

Marburg virus

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In news— Recently, the first two cases of the Marburg virus, a highly infectious Ebola-like disease, was confirmed officially by Ghana.

What is Marburg virus?

- Marburg virus disease (MVD), earlier known as Marburg hemorrhagic fever, is a severe, often fatal hemorrhagic fever.
- Marburg, **like Ebola, is a filovirus; and both diseases are clinically similar.**
- **Rousettus fruit-bats are considered the natural hosts** for Marburg virus.
- However, the WHO pointed out that **African green monkeys imported from Uganda were the source of the first human infection.**
- **Human infection with Marburg virus disease initially results from prolonged exposure to mines or caves** inhabited by Rousettus bat colonies.
- Once an individual is infected with the virus, Marburg can spread through **human-to-human transmission via direct contact (through broken skin or mucous membranes) with the blood, secretions, organs or other bodily fluids of infected people, and with surfaces and materials** (e.g. bedding, clothing) contaminated with these fluids.
- **It was first detected in 1967** after simultaneous outbreaks in Marburg and Frankfurt in Germany; and in Belgrade, Serbia.
- The disease has an **average fatality rate of around 50%**. However, it can be as low as 24% or as high as 88% depending on virus strain and case management.
- **After the onset of symptoms, which can begin anytime between 2 to 21 days, MVD can manifest itself in the**

- form of high fever**, muscle aches and severe headache.
- Around the third day, patients report abdominal pain, vomiting, severe watery diarrhoea and cramping.
 - In this phase, the appearance of patients has been often described as **“ghost-like” with deep-set eyes, expressionless faces**, and extreme lethargy.
 - Severe blood loss leads to death, often between 8 to 9 days after symptoms begin.
 - **It is difficult to clinically distinguish MVD from diseases such as malaria, typhoid fever** and other viral haemorrhagic fevers.
 - However, it is confirmed by lab testing of samples, which like Coronavirus and Ebola are extreme biohazard risk.
 - **There is no approved antiviral treatment or vaccine for MVD as of now.**
 - It can be managed with supportive care. According to the WHO, **rehydration with oral or intravenous fluids, and treatment of specific symptoms can help prevent death.**
 - The recent outbreak is only the second time that the disease has been detected in West Africa.