

Ebola Virus Disease (EVD) in Guinea & the Democratic Republic of the Congo (DRC) Update

The Outbreaks:

The CDC, WHO, Health Officials in the affected & neighboring countries, and other stakeholders are closely monitoring the two Ebola outbreaks in the **DRC** (declared 2/7/21) and **Guinea** (declared 2/14/21). These countries are in different parts of Africa (see maps below).

The numbers of those affected, in both countries, varies based on the reporting agency, but as of 3/3/21, the Médecins Sans Frontières (MSF; Doctors without Borders) reported the DRC had 11 Ebola total cases with 4 deaths and more than 800 vaccinated against Ebola, while the WHO African Region reported Guinea had 17 cases, 8 deaths, with 579 contacts, and 1489 vaccinated. The Ebola vaccines are being administered using the ring vaccination model of vaccinating those most at risk of being infected. Medical & support workers in medical facilities, or in, or going into areas, who may encounter sick or exposed patients are vaccinated. This occurs as early as possible when already in an affected area, but will also occur for others going to an at-risk area, preferably before deploying there. The other group being vaccinated are the contacts of those suspected or known to have Ebola, the contacts of the contacts, and then a third tier of contacts. Health Officials from both countries, as well as those in bordering countries, particularly those in close proximity to Guinea, have joined together to mount a Regional approach and, together with the WHO, and other partners such as MSF, are already either screening & monitoring those at border crossing points and in high-risk areas, setting up Ebola Treatment Centers, and preparing teams of workers, both medical and support, to go into communities and help prevent a repeat of expanding Ebola outbreaks. Vaccinations, education about Ebola, how it can be prevented, and if caught, contained and treated, as well as other proven public health measures, are underway.



Outbreak History:

Recent history is pertinent since the DRC recently ended the second largest Ebola outbreak, which was declared over on June 25, 2020, after almost two years. It caused a total of 3481 Ebola cases with 2299 deaths. There was the added challenge of occurring in an active conflict area and refugees in encampments. Likewise, from 2014-2016, Guinea, in West Africa, is where the largest EVD outbreak started and quickly spread to Sierra Leone and Liberia, with a total of 28,616 cases and 11,310 deaths amongst those three countries. Additionally, 36 cases and 15 deaths occurred outside the three main countries, including Italy, Mali, Nigeria, Senegal, Spain, the UK, and the US. Canada has never had an Ebola case.

Current Status of the US & Canada:

The current risk to the US and Canada is considered extremely low and very low, respectively (levels picked by each country). This is partially based on the case numbers being small in both affected countries, and they are currently in remote areas, although each of them do adjoin more populous areas, trade, & travel routes, as well as share borders with other countries.

What the US is Doing ("in an abundance of caution"):

Therefore, since air travel can transport people anywhere in the world in less than 24 hours, including those who may have been exposed to a communicable disease, the US is providing assistance to the affected countries to limit the number of cases and avoid either outbreak from becoming an epidemic, as well as instituting some protective measures for the limited number of travelers that come here from either country.

The US, under the direction of the Administration and with the assistance of various Agencies/Departments including HHS/CDC, DHS/CBP and State, has offered assets including USAID, and put in place other measures to actively protect the US and its citizens, including those that may be called to serve in the area with one of the organizations on the ground in Africa. Those measures in effect include:

- ✓ **Posted Travel Warnings - Level 3 - Avoid Nonessential Travel – to the DRC & Guinea**
- ✓ **As of 3/4/21, the CDC has issued an order requiring all airlines to collect & transmit passenger contact information to the CDC, for public health follow-up and intervention, for all those who were in the DRC or Guinea within 21 days of arriving in the US.** Passengers should expect this information to be verified on their arrival to assure it's complete and accurate. This info will then be securely shared with the US state and local health department of the passenger's final destination, so that health officials can appropriately monitor any arrivals, within their jurisdiction.

- ✓ **The CDC has posted recommendations for organizations that send workers, or individuals who go to assist, to help ensure workers with potential occupational exposure to Ebola are healthy when they return to the United States.**
- ✓ **The US Government is also redirecting all flights of all travelers from Guinea or the DRC to 6 airports that already receive about 96% of travelers from there.** This is where passengers & crew will find enhanced screening & monitoring systems in place to detect possible signs/symptoms of Ebola infection, and have their contact & destination info verified. The receiving airports are:

Airport & Designation	State	Airport & Designation	State
John F. Kennedy Int. (JFK)	NY	Washington-Dulles Int. (IAD)	VA
Chicago O'Hare Int. (ORD)	IL	Newark Liberty Int. (EWR)	NJ
Hartsfield-Jackson Atlanta Int (ATL)	GA	Los Angeles Int. (LAX)	CA

- ✓ **The CDC and Local Health Departments will provide education to the travelers about Ebola, how to care for themselves and protect others in their home or in the community.** They also will assure travelers from the affected countries are monitored, at least throughout the incubation period, for signs/symptoms of Ebola and instructed to immediately seek medical care if they have or develop a fever, muscle pain, sore throat, diarrhea, weakness, vomiting, stomach pain, or unexplained bleeding or bruising during or after their travel. If someone does develop symptoms of Ebola, they and any possible contacts, will be quickly identified. Those with signs/symptoms will be asked to isolate and their contacts to self-quarantine. Public health officials will ensure that anyone who develops suspected Ebola will be medically evaluated and treated.
- ✓ **The US Government, through its agencies & departments, will continue to monitor the current Ebola outbreaks, and work with other international, federal, state & local partners and adapt public health policy & guidance accordingly.**
- ✓ **The US will also continue to work with the outbreak Regions to provide safe travel practices, support border screening, and other measures at key ports & airports in the affected Regions.**
- ✓ **A Regional Treatment Network for Ebola & Other Special Pathogens has been set up to, at least temporarily assess, mitigate, and begin management for patients who may have Ebola or other public health high risk disease.**
Click here for a breakdown of the hospital network:
<https://www.phe.gov/Preparedness/planning/hpp/Pages/hpp-pathogens.aspx>

What EMS, EMS/Fire, & Other First Responders Can Do:

1. Identify at least one person in your Agency to monitor the Ebola situation and watch for any changes to the current recommendations. Changes in recommendations pertinent to the US and Canada will be posted on this site.
2. This is a good time to review, and update as needed, Ebola policies & procedures in place at your Agency and integrate any new information and recommendations into them. The Medical Director and/or a well-educated & experienced Infection Control Practitioner (i.e., Designated Infection Control Officer and/or your Occupational Health Service) should review the policy for correctness and practicality. Consult with local public health authorities for assistance when needed.
3. Assess your current stockpile of "special hazards" PPE, EPA approved Ebola disinfectants (it doesn't have to be for Ebola but should be certified to KILL Ebola), tape to be used to secure PPE, and other items that may be needed if Ebola expands outside of Africa. See the two EMS-specific links found at the end of the document for what equipment should be part of the inventory. The acceptance of sub-standard equipment during the COVID Pandemic because not enough of the "real stuff" was available will not suffice with Ebola. It has to be authentic medical (not industrial) N95 masks, not counterfeit ones & the counterfeits are really good, KN95s (China), KF94s (Korea) or any other substitute. The filters for PAPRs have to be the correct ones for high-risk pathogens and NIOSH approved. The gowns/jumpsuits and aprons resilient enough to not rip during EMS operations. Department heads may have to reach out to government officials to point out this essential need and remind them that special pathogen stockpiles may have been depleted to meet COVID needs and certified and approved replacements are still hard to come by at this time. Below are a few articles that may highlight the specific risks and needs in the pre-hospital environment:

NAEMT Article on Lessons Learned from the Travel-Related Dallas Ebola Pt:

<https://www.naemt.org/docs/default-source/ems-health-and-safety-documents/lessons-learned-from-ebola-newswinter2015.pdf?sfvrsn=0>

EMS1 Article about How Grady Prepared for Ebola Patient Transports:

<https://www.ems1.com/ems-management/articles/how-grady-ems-managed-2-ebola-patient-transports-85biqWyATpg0xN5R/>

NIH Article on EMS Public Health Implications:

<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4251209/>

4. Review the current HHS plan for the Regional Treatment Network for Ebola & Other Special Pathogens and note that 3 hospitals have been designated as National Ebola Training & Educational Centers (NETEC), which includes Emory University in Atlanta, Ga; University of Nebraska Medical Center/Nebraska Medicine in Omaha, NE; and Bellevue Hospital Center in New York City, NY. All three have successfully treated patients with Ebola. The NETEC offers training, resources, readiness assessments, & ongoing expertise to help members of the Regional Treatment Network for Ebola and Other Special Pathogens prepare for pandemics and other emerging threats related to

infectious disease outbreaks. The Clinical Center at the National Institute of Health in Bethesda, MD is also capable of treating patients with Ebola and other special pathogen diseases in a specialized biocontainment unit.

5. It is also a good time to consider doing refresher training, while realizing for some, this may new info & training. Consider the following:

- a. Before the COVID Pandemic, many hospitals and EMS, Fire and Law Enforcement agencies were not very familiar with the constant proper use of full PPE, especially using N95s, PAPRs, Face Shields, Gowns/Jumpsuits, Head & Foot Covers, etc. That has changed, somewhat, with a year of actually using these items to reduce exposure to COVID. That's a positive thing because many more Prehospital & Healthcare Workers are well practiced at donning & doffing the PPE. However, with Ebola, there is more to donning & doffing, including disinfection during doffing, and the stakes are even higher.
- b. Practicing the buddy system of donning PPE, doffing of PPE with disinfection (currently, without destroying the PPE so that it can be continuously reused for training). An observer should be constantly monitoring the practice, and make immediate corrections, as they would if the situation was real.
- c. Reviewing appropriate protection & decontamination of reusable equipment (such as cables, monitors/defibrillators), how to properly discard disposable equipment, and disinfect the transport vehicle.
- d. Consider practicing with a pseudo germ preparation (Glo Germ, Germ Juice, or GlitterBug) that can be visualized only under blacklight, should improve employees' approach to PPE and disinfection for all diseases. With Ebola and a few others, it may save their life(s).
- e. Employees should also be reminded of post exposure policies & procedures, as should those that are likely to be contacted should an exposure occur.

There are two primary documents currently available with EMS-specific guidelines that provide a lot of guidance and should be utilized by 911 PSAPS, EMS and Fire/EMS Systems throughout the United States and its Territories to assure the safest environment possible for First Responders and all patients.

One is ***Guidance for Developing a Plan for Interfacility Transport of Persons Under Investigation or Confirmed Patients with Ebola Virus Disease in the United States.***

<https://www.cdc.gov/vhf/ebola/clinicians/emergency-services/interfacility-transport.html>

Another is ***Interim Guidance for Emergency Medical Services (EMS) Systems and 9-1-1 Public Safety Answering Points (PSAPs) for Management of Patients Under Investigation (PUIs) for Ebola Virus Disease (EVD) in the United States.***

<https://www.cdc.gov/vhf/ebola/clinicians/emergency-services/ems-systems.html>

A page, listing the Resources & Links to other Ebola information that may be useful for First Responders & First Responder Agencies, will be included as an associated document to this one on the *Health Intelligence Page* (HIP) under the *Outbreaks/Emerging Diseases & Keeping Your Employees Safe* categories.

As of now, they are current, but may be superseded or replaced with new information from the CDC, NIOSH, or other governing body, or archived at any time.

The CDC's notice of changes will generally appear at the top of the affected page with posting and last reviewed dates found on the last page of documents. Please note that there have been updates to the CDC Ebola Guidance for Healthcare Workers in 2018, while the CDC EMS/Prehospital Ebola pages have NOT been updated. Consider also referencing them:

CDC Healthcare Worker Guidance for PPE with Ebola Risk:

Unstable/"Wet" Patient: <https://www.cdc.gov/vhf/ebola/healthcare-us/ppe/guidance.html>

Stable/"Dry" Patient: <https://www.cdc.gov/vhf/ebola/healthcare-us/ppe/guidance-clinically-stable-puis.html>

CDC FAQs PPE:

<https://www.cdc.gov/vhf/ebola/healthcare-us/ppe/faq.html>

FirstWatch will be monitoring the Ebola situation closely, and will post changes in outbreak alerts and recommendations, as well as providing links and updates, as more documents are produced by expert organizations and government bodies.