The case within aims to accurately portray an actual global health crisis. Please note that the extent of accuracy is limited by potentially biased, yet credible, sources. (We do not intend to impose any views regarding the political conflict noted within). The case also represents a complex scenario which does not necessarily have a correct or perfect solution. Thus, a balance of creative, perceptive, and knowledgeable approaches is encouraged.
EXECUTIVE SUMMARY

According to the 1948 Universal Declaration of Human Rights, everyone has the right to a standard of living, including medical care. However critical workforce shortages, inadequate skills and uneven geographical distribution of the health workforce are major barriers to achieving access to basic health care, let alone a standard level of care.

“One of the challenges for achieving universal health coverage is ensuring that everyone – especially people in vulnerable communities and remote areas – has access to well-trained, culturally-sensitive and competent health staff,” says Dr. Carissa Etienne, WHO Regional Director for the America.

A Universal Truth: No Health Without a Workforce, is a 2013 report from the World Health Organization (WHO) warning that the world will be short 12.9 million health-care workers by 2035; in 2013, that figure stood at 7.2 million. The report highlights 83 countries that fall below the basic threshold of 23 skilled health professionals per 10,000 people.

The West African country of Sierra Leone is one of the countries that fall below the basic threshold, with only 2 health professionals (doctors, nurses and midwives) per 10,000 population. Sierra Leone is one of the poorest countries in the world with an extremely low life expectancy; ranking 183 out of 187 countries in the 2014 United Nations Human Development Report. During the devastating Civil War between (1991-2002), much of the country’s infrastructure was destroyed. The health system was decimated, as there was significant loss to both physical structures and human resources. Few people have access to adequate health care and the continuing Ebola outbreak in West Africa further threatens the already weakened system.

You represent a consulting group to the government of Sierra Leone and seek to analyze the situation regarding the health workforce shortage in Sierra Leone. You must consider the country’s available resources, its historical context, the consequences of the temporary emergency care and response currently provided, best practices in health policy, and innovations in what constitutes total health and wellness. Provide your team’s recommendations to the issue utilizing unique backgrounds and expertise from the many colleges and departments represented.

3 http://www.who.int/workforcealliance/knowledge/resources/GHWA-a_universal_truth_report.pdf?ua=1

© 2015 UF Global Health Case Competition
ASSIGNMENT

This case packet provides students with an overview of the following global health issue and country of interest: health workforce shortage in Sierra Leone. Student teams must prepare their recommendations to the key issue presented in this case:

How do you address the critical shortage and uneven distribution of the health workforce in Sierra Leone?

OVERVIEW OF COUNTRY: SIERRA LEONE

Population:
(2014 estimate)
5,743,725
- Urban population: 39.2% of total population (2011 estimate)
- Population below poverty line: 70.2% (2004 estimate)
- Religion: 60% Muslim, 10% Christian, 30% indigenous beliefs
- Labor force: 2.207 million (2007 estimate)

Age Structure:
(2014 estimate)
- 0-14 years: 41.9%
- 15-24 years: 18.8%
- 25-54 years: 31.6%
- 55-64 years: 3.7%
- 65 years+: 3.7%

Median Age:
(2014 estimate)
- Total population: 19 years
- Male: 18.5 years
- Female: 19.6 years

Figure 1: Map of Sierra Leone (Source: http://www.whosierraleone.org/3_media/cprofile.html)


© 2015 UF Global Health Case Competition
Birth and Death Rate:
(2014 estimate)
- 37.4 births/1,000 population
- 11.03 deaths/1,000 population

Location:
Western Africa, bordering the North Atlantic Ocean, between Guinea and Liberia

Net Migration Rate:
(2014 estimate)
- 3.12 migrant(s)/1,000 population

GDP:
$9.156 billion USD (PPP, 2013)
- Services: 33.5%
- Industry: 18.6%
- Agriculture: 47.9%

GDP Per Capita:
$1,400 (PPP, 2013)

Health Expenditures:
18.8% of GDP (2011)

Physician Density:
0.02 physicians/1,000 population (2010)

Hospital Bed Density:
0.4 beds/1,000 population (2006)

Literacy:
(2011 estimate)
- Total population: 43.3%
- Male: 54.7%
- Female: 32.6%
- Age 15 and over that can read and write English, Mende, Temne or Arabic

Governance Structure:
Constitutional democracy
Budget:
(2013 estimate)
- Revenues: $614.8 million
- Expenditures: $754.4 million

Budget Surplus (+) or Deficit (-):
-3% of GDP (2013 estimate)

Public Debt:
31.1% of GDP (2013 estimate)

Communications:
(2012 estimate)
- Main lines in use: 18,000
- Mobile cellular lines: 2.21 million
- Internet users: 14,900 (2009 estimate)

General assessment: marginal telephone service with poor infrastructure

Broadcast Media:
- 1 government-owned TV station
- 1 private TV station began operating in 2005
- A pay-tv service began operations in late 2007
- 1 government-owned national radio station
- Approximately 24 private radio stations primarily clustered in major cities
- International transmission of several broadcasters are available (2007)
Historical Overview

Freetown, the capital and largest city of Sierra Leone, was settled by freed slaves in 1787 and became a British colony in 1808. The government began as a Legislative council in 1924, which was replaced by a House of Representatives in 1957. The first Prime Minister, Milton Margai, was appointed in 1958. Shortly after, Sierra Leone gained full independence from Britain in 1961.\(^6\),\(^7\)

The young democracy was plagued by corruption, unfair elections, and an eventual collapse of the country’s educational system. The establishment of a civil society was further weakened by political instability and many coups that took place in Sierra Leone throughout its independence\(^8\). Subsequently, civil war erupted in 1991. Liberia-supported forces, also known as the Revolutionary United Front (RUF), raided the country in April of 1991 and civil war followed. The brutal, internal conflict lasted for over a decade.\(^8\) The war started in the southern region neighboring Liberia, but, after 2 years of unrest, no area was untouched by conflict. By 2000, the conflict spilled over into neighboring Guinea. Throughout the turmoil, the people of Sierra Leone experienced atrocious acts of violence and documented human rights violations, as a result of which many died or became displaced. The majority of displaced people fled their homes but remained in the country; however, several hundred thousand moved to another country. This devastating conflict finally came to an end at the beginning of 2002. After over a decade of civil war, it is estimated that 50,000 people had died and almost 2 million people, almost half of the population at the time, were displaced. In 2001, the government together with the United Nations began a resettlement program for internally displaced persons.\(^9\)

In addition to being an early refuge for freed slaves, Sierra Leone was plentiful in diamonds and other minerals. Originally a rich resource roughly covering 25% of the land, illicitly traded diamonds fueled the civil war. These “blood diamonds” were used to fund the RUF. Despite the previous abundance of diamonds, Sierra Leone remains one of the poorest countries of the world.\(^10\)

Cultural and Health Considerations

Sierra Leone is a multi-ethnic, multi-language country and home to over 17 unique tribes. Major ethnic groups include the Krio, Temne, Limba, and Mende. Several distinct languages are spoken with Krio and English serving as the most predominant or widely understood. Citizens represent a range of religious and cultural backgrounds through the four regions of Western Area, Northern Province, Southern Province, and Eastern Province. Furthermore, the country is divided into 14 districts.

While the Government of Sierra Leone (GOSL) creates statutory law for the country, many regions, particularly rural areas, are governed by customs and judicial systems of the community. Paramount chiefs are elected officials within the districts and while they work within the national governing body, autonomy can vary between chiefdoms. When working in a district it is both customary and often times required for permission to be granted by the paramount chief. Despite post-war legislation to improve child and maternal health, promote gender equality, provide access to education, empower youth, protect the environment and natural resources, and regulate corruption, many obstacles prevent wide-spread implementation and acceptance. Health care access and quality varies significantly between regions and also between the rural and urban inhabitants. The Ministry of Health facilities operate in the hierarchy of care summarized in Figure 2.

---


© 2015 UF Global Health Case Competition
HEALTHCARE WORKER SHORTAGE

Global Overview

Currently there is a healthcare worker shortage worldwide, with estimates of up to 7.2 million people. This gap is projected to increase to 12.9 million by 2035. The WHO has pinpointed several causes for the shortage. With an aging healthcare workforce, health professionals are retiring or leaving for higher paying jobs. Adding to this loss of experienced professionals, younger healthcare professionals are improperly trained or not entering the workforce. As our world expands, the population is rapidly growing and people are living longer. The global disease burden continues to shift from primarily acute infectious diseases to chronic non-communicable diseases. As a result, the demand for healthcare is increasing globally with an emphasis on preventing and treating non-communicable diseases, such as cancer, heart disease, and diabetes. In addition to the growing demand, there is an imbalance due to immigration and emigration of healthcare workers.

Globally, the minimum standard of care is 23 skilled healthcare professionals for every 10,000 people. Eighty-three countries in the currently fail to meet this minimum. The WHO reports there are not enough healthcare workers being trained to meet the anticipated demand. Of those that are trained, many are leaving. It is estimated that $500 million a year is spent by developing countries to train healthcare workers who leave to work in developed countries. This is due to a lack of advanced training and career opportunities, poor working conditions, and room for healthcare management improvement in developing countries. This outflow of professionals puts additional strain on countries that fail to meet the minimum of healthcare professionals and puts fragile systems in danger of failure during emergencies.

15 http://www.who.int/bulletin/volumes/87/3/08-051599/en/
16 http://www.who.int/topics/international_health_regulations/en/
18 http://txfzgw.ishib.org/journal/19-1s1/ethn-19-01s1-60.pdf
Health as a Human Right

Owing to large migrations (and active recruitment) of health workforce from poor resource countries to better work environments, the WHO established the Global Code of Practice on the International Recruitment of Health Personnel in 2010. The code abides by four principles:

1. The right of all people to attain the highest standard of health
2. To acknowledge the right for health workers to voluntarily and legally migrate in search of opportunities
3. To address the root causes and effects of health personnel disparity
4. To provide special consideration to low resources and developing health systems

The code provides a strong linkage to Article 25 of the United Nations’ Universal Declaration of Human Rights 1948, which states that "Everyone has the right to a standard of living adequate for the health and well-being of himself and of his family, including food, clothing, housing and medical care and necessary social services." As well as the International Covenant of Economic, Social and Cultural rights (ICESCR) found in Article 12: the right of everyone to “the enjoyment of the highest attainable standard of physical and mental health”. The Universal Declaration makes special mention of care given to those in motherhood or childhood. Additionally, Article 12 broadly identifies provisions for maternal and infant care, environmental improvements, prevention, treatment and control of infectious diseases and the providing medical services in the case of illness. It also highlights that the needs of the most disadvantaged are always recognized and respected, protected and fulfilled, and prioritized.

"Everyone has the right to a standard of living adequate for the health and well-being of himself and of his family, including food, clothing, housing and medical care and necessary social services.

Additionally, the International Labour Organization re-affirmed the Nursing Personnel Convention (C149) in 2002 that works toward improving working conditions of nurses.

---

21 http://www.ohchr.org/EN/ProfessionalInterest/Pages/CESCR.aspx
22 http://www.who.int/hrh/nursing_midwifery/nursing_convention_C149.pdf

© 2015 UF Global Health Case Competition
ASSIGNMENT SUMMARY

This case packet provides students with an overview of the global health issue and country of interest: health workforce shortage in Sierra Leone. Student teams must prepare their recommendations to the key issue presented in this case:

*How do you address the critical shortage and uneven distribution of the health workforce in Sierra Leone?*

**Key Case Considerations:**
1. How do we address the health care demands of the shifting disease burden and growing population?
2. How do we ensure health professionals are well-trained, culturally sensitive and culturally competent?
3. Are there ways to provide training opportunities and incentives to ensure health professionals remain in the workforce?
4. What historical and/or cultural aspects need to be taken into account during the recruitment and retention of healthcare workers? How can they be managed?
5. What improvements can be made in health care management?
6. What improvements can be made to health care delivery?

**Additional Items of Note:**
- Include innovative, out-of-the-box ideas that come from being part of a multidisciplinary team. Creativity is a plus.
- Remember that the recommended models of health delivery evolve constantly and the incorporation of non-traditional methods or practices may work best for different populations.

*For further instructions on complete rules, desired formatting, and presentation criteria, please refer to the informational packet provided to all team members.*

*Remember, students should discuss neither the case nor the case presentations with other teams, other students not participating in the competition, or UF faculty and staff members during the competition week until all presentations have been given. Doing so would be considered a violation of the Honor Code. Students can contact professionals outside of UF faculty and staff who may be experts in or related to the topic of the case.*

**Good luck!**
ACKNOWLEDGEMENTS

The following individuals deserve recognition for their dedication and contribution to the creation of this case:

**Punam Amratia**, Case Writer, PhD Student, School of Forest Resources and Conservation

**Amber Barnes**, Reviewer, PhD Candidate, College of Public Health and Health Professions, Department of Environmental and Global Health

**Stephanie Moody-Geissler**, Case Writer

**Jessica Rowland**, Case Writer, One Health PhD student, College of Public Health and Health Professions, Department of Environmental and Global Health

**Ashby Strauch**, Case Writer, Undergraduate student, UF College of Journalism and Communications

**Yulia Strekalova**, Designer, PhD student, UF College of Journalism and Communications