

Health Advisory Update Outbreak of Ebola Virus Disease (*Sudan ebolavirus*) in Central Uganda November 9, 2022

Summary

The Centers for Disease Control and Prevention (CDC) issued a Health Alert Network (HAN) Health Advisory Updated on 11/7/22 as a follow-up to a HAN Health Advisory (Outbreak of Ebola virus disease (Sudan ebolavirus) in Central Uganda) issued on October 6, 2022. This Health Update serves to inform public health departments, public health laboratories, and clinicians in the United States about the ongoing outbreak of Ebola virus disease (EVD) in Uganda caused by Sudan virus (species Sudan ebolavirus). No suspect or confirmed EVD cases related to this outbreak have been reported in the United States (U.S.) or other countries outside of Uganda to date. However, as a precaution because of increasing cases in Uganda, CDC is communicating with public health departments, public health laboratories, and healthcare workers in the United States to provide an update and raise awareness of this outbreak and the potential for importation of cases.

Background

On September 20, 2022, the Ministry of Health of Uganda officially declared an outbreak of EVD due to Sudan virus (species Sudan ebolavirus) in Mubende District, Central Uganda.

As of November 5, 2022, a total of 132 confirmed cases of EVD have been identified in Uganda; 39% of confirmed cases have died. To date, there have been a total of 61 patients with confirmed EVD that have recovered from illness and been discharged. Seven districts in Uganda have reported cases since the outbreak began, including Mubende, Kassanda, Kyegegwa, Bunyangabu, Kagadi, Wakiso, and the capital city of Kampala. Two of these districts (Bunyangabu and Kagadi) have completed 21 days of monitoring of all identified contacts of confirmed cases and have had no new EVD cases identified since. CDC is working closely with the Ministry of Health of Uganda, the World Health Organization, and other partners to support the response to this outbreak.

Travel volume from Uganda to the United States is low, and there are no direct flights from Uganda to the U.S. Since October7, 2022, U.S.-bound air passengers who have been to Uganda in the prior 21 days are being redirected to five U.S. airports where they undergo entry health screenings as part of a layered mitigation approach that, in combination with other public health measures already in place to detect ill arriving travelers, are designed to reduce the risk of introduction and spread of disease in the U.S.

Recommendations for Clinicians

Early consideration of EVD in the differential diagnosis is important for providing appropriate and prompt patient care and to prevent the spread of infection. It is important to systematically assess patients for the possibility of EVD through a <u>triage and evaluation process</u>. In the absence of concern for a suspect EVD case, prior travel to Uganda should not be a reason to defer standard laboratory testing needed for routine patient care.

Given the early non-specific symptoms of EVD, all patients should be asked about recent travel history. EVD should be included as a differential in patients with travel to Uganda in the past 21 days who have clinical symptoms such as fever, headache, muscle and joint pain, fatigue, loss of appetite, gastrointestinal symptoms, or unexplained bleeding. If EVD is suspected, patient(s) should be isolated in a private room with a private bathroom or covered, bedside commode. Clinicians should wear appropriate personal protective equipment (PPE) and limit the number of personnel who enter the room for clinical evaluation and management. Importantly, alternative diagnoses such as malaria, COVID-19, influenza, or common causes of gastrointestinal and febrile illnesses in a patient with recent travel should be considered, evaluated, and managed appropriately.

Healthcare personnel can be exposed by touching a patient's body fluids, contaminated medical supplies and

equipment, or contaminated environmental surfaces. Splashes to unprotected mucous membranes (for example, the eyes, nose, or mouth) are particularly hazardous. Procedures that can increase environmental contamination with infectious material or <u>create aerosols</u> should be minimized. CDC recommends a <u>combination of measures</u> to prevent transmission of EVD in hospitals including PPE, patient placement, and patient care considerations.

Clinicians with concerns about a patient with suspect EVD should contact their local health department immediately (see contact information below). The determination to test will be decided in coordination with the local health department, Texas Department of State Health Services and the Centers for Disease Control and Prevention. Early recognition and identification of a <u>suspect EVD case</u> is critical.

To report a suspected case of Ebola, contact your local health department:

Bexar County Residents:

San Antonio Metropolitan Health District Epidemiology Program Phone: (210) 207-8876

Fax: (210) 207-2007

Residents of Other Counties:

Texas Department of State Health Services Public Health Region 8 Phone: (210) 949-2121

Fax: (512) 206-3995

Clinical and Laboratory Biosafety Considerations

All personnel handling specimens from patients with suspected EVD (especially patients with travel history to Uganda three weeks before symptom onset) should adhere to recommended <u>infection control practices</u> to prevent infection and transmission among laboratory personnel.

Under the Occupational Safety and Health Administration's (OSHA's) Bloodborne Pathogens Standard, laboratories handling blood and body fluids must have a written Exposure Control Plan in place to eliminate or minimize employees' risk of exposure to blood or other potentially infectious materials.

Laboratories should conduct <u>extensive risk assessments</u> to identify and mitigate hazards associated with handling Ebola specimens to create the safest environment. The <u>proper PPE</u> needs to be identified, available, and staff trained to properly don and doff their PPE. Staff need to be specially trained, have passed <u>competency testing</u>, and attended drills to safely receive, handle, and process these specimens.

A laboratory should have dedicated space, equipment for handling and testing specimens from ill patients, and plans for minimizing specimen manipulation.

A <u>waste management plan</u> needs to be in place for lab reagents and Category A waste, including PPE and sample material.

If a facility does not have the appropriate risk mitigation capabilities, then the specimen should be forwarded to another facility that does.

More About Ebola Virus Disease

A person infected with EVD is not contagious until <u>symptoms</u> appear. Symptoms may include fever, headache, muscle and joint pain, fatigue, loss of appetite, gastrointestinal symptoms, or unexplained bleeding. Sudan virus is spread through direct contact (through broken skin or mucous membranes) with the body fluids (blood, urine, feces, saliva, droplet, or other secretions) of a person who is sick with or has died from EVD, with the body fluids of infected animals (including those that died from EVD), or with objects like needles that are contaminated with the virus. EVD is not spread through airborne transmission.

There is currently no Food and Drug Administration (FDA)-licensed vaccine to protect against Sudan virus infection. The Ebola vaccine licensed in the United States (<u>ERVEBO</u>,® <u>Ebola Zaire Vaccine</u>, <u>Live</u>, <u>also known as V920</u>, <u>rVSVAG-ZEBOV-GP or rVSV-ZEBOV</u>) is indicated for preventing EVD due to Ebola virus (species Zaire ebolavirus), and based

on studies in animals; it is not expected to protect against Sudan virus or other viruses in the Ebolavirus genus. There is also currently no FDA-approved treatment for Sudan virus.

In the absence of early diagnosis and appropriate supportive care, EVD is a disease with a high mortality rate. Occasional outbreaks have occurred mostly on the African continent. With intense supportive care and fluid replacement, mortality rates may be lowered. EVD most commonly affects humans and nonhuman primates, such as monkeys, gorillas, and chimpanzees. The genus Ebolavirus is known to comprise the following six species:

- Ebola virus (species Zaire ebolavirus)
- Sudan virus (species Sudan ebolavirus)
- Taï Forest virus (species Taï Forest ebolavirus, formerly Côte d'Ivoire ebolavirus)
- Bundibugyo virus (species Bundibugyo ebolavirus)
- Reston virus (species Reston ebolavirus)
- Bombali virus (species Bombali ebolavirus)

Of these, only four (Ebola, Sudan, Taï Forest, and Bundibugyo viruses) are known to cause EVD in humans. Infection with any Ebola species presents as clinically similar disease. Previous outbreaks of Sudan virus have had a mortality rate of approximately 50%.

The current outbreak in Uganda is the fifth outbreak of EVD caused by Sudan virus in Uganda since 2000. The current outbreak is in the same area as Uganda's most recent EVD outbreak caused by Sudan virus, which occurred in 2012. During that outbreak, limited secondary transmission was reported, and the outbreak was effectively contained.

For More Information

General Ebola Information
General Resources for Ebola Virus Disease

Clinician Resources

- Ebola Virus Disease Information for Clinicians in U.S. Healthcare Settings
- Screening Patients for Ebola Virus Disease
- Considerations for Discharging People Under Investigation (PUIs) for Ebola Virus Disease

Infection Prevention Resources

- Interim Guidance for U.S. Hospital Preparedness for Patients Under Investigation (PUIs) or with Confirmed Ebola Virus Disease
- <u>Infection Prevention and Control Recommendations for Hospitalized Patients Under Investigation (PUIs) for Ebola Virus Disease (EVD) in U.S. Hospitals</u>
- Personal Protective Equipment (PPE) | Public Health Planners | Ebola (Ebola Virus Disease) | CDC Cleaning and disinfecting
- Interim Guidance for Environmental Infection Control in Hospitals for Ebola Virus
- Procedures for Safe Handling and Management of Ebola-Associated Waste