, and brain fluid in a few cases, further evidence that Zika virus is the cause of microcephaly.

We don't know yet whether the Zika virus poses additional serious risk to children and adults. With the West Nile virus, we know that elderly people are at greater risk for West Nile encephalitis, but we haven't seen that yet with Zika. In Brazil and other countries, they've also seen an increase of Guillain-Barre syndrome (a paralytic disease) in adults following some Zika cases, but it's not clear whether the virus is to blame.

This is all brand new, and it's subject to change every day as we learn more.

#### What are the symptoms of Zika virus?

Infection with the Zika virus is usually a minor disease, which is why previously nobody paid much attention to it. About 80 percent of people with the infection don't show any symptoms. And of those who do get sick, they usually have fever for a few days, and then it goes away.

#### If a person is infected, do they have the virus forever?



Our bodies are very good at eradicating the Zika virus. Once we're over the illness, the virus is gone. The health risks appear to occur only during the few days when the virus is circulating in your body. And it appears that once you've recovered from Zika, you can't get it again.

#### Is there a treatment for Zika virus?

There is no treatment for infection with the Zika virus. Because symptoms are mild, the Centers for Disease Control and Prevention (CDC) recommends rest and nourishment.

But <u>pregnant women</u> who have traveled to an affected country (or who become pregnant while in one of these countries) should consult with a doctor knowledgeable about this disease. Check the <u>CDC's</u> recommendations for pregnant women during a Zika outbreak.

#### How can I protect myself from the Zika virus?

There is no vaccine to prevent Zika infection, although scientists at the National Institutes of Health are working to develop one.

If you're pregnant, avoid traveling to countries in the Caribbean, South America, and Central America, as well as Mexico and Samoa, which are affected by the Zika virus. Check the <a href="CDC's Zika Travel Information">CDC's Zika Travel Information</a>
<a href="page">page</a> for the most current list of countries.

If you must travel to one of the countries, stay in hotels with air conditioning, and use insect repellent every few hours. For more tips, check the CDC's Zika Prevention page.

Provided by University of California - Berkeley



Citation: Answers to questions about the Zika virus (2016, January 29) retrieved 5 May 2024 from <a href="https://medicalxpress.com/news/2016-01-zika-virus">https://medicalxpress.com/news/2016-01-zika-virus</a> 1.html

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.