Frequently Asked Questions About Ebola – Updated October 22nd, 2014

GENERAL INFORMATION

This information is pulled directly from the Center for Disease Control (CDC) website. It was updated as of 10/20/14. For the most recent information, please see www.cdc.gov/vhf/ebola (also linked through our intranet site on Ebola Resources)

What is Ebola?

Ebola, previously known as Ebola hemorrhagic fever, is a rare and deadly disease caused by infection with one of the Ebola virus strains. Ebola can cause disease in humans and nonhuman primates (monkeys, gorillas, and chimpanzees).

Ebola viruses are found in several African countries. Ebola was first discovered in 1976 near the Ebola River in what is now the Democratic Republic of the Congo. Since then, outbreaks have appeared sporadically in Africa.

The natural reservoir host of Ebola virus remains unknown. However, on the basis of evidence and the nature of similar viruses, researchers believe that the virus is animal-borne and that bats are the most likely reservoir. Four of the five virus strains occur in an animal host native to Africa.

What countries are involved in the West Africa Outbreak 2014?

The 2014 Ebola epidemic is the largest in history, affecting multiple countries in West Africa including Guinea, Liberia and Sierra Leone. There were a small number of cases reported in Nigeria and a single case reported in Senegal; however, these cases are considered to be contained, with no further spread in these countries as of October 20, 2014.

What cases have been diagnosed outside West Africa (as of yesterday, 10/21)?

One imported case from Liberia and a two associated locally acquired cases in healthcare workers have been reported in the United States and Spain. CDC and partners are taking precautions to prevent the further spread of Ebola within the United States. CDC is working with other U.S. government agencies, the World Health Organization (WHO), and other domestic and international partners and has activated its Emergency Operations Center to help coordinate technical assistance and control activities with partners. CDC has also deployed teams of public health experts to West Africa and will continue to send experts to the affected countries.

As of 10/22/14, the US has implemented action to restrict travel in from West Africa to five (5) designated cities in the U.S.: New York's John F. Kennedy, New Jersey's Newark, Washington Dulles, Atlanta, and Chicago's O'Hare international airports. Additional patients are being triaged as a result of this activity.

GENERAL INFORMATION – Page 2

How is the disease spread or transmitted?
Researchers believe that the first patient becomes infected through contact with an infected animal. When an infection does occur in humans, the virus can be spread in several ways to others. Ebola is spread through direct contact (through broken skin or mucous membranes in, for example, the eyes, nose, or mouth) with:

- Blood or body fluids (including but not limited to urine, saliva, sweat, feces, vomit, breast milk, and semen) of a person who is sick with Ebola
- Objects (like needles and syringes) that have been contaminated with the virus
- Infected animals

Ebola is not spread through the air or by water, or in general, by food. However, in Africa, Ebola may be spread as a result of handling bush meat (wild animals hunted for food) and contact with infected bats. There is no evidence that mosquitos or other insects can transmit Ebola virus. Only mammals (for example, humans, bats, monkeys, and apes) have shown the ability to become infected with and spread Ebola virus.

Can Ebola spread by coughing? By sneezing?
Unlike respiratory illnesses like measles or chickenpox, which can be transmitted by virus particles that remain suspended in the air after an infected person coughs or sneezes, Ebola is transmitted by direct contact with body fluids of a person who has symptoms of Ebola disease.

Although coughing and sneezing are not common symptoms of Ebola, if a symptomatic patient with Ebola coughs or sneezes on someone, and saliva or mucus come into contact with that person's eyes, nose or mouth, these fluids may transmit the disease.

What does "direct contact" mean?
Direct contact means that body fluids (blood, saliva, mucus, vomit, urine, or feces) from an infected person (alive or dead) have touched someone's eyes, nose, or mouth or an open cut, wound, or abrasion.

How long does Ebola live outside the body?
Ebola is killed with hospital-grade disinfectants (such as household bleach). Ebola dried on surfaces such as doorknobs and countertops can survive for several hours; however, virus in body fluids (such as blood) can survive up to several days at room temperature.

How are healthcare workers at risk?
Healthcare providers caring for Ebola patients, and the family and friends in close contact with Ebola patients, are at the highest risk of getting sick because they may come in contact with infected blood or body fluids of sick patients.

During **actual outbreaks** of Ebola, the disease can spread quickly within healthcare settings (such as a clinic or hospital) where hospital staff are not wearing appropriate protective equipment, including masks, gowns, and gloves and eye protection.

GENERAL INFORMATION – Page 3

Are patients who recover from Ebola immune for life? Can they get it again - the same or a different strain?

Recovery from Ebola depends on good supportive clinical care and a patient's immune response. Available evidence shows that people who recover from Ebola infection develop antibodies that last for at least 10 years, possibly longer. We don't know if people who recover are immune for life or if they can become infected with a different species of Ebola.

Can Ebola be spread through mosquitos?

There is no evidence that mosquitos or other insects can transmit Ebola virus. Only mammals (for example, humans, bats, monkeys and apes) have shown the ability to spread and become infected with Ebola virus.

What are the symptoms of Ebola?

- Fever (as of 10/20/14 the threshold fever level set by the CDC is $\geq$ 38.0°C or 100.4°F)
- Severe headache
- Muscle pain
- Weakness
- Diarrhea
- Vomiting
- Abdominal (stomach) pain
- Unexplained hemorrhage (bleeding or bruising)

Symptoms may appear anywhere from 2 to 21 days after exposure to Ebola, but the average is 8 to 10 days.

What is the treatment for Ebola?

No FDA-approved vaccine or medicine (e.g., antiviral drug) is available for Ebola.

Symptoms of Ebola are treated as they appear. The following basic interventions, when used early, can significantly improve the chances of survival:

- Providing intravenous fluids (IV)and balancing electrolytes (body salts)
- Maintaining oxygen status and blood pressure
- Treating other infections if they occur

Experimental vaccines and treatments for Ebola are under development, but they have not yet been fully tested for safety or effectiveness.

Recovery from Ebola depends on good supportive care and the patient's immune response. People who recover from Ebola infection develop antibodies that last for at least 10 years, possibly longer. It isn't known if people who recover are immune for life or if they can become infected with a different species of Ebola. Some people who have recovered from Ebola have developed long-term complications, such as joint and vision problems.

Link to MemorialCare Intranet Ebola Resource Center:
http://mhs.memnet.org/pub/index.cfm?catid=290&anum=38583

Frequently Asked Questions About Ebola – Updated October 22nd, 2014

MEMORIALCARE INFORMATION

This information relates to MemorialCare specific system-wide preparation for screening, assessment and care of potential or confirmed Ebola cases

What is MemorialCare Health System doing to prepare?

In August of 2014, we assembled our initial system wide team to assess our readiness to respond in the event we would ever encounter a patient with Ebola. The CDC, HHS, CDPH, and other sources have provided us with tools and checklists to assess our readiness to safely care for and treat persons infected with EVD while ensuring the safety of our staff and other patients and visitors.

In response to the more recent issues with the cases coming in for care in Atlanta, Nebraska and Texas, we implemented an expanded system-wide team that has been actively working to ensure we are tracking all the evolving recommendations from the national and state agencies. This has helped us share Best Practices, clarify the many questions, and update our site plans based on the new standards and recommendations that have been coming out of the United States.

Key preparation steps taken:

1. We have a **designated response plan** in place at all MemorialCare sites, with specific plans should we receive a patient under active evaluation or confirmed diagnosis.
2. Each campus has provided **targeted training on the key symptoms** to watch for.
3. **Travel alert signage in multiple languages** has been posted in key points of entry to our facilities.
4. A **paper screening tool and documentation form** has been put into place for all of our care sites. In addition we have developed a phone screening script.
5. Our acute hospital **Emergency Departments also have an added Epic screen for Ebola** which then flags to the clinician and physician workflow.
6. The **CDC's checklist for health care has been completed**, and drills have been conducted.
7. **Emergency Department Ebola carts** have been created with all the necessary personal protective equipment (PPE) and supplies in each of our acute care sites should we have a suspected or confirmed case present there, and we continue to have **contact/droplet PPE available for screening of patients at all sites**.
8. **Initiated training and competency validation** at each campus for clinical care staff working in key areas where a **patient with suspected or confirmed Ebola** would be cared for (e.g., acute hospital ED, Critical Care).
9. Created **key workflows** to have available if we ever needed to activate for an actual Suspected/Confirmed case: e.g. laboratory testing, imaging, waste management, decontamination. At that point we would have a lot of help from Public Health and the CDC; and good to have these processes worked out and ready ahead of time.
10. Created a **media response plan**. As a reminder, we have a **media policy** and any communication with the media needs to be in compliance. MemorialCare personnel are not allowed to contact the media as that violates both HIPAA privacy and other policy.

MEMORIALCARE INFORMATION – Page 2

What would happen if a suspected case came to one of our campuses or care sites?
First, screening tools are in place at all care locations to assist in the identification of a "suspect" case of EVD based on travel history and other criteria. If a patient has a positive travel history within the last 30 days to a country on the CDCs watch list for Ebola (currently Guinea, Liberia and Sierra Leone) and/or has had contact with someone who traveled there, and/or has had contact with someone with suspected or confirmed Ebola anywhere, our protocol calls for staff to:

1.
   A. Hand the patient a surgical mask to put on
   B. Move them immediately to a private isolation room or secluded area
   C. Follow STANDARD, CONTACT, and DROPLET precautions during ALL further clinical assessment by one of our health care providers – this means mask, gown and gloves
   D. Notify the provider / physician in charge
   E. Notify hospital or site leadership for further triaging and to activate your campus site plan. If the assessment is indicative of a potential patient with Ebola, we will immediately call the Public Health department for their guidance, and then the CDC if so instructed.
   F. Complete a patient assessment per site protocol for signs and symptoms, and review those findings with the physician and leadership.

If we had a "patient of suspicion", how would public health authorities step in to guide us?
If there is a high level of suspicion of Ebola based on the further screening, our local Public Health and then the CDC would be contacted and further testing would be done. Decisions would be made at that time on the appropriate level of care needed, but the individual would be transferred to a critical care unit, or another hospital.

The CDC has established a team that would come on site within 24 hours, and our local Public Health department would be here very soon after we call them.

Personal Protective Equipment (PPE) for Direct Care of a Suspected or Confirmed Patient with Ebola
The CDC has updated their PPE recommendations as of 10/20/14 for the care of a patient with Ebola. Learning from the cases in Atlanta, Nebraska and Texas, these procedures have been reviewed by our system-wide planning team. The three identified keys to protection across the U.S. include:

1. All healthcare workers (involved in the care these patients) undergo rigorous training and are practiced and competent with PPE, including taking it on and off in a systemic manner
2. No skin exposure when PPE is worn
3. All workers are supervised by a trained monitor who watches each worker taking PPE on and off.

MEMORIALCARE INFORMATION – Page 3

It is key to note that, in the unlikely event that we have a patient with suspected or confirmed Ebola, they would be moved or transported to one of our acute hospital Emergency Departments or as directed by the Health Department, and potentially a critical care area for as long as we might have them. All recent U.S. cases were airlifted to regional centers.

1. We have incorporated all of the current CDC recommendations into updated policies for Donning, Doffing and Observer roles.
2. Each campus has rolled out inservices and competency validation for staff in our Emergency Departments as well as across all care sites. As the procedures have been updated by the CDC, we have updated our procedures.

Who would provide the care to the patient?
Any staff member who has been trained on how to put on (Don) and take off (Doff) appropriate PPE in the presenting and assigned patient care location would be expected to take care of these patients. We have been conducting intense training for staff in anticipation of this possibility. However, additionally, we would expect assistance from the CDC, local public health, CDPH and other outside agencies to augment our efforts at protecting staff, patients and visitors at our campus.

What if I have a health condition or I am pregnant, would I still be expected to provide care?
Let your supervisor or manager know immediately. We would handle any health issues or concerns through our usual process to make a determination if the HCW should be excluded from care.

- Pregnancy: Due to the extreme risk to an unborn baby with EVD, (even though there should be no risk of transmission if following the PPE protocols,), pregnant individuals will be excluded from care.
- Residents, students and volunteers: We will not have residents, students or volunteers involved in the care of suspected or ruled-in Ebola patient.

What happens if a staff member refuses to provide care?
This would be handled following our HR policies.

If I have another question not answered in the General or MemorialCare Section, or any question at all, who do I contact?
If you have any further questions, please notify a member of your Executive Team for further help.

Link to MemorialCare Intranet Ebola Resource Center:
http://mhs.memnet.org/pub/index.cfm?catid=290&anum=38583