

UPSC Notes: Ebola Pandemic

The Ebola Pandemic is an important topic coming under various sub-topics such as public health, epidemics, community health management, health facilities, etc. It is a topic that can be cited in essays concerning these or related topics. The role played by the WHO, governments, health departments, health workers and the community at large, are all factors that need to be thought about and prepared for the UPSC exam. They generally come under General Studies 2 of the IAS exam.

The latest Ebola pandemic occurred in West Africa and lasted between March 2014 and January 2016. This was the most serious of all Ebola outbreaks and records a human casualty figure of more than 11000. The Ebola virus disease has a significantly high mortality rate of a little over 70%.

Ebola Virus Disease (EVD)

EVD is also called Ebola hemorrhagic fever (EHF). It is a viral hemorrhagic fever caused by the Ebolaviruses. Humans get infected with the virus when they acquire direct contact with the virus through broken skin, nose, mouth, or with blood, faeces, vomit, or bodily fluids of an infected person. The virus could also be present in semen and urine. People can also get infected when they make contact with contaminated bedding, clothing, etc. through broken skin. It is not an airborne disease. Close contact with an infected person is needed to pass the virus on.

The disease was first described in 1976 after its outbreak in DR Congo and present South Sudan. There were generally under 500 cases reported every year. Between 1979 and 1994, there were no cases reported at all.

Ebola Symptoms

The symptoms of Ebola include:

1. Fever
2. Sore throat
3. Muscular pain
4. Headache
5. Vomiting
6. Diarrhoea
7. Rashes
8. Decreased liver and kidney function

Symptoms start to show from two days to three weeks after contracting the virus. Some people also bleed internally and externally. The fatal rate for this disease is very high, with 25 - 90 % of

the affected people dying. Death happens usually because of low blood pressure due to fluid loss and occurs 6 to 16 days after the symptoms appear. People can also die from multiple organ failure.

West African Ebola virus epidemic

- The first case in this epidemic (index case) is believed to be a one-year-old boy and was reported to be in a village in Guinea in December 2013. Bats are suspected to be involved in the spread of the virus.
- By March 2014, Guinea reported 59 deaths due to Ebola. By May, there were 281 cases and 186 fatalities.
- By Mid-April, the disease hit Liberia and then Sierra Leone. The disease was spreading rapidly in these parts and a small number of people were also affected in Nigeria and Mali.
- The disease was imported to four other countries too, as a result of aid workers travelling, the countries being the USA, Spain, the UK and Senegal. The three major countries affected most were Liberia, Sierra Leone and Guinea.
- By March 2015, there were more than 25000 cases reported and more than 10000 deaths.
- The epidemics in Nigeria and Senegal were declared over by the World Health Organisation (WHO) in October 2014.
- Sierra Leone was declared free of the disease in November 2015.
- Guinea was declared Ebola-free in December 2015.
- In January 2016, the WHO declared Liberia to be Ebola-free. Liberia was one of the worst affected in this pandemic with a little over 4800 deaths.

Ebola Treatment

As such, there is no treatment for Ebola. In 2016, a vaccine was developed offering 70 - 100% prevention against the disease, called an **rVSV-ZEBOV vaccine**.

An infected person should be isolated completely. Caregivers should wear full protective gear while handling Ebola patients.

WHO declares end to Ebola epidemic

The World Health Organisation declared an end to the deadliest Ebola outbreak ever after no new cases emerged in Liberia.

- Liberia, along with Sierra Leone and Guinea was an epicentre of the latest outbreak.
- There is still ongoing risk of re-emergence of the disease because of the persistence of the virus in a proportion of survivors.

- The Ministry of Health is still carrying out Ebola tests on dead bodies before burial and remains on the lookout for any suspicious cases.