

Venezuelan Equine Encephalitis Virus

VEEV

VEEV is a risk group 3 virus. It is considered a **reproductive pathogen** as it can cross the placenta leading to fetal infection, congenital disabilities, miscarriage, stillbirth, and neonatal death. Children and young adults are more likely to develop encephalitis.

How can I be exposed to VEEV?

- Exposure occurs via mosquito vectors.
- Laboratory workers may be exposed by subcutaneous injection, nasal instillation, and contact with broken skin or contaminated animal bedding. VEEV is very infectious through aerosol transmission.
- Mothers can transmit VEEV to the fetus during pregnancy

How can I protect myself from exposure?

- Avoid direct skin contact by wearing protective clothing and gloves.
- Avoid mucous membrane exposure by using eye/face protection for procedures that may produce splashes.
- Avoid respiratory exposure by using a biosafety cabinet or other primary containment device and wearing a respirator for procedures that may produce aerosols.
- The use of needles, syringes, and other sharp objects should be strictly limited, and additional precautions should be taken when working with animals and mosquitoes.

What should I do if I think I've been exposed to VEEV?

Wash the affected area immediately for 15 minutes with soap and water and seek medical attention.

What symptoms should I look for after a potential exposure?

VEEV usually causes mild to severe flu-like symptoms, such as abrupt onset of headache, muscle aches, fatigue, vomiting, nausea, diarrhea, sore throat, and fever. In 4-14% of cases, neurological complications will develop.

How long does it take for symptoms to develop?

Symptoms develop between 2-6 days after exposure.

Is there a treatment or vaccine?

Treatment usually involves supportive care. Currently there are no vaccinations approved for use in humans although the live attenuated TC-83 may be used as an investigational new drug.

Can I transmit it to other people?

No, individuals are infected by mosquitoes, needlestick, and transmission from mother to fetus.

Can I transmit it to my pets?

No, VEEV can only infect other animals and humans through the mosquito vector although horses can spread the virus to each other through aerosols.

Can it survive on surfaces?

VEEV is relatively resistant to deactivation and can remain viable on surfaces, such as glass, for up to 98 hours.

See *Pathogen Safety Data Sheet* for More Information

