What is Ebola Virus Disease (EVD)?

Ebola Virus Disease (EVD) is a serious and often fatal disease caused by a virus. There are several strains of the virus. EVD was previously called Ebola haemorrhagic fever.

Fruit bats are considered to be the natural host of Ebola viruses, with outbreaks amongst other species such as chimpanzees, gorillas, monkeys and forest antelope from time to time. There have been 24 outbreaks in humans of EVD in Central and East Africa since the virus was first identified in 1976. While there is evidence of one strain of Ebola virus being present in animal populations in some parts of Asia, there have been no reports of human illness outside of Africa. The current outbreak is the first in West Africa.

There is no evidence that it is present in Australian bats or other animals in Australia. There have been no cases in Australia.

What are the symptoms?

- Ebola virus can cause a serious illness, with a sudden onset of fever, muscle and joint aches, weakness, and headache.
- The next stage is characterised by vomiting, diarrhoea, rash and malfunction of liver and kidneys.
- Some cases present with profuse internal and external bleeding and progress to multi-organ failure.
- Between 50 and 90% of cases of EVD will die of the disease.

How is it spread?

- Ebola virus is introduced into the human population through close contact with the blood, secretions, organs or other bodily fluids of infected animals (eg through the hunting or preparation of "bush meat").
- Ebola virus then spreads from person to person via contact with the blood, secretions, or other bodily fluids of infected people, and contact with environments contaminated with such fluid, including in healthcare settings.
- Transmission through sexual contact may occur up to seven weeks after clinical recovery.
- Airborne transmission is not known to occur.
- Traditional burial ceremonies conducted in affected areas of Africa are a known high risk activity for transmission.

Who is at risk?

People who are living in or travelling to affected areas of Africa may be at risk of infection; however, the risk of infection is extremely low unless there has been direct contact with the bodily fluids of an infected person or animal (alive or dead).

Caring for ill relatives is a known risk factor for infection, and healthcare workers, particularly those in resource poor settings with inadequate infection control are also at risk.
How is it prevented?
Good hygiene and infection control around EVD cases is the only way to prevent spread of disease. There is no vaccine for EVD. Hunting and contact with “bush meat” in affected areas should be avoided.

What should I do if I become unwell after travel in areas affected by EVD?
If you become ill or feel unwell while travelling in areas affected by EVD, you should not wait until you arrive back in Australia to seek medical assistance. Instead you should phone a doctor or go to the local emergency department.

If you have returned within the last 21 days from travel to areas affected by EVD and develop a fever, vomiting, diarrhoea and other symptoms, you should phone your doctor or go to the emergency department to work out why you are ill. It is important that you mention your symptoms and which countries you have visited when you first arrive at the medical practice or hospital emergency department.

You may be separated from others to prevent further spread of infection.

How is it diagnosed?
EVD is diagnosed by a blood test that detects the virus. Urine and/or a swab from throat or nose may also be examined to look for the virus. Testing for EVD is done in a public health laboratory with special biosafety facilities.

How is it treated?
There is currently no specific treatment for people who are sick with EVD, but general intensive medical care can be life-saving.

What is the public health response?
Special procedures to prevent the spread of EVD are in place to manage the situation in the event there is a case of EVD in Australia. These include:

- Doctors and laboratories are required to notify state/territory health departments of any suspect cases.
- Isolation of suspect cases from other people.
- Identification of people who have been in contact with the case by Public Health authorities so that these people are informed about the risk of infection and monitored for any signs or symptoms of the disease.
- Special safety guidelines including wearing protective equipment to prevent spread of Ebola virus to health care workers managing cases and laboratory staff handling specimens.

Public health unit staff will investigate all cases to find out how the infection occurred, identify other people at risk of infection, implement control measures and provide other advice.

Further information
- World Health Organization (WHO) EVD updates available from the WHO website: (www.who.int/csr/disease/)
- Centers for Disease Control and Prevention (USA) website (http://www.cdc.gov/)
- Australian Department of Foreign Affairs and Trade provides information for travellers on the Smartraveller website (www.smartraveller.gov.au/)

For further information please call your local Public Health Unit on 1300 066 055 or visit the New South Wales Health website www.health.nsw.gov.au