



COUNTY OF IMPERIAL

PUBLIC HEALTH DEPARTMENT

August 21, 2019

PUBLIC HEALTH ADVISORY

Two Cases of St. Louis Encephalitis Reported in Imperial County

Two Imperial County residents were confirmed with St. Louis encephalitis (SLE), a viral disease spread to people by the bite of an infected mosquito. These are the first human cases of SLE reported in California in 2019. The individuals were admitted to a local hospital in late July with severe headache, fever and nausea, and were diagnosed with viral meningitis. The California Department of Public Health laboratory later confirmed SLE.

A second case of West Nile virus (WNV) also was confirmed in a 56-year-old Imperial County resident who reported no out-of-county travel prior to illness. The individual was diagnosed with neuroinvasive disease in late July.

Imperial County Public Health Department has implemented enhanced surveillance for human cases of mosquito-borne diseases in the community. These recent cases were identified through this active surveillance effort, which suggests that there may be insufficient testing for mosquito-borne illnesses in the community. Vector Control traps and tests mosquitoes countywide and has identified both WNV in Holtville, Westmorland and Imperial, and SLE virus in mosquitoes in Imperial.

Most people infected with St. Louis encephalitis or West Nile virus have no apparent illness. Initial symptoms of those who become ill include fever, headache, nausea, vomiting, and tiredness. Severe neuroinvasive disease (often involving encephalitis, an inflammation of the brain) occurs more commonly in older adults or those with weakened immune systems. In rare cases, long-term disability or death can result.

There are no vaccines to prevent nor medications to treat SLE or WNV. Care is based on symptoms. Reduce risk of infection with SLE virus by using insect repellent, wearing long-sleeved shirts and long pants, and taking steps to control mosquitoes indoors and outdoors.

Recommendations for Clinicians

With both St. Louis encephalitis and West Nile virus circulating in mosquitoes in our community and confirmed human cases of both diseases, health-care providers should keep mosquito-borne diseases in the differential diagnosis.

- Look for symptoms of WNV and SLE virus. It's particularly important to identify suspect cases with the symptoms of more severe illness such as meningitis or encephalitis.
- Test for WNV and SLE because testing:
 - differentiates these viruses from other conditions (enterovirus, other arboviral diseases) and thus may prompt a change in treatment regime
 - results offer anticipatory guidance--both SLE and WNV neuroinvasive disease and WN fever patients can have lingering symptoms and knowing the underlying etiology is helpful for the patient and family members
 - helps mosquito control and public health agencies institute proper control measures to reduce the risk of further cases in the event of a positive result
- Contact the local public health department for details on sample submission and testing by calling (442) 265-1464.

For more information go to:

California Department of Public Health

<https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/VBDS.aspx#>

Centers for Disease Control and Prevention (CDC)

<https://www.cdc.gov/sle/index.html>

###