



Murray Valley encephalitis

What is Murray Valley encephalitis?

Murray Valley encephalitis (MVE) is a rare disease caused by the Murray Valley encephalitis virus. It is spread to humans by infected mosquitoes.

What are the symptoms of Murray Valley encephalitis?

Most people who are infected with the virus that causes Murray Valley encephalitis do not have any symptoms.

Only a small proportion of infected people may get symptoms, and these may include:

- fever
- headache
- nausea
- vomiting
- loss of appetite
- diarrhoea
- muscle aches

Rarely, the MVE virus can cause a severe brain infection known as encephalitis. The danger signs of Murray Valley encephalitis include the following symptoms:

- severe headache
- neck stiffness
- sensitivity to bright lights (photophobia)
- drowsiness and confusion
- coma
- seizures
- loss of consciousness

Among those who get a severe infection, some may have lifelong neurological complications or even death.

If you get these symptoms, contact a doctor right away, or Health Direct on 1800 022 222 or in an emergency call Triple Zero (000) or visit your nearest emergency department.

How is the Murray Valley encephalitis virus spread?

MVE is spread by mosquitoes from infected animals to humans. The primary hosts of MVE are such as herons and egrets. Detection of MVE is likely related to recent rainfall and flooding. This mosquito is common around the Murray Darling River basin areas in NSW during summer.

People are not able to give the virus to other people. People cannot get the virus by touching an infected animal or eating animal products. People with MVE infection develop long lasting immunity that is likely life-long.

Who has a higher chance of getting the Murray Valley encephalitis virus?

Those who are more likely to get Murray Valley encephalitis virus infection are people who live or spend time west of the Great Dividing Range, especially:

- around wetlands or rivers
- if they spend a lot of time outside (e.g., camping, fishing, hiking, gardening).

How do I avoid the Murray Valley encephalitis virus?

There is currently no vaccine against Murray Valley encephalitis. The best way to avoid Murray Valley encephalitis is to not get bitten by mosquitoes. Protect yourself:

- use insect repellent. The best mosquito repellents have diethyltoluamide (DEET), picaridin, or oil of lemon eucalyptus
- wear long, loose fitting and light-coloured clothing and covered shoes when outside
- do not spend lots of time outside at dawn and dusk when mosquitoes are most active
- cover all windows, doors, vents, and other entrances with insect screens
- remove any containers that hold water where mosquitoes may breed
- use insecticide sprays, vapour dispensing units (inside), and mosquito coils (outdoors) to clear rooms and repel mosquitoes from an area
- use mosquito nets or screens

How do I know if I have Murray Valley encephalitis?

If you have the symptoms listed above a doctor may run a test to detect a virus or measure levels of antibodies to Murray Valley encephalitis in samples of blood or spinal fluid.

How is Murray Valley encephalitis treated?

There is no specific treatment available for Murray Valley encephalitis. People with symptoms often need hospital support and sometimes intensive care.

What is the public health response?

Laboratories diagnosing cases of Murray Valley encephalitis must notify the local public health unit. Once the infection is confirmed, public health unit staff will collect detailed information about where the person has recently travelled and where they are likely to have been exposed to infected mosquitoes. The main public health response is to give people advice on how to avoid mosquito bites.

**For further information please call your local Public Health Unit on 1300 066 055.
Visit: www.health.nsw.gov.au/mosquitoes**