

ISSUE BRIEF

SOCIOCULTURAL DIMENSIONS OF THE EBOLA VIRUS DISEASE OUTBREAK IN LIBERIA

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SINCE DECEMBER 2013, AN OUTBREAK OF Ebola virus disease in the West African nation of Guinea has rapidly evolved into a humanitarian crisis of unforeseen proportions, overwhelming vulnerable communities in Liberia, Sierra Leone, Nigeria, and Senegal. While previous outbreaks of Ebola cumulatively resulted in 2,486 cases and 1,590 deaths, the current Ebola epidemic has so far resulted in 8,376 infections and claimed 4,024 lives (as of October 10, 2014), prompting the World Health Organization (WHO) to designate it as a public health emergency of international concern.^{1,2} Officials from the US Centers for Disease Control and Prevention (CDC) estimate that, in the absence of public health interventions, Liberia and Sierra Leone could experience as many as 550,000 cases (or 1.4 million after correcting for underreporting) by January 2015.³

Few research initiatives thus far have analyzed the community dynamics of Ebola outbreaks. Similarly, current relief efforts have not focused on ways to address the social and cultural factors shaping West Africans' perceptions of and responses to Ebola or their perceptions of the international community's efforts to mitigate the epidemic. To date, surveillance and infection control measures have failed to stop the outbreak, prompting WHO to call for greater community engagement efforts to enhance ongoing relief activities.⁴

This article examines some of the social and cultural factors at play in the Ebola outbreak in Liberia and suggests the type of sociocultural investigation that has been largely

absent in attempts to thwart the Ebola threat. WHO assessments show that Liberia has borne the brunt of the current outbreak, having reported the most cases (more than 3,000) and deaths (nearly 2,000), as well as the highest case-fatality rate (70.8%).⁵ Some of the practices and social norms shaping the trajectory of the Liberian outbreak include funeral rituals, disparate gender roles, and the stigma faced by those who contract Ebola.

BACKGROUND

The Republic of Liberia is bordered by Sierra Leone, Guinea, and the Ivory Coast and has a population of just over 4 million people. A poor country, Liberia reported a gross domestic product of US\$1.951 billion in 2013 and was ranked 175th out of 187 countries in the 2014 United Nations Human Development Index.^{6,7} Still, Liberia has been commended for progress made toward achieving its millennium development goals despite major losses in human capital, infrastructure, and resources as a result of 2 episodes of civil war (1989-1996 and 1999-2003).⁸ The war, which resulted in 250,000 deaths and displaced 1 million individuals, also decimated the nation's public health and healthcare assets, leaving Liberians especially vulnerable to various health threats.⁸

After the wars, only 354 of the country's 550 health facilities remained open.⁹ Some 90% of the nation's doctors left the country over the course of the war, leaving

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behind only 168 physicians, mostly in the capital city of Monrovia.⁹ As of 2011, the Liberian healthcare workforce consisted of 8,553 individuals, including 90 physicians, 1,393 nurses, 412 certified midwives, 243 traditional midwives, 286 physician assistants, 1,589 nurse aides, 23 dentists, 173 environmental health technicians, and 376 laboratory technicians, in addition to 3,207 nonclinical workers.¹⁰ Before the current Ebola outbreak, public health programming in Liberia revolved mostly around improving maternal and child health and addressing the challenges associated with HIV/AIDS and malaria.⁹ Although Lassa fever—a viral hemorrhagic disease like Ebola—is endemic in West Africa (with roughly 300,000 infections occurring annually throughout the region), Ebola had never been diagnosed in Liberia before this year.¹¹

FUNERAL RITUALS

In addition to Liberia's infrastructure deficits, certain cultural practices—notably, funerary rituals—have facilitated the continued spread of Ebola. For example, it is estimated that 12.2% of Liberia's population adheres to Islam, which dictates that bodies be buried within 24 hours of death by a family member of the same gender.¹²⁻¹⁴ In Muslim as well as Christian and indigenous Liberian religious customs, it is common for family and friends of the deceased to hold a wake in the home before the burial, both to console each other and to celebrate the life of the deceased.¹⁵ Family members usually handle the corpse themselves, and funeral attendees pay their respects by touching or kissing the body of the deceased.¹⁶ But in the context of Ebola, these practices are especially dangerous, given that the corpses of those stricken by the disease are saturated with virus and therefore highly infectious.¹⁶ In fact, a single funeral held in Dolo Town, Liberia, triggered 52 additional cases of Ebola in the community.¹⁷

Health authorities in Liberia and elsewhere have taken steps to reduce the dangers of these funerals. For example, members of the Liberian Red Cross have begun disinfecting bodies and burial sites with bleach while wearing full personal protective equipment.¹⁷ The United States Agency for International Development (USAID) has donated some 5,000 body bags to Liberian villages to further reduce human contact with the virus. However, many Liberians from Ebola-affected communities distrust health workers. In an effort to preserve the integrity of funeral rituals, these communities have reportedly expelled health workers, hidden infected family members, and even conducted funerals in secret. As a result, new points of Ebola transmission continue to emerge.¹⁷

The Red Cross has had greater success in Sierra Leone, where health workers organize burials according to the wishes of the family of the deceased and take care to disinfect the body as they work.¹⁸ These measures align with WHO guidance, which encourages health workers to respect the customs of communities in crisis and warns

against burying bodies in common graves or holding mass burials during public health emergencies.¹⁹

GENDER DISPARITIES

Perhaps one of the most striking yet underreported dimensions of the Ebola outbreak is that of gender. WHO aggregates of Ebola cases across West Africa show no significant differences between the numbers of men and women infected, and official country-specific estimates are unavailable.^{20,21} However, reports from UNICEF—as well as from authorities and grassroots health workers in Liberia and Sierra Leone—suggest that gender disparities among Ebola patients do exist in certain West African communities.²² In fact, the Liberian Ministry of Health reports that women make up as many as 75% of the Ebola cases reported in that country thus far.²³ This apparent disparity is attributable in part to the fact that women play important roles in funerals, a norm observed in many African countries. WHO reports that during the Ugandan Ebola outbreak of 2000-01, female relatives were primarily responsible for washing and dressing the bodies of the deceased.^{3,24}

Differing gender roles have also contributed in other ways to disproportionate mortality among women during previous Ebola outbreaks. For example, WHO researchers note that many Ebola infections are triggered by contact with forest animals. This means that men, who are often responsible for hunting and butchering animals, are more likely to contract Ebola at the onset of an outbreak.²¹ As these outbreaks progress, however, the brunt of the disease burden shifts to women, who overwhelmingly assume the role of caregivers in Liberian society.²⁴ Women typically feed and clean up after sick relatives, thus heightening their exposure to the Ebola virus.²² And if a man becomes sick, it is considered acceptable for a female caregiver to bathe him, but a male caregiver cannot do the same for a sick woman.²⁵ Such practices not only cause higher rates of Ebola infection among women but also shrink the pool of caregivers available to women who fall sick with the disease.

In addition to serving as caregivers, Liberian women also play important economic roles in their households, taking the lead in food production and facilitating as much as 70% of the country's cross-border trade.²⁶ Thus, recently implemented border closures and travel restrictions in response to the outbreak have disproportionately affected female-led households and diminished the earning power of women throughout West Africa.

Physiological differences between men and women can also translate into disparities in medical outcomes and create barriers to healthcare access. For example, pregnant women may be more susceptible to certain infectious diseases because of their altered immune responses to specific pathogens, including the hemorrhagic fever viruses.^{27,28} As a result, they may be at higher risk of contracting Ebola and developing serious sequelae. During an Ebola outbreak in

the Democratic Republic of the Congo, researchers at Kikwit General Hospital reported that 14 of 15 (95.5%) pregnant patients with Ebola died, 10 of the pregnancies (66%) ended in abortion, and all of the patients presented with severe genital bleeding.²⁹ Despite these risks, pregnant women are often denied medical care during Ebola outbreaks because of their heightened risk of contracting—and, subsequently, spreading—the disease in healthcare settings.³⁰

In general, healthcare workers are much more likely to contract Ebola because of their exposure to the bodily fluids of sick patients, and women dominate certain sectors of Liberia's healthcare workforce: An estimated 98.3% of certified midwives and 57.4% of nurses are women.³¹ These female healthcare professionals in particular could face greater occupational risks as compared to their male counterparts.

Understanding and addressing the gender disparities in Ebola transmission requires changes both in healthcare delivery and research efforts around the disease. To date, most studies of Ebola have focused on the biology of the disease, potential vaccines and medications, and strategies for infection control, but rarely on the impacts of Ebola in specific demographic groups. As a result, medical interventions often neglect to account for the unique perspectives of women, even though women are often important disseminators of information in their communities and could play key roles in delivering public health messages about Ebola. A 2011 WHO report, for instance, describes an Ebola outbreak during which men dominated informational meetings on infection control, despite the fact that women serve as primary caregivers and sustain higher risks of infection.^{28,32} Closing the Ebola gender gap—that is, engaging women in Ebola response efforts and removing healthcare access barriers for women with Ebola—could help affected communities gain greater control over the outbreak.

FEAR AND MISINFORMATION

Misconceptions surrounding Ebola, its transmission, and the people who contract it have complicated efforts to implement outbreak control strategies and formulate effective disease control policies in Liberia. Some of the attitudes and responses of the public—both in Liberia and abroad—to the current Ebola outbreak have been shaped by fear and misinformation.

For example, the media in Liberia have helped raise public awareness of the disease but have also been a conduit for misinformation. Recently, a major Liberian periodical published an article accusing the US Department of Defense (DoD) of deploying soldiers throughout Africa to conduct experiments on infectious pathogens and using unsuspecting Africans as test subjects for these experiments.³³ Similarly, several American and European news accounts of the outbreak have erroneously portrayed African countries as uncivilized, disease-ridden places,³⁴ giving

rise to unfounded fears of Ebola as well as irrational treatment of those suspected of being ill. In Berlin, for instance, an office building was locked down by armed guards after a woman of African descent (who had recently returned from a trip to Kenya) fainted.³⁵ Italy's health minister recently spoke out against rumors of North African immigrants carrying Ebola to Sicily.³⁵ And more than 700 employees of Air France signed a petition requesting that the airline halt travel to West African countries affected by the outbreak.³⁵

These misperceptions could inhibit efforts to control the Ebola outbreak in 2 important ways. First, those from Ebola-affected communities might suspect the motives of foreign soldiers and health workers and refuse to cooperate with them. This could prove to be especially true in Liberia, given that Liberians are still recovering from civil war and might be wary of a military presence in their country. In fact, some Liberian communities have already shown resistance to security forces attempting to enforce quarantines and expressed distrust of their government's authority in a state of emergency.³⁶ As the US begins deploying military medical assets to assist with response efforts, it will have to carefully consider approaches to effective communication so that its military presence will not alarm the communities it seeks to help. Recent public statements from DoD and USAID officials indicate that US military forces have been well-received by the Liberian government and that DoD involvement in Ebola response efforts will build confidence among local populations.³⁷

Second, inaccurate portrayals of Ebola and its causes could make both West Africans and African migrants in other parts of the world the targets of xenophobic attitudes.³⁴ In the social sciences, stigmatizing people in this way is referred to as “othering.” Stigmatizing people could have important consequences not only for Ebola patients, but also for healthcare delivery and policymaking around the disease.³⁸ It normalizes disease among marginalized populations, reinforces the idea that such populations are themselves responsible for their illness, and considers outside intervention justified only when a disease emerges from a marginalized population and threatens the welfare of a wealthier one.³⁹ Misinformation and a limited understanding of West African societies worsen the impacts of stigmatization and could prevent policymakers from formulating effective strategies to contain the current Ebola outbreak and prevent future epidemics. To avoid this, health authorities both in Liberia and elsewhere might consider developing coordinated public health messaging strategies to ensure that policymakers, the public, and medical responders have access to timely, accurate, and reliable information about Ebola prevention and transmission.

CONCLUSION

Several US government agencies—notably, DoD, CDC, and USAID—have made commitments to assist in the response efforts for the West African Ebola outbreak. It is

crucial that medical interventions be executed in a culturally competent manner to ensure their effectiveness. Engaging community leaders in response efforts will increase effectiveness by promoting trust among local people and outside aid groups and will help in preserving Liberian cultural traditions. These same community leaders may also be helpful in devising ways to engage women in infection control efforts and break down barriers to healthcare access. It is also critical that the relief efforts of incoming response teams remain transparent to affected communities to dispel distrust of outsider assistance. If appropriately implemented, these sociocultural interventions could accelerate ongoing medical and epidemiologic efforts and help to more rapidly alleviate the Ebola outbreak in West Africa.

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