Situation assessment - 25 August 2014 - The outbreak of **Ebola virus disease** in west Africa is unprecedented in many ways, including the high proportion of doctors, nurses, and other health care workers who have been infected.

To date, more than 240 health care workers have developed the disease in Guinea, Liberia, Nigeria, and Sierra Leone, and more than 120 have died.

Ebola has taken the lives of prominent doctors in Sierra Leone and Liberia, depriving these countries not only of experienced and dedicated medical care but also of inspiring national heroes.

Several factors help explain the high proportion of infected medical staff. These factors include shortages of personal protective equipment or its improper use, far too few medical staff for such a large outbreak, and the compassion that causes medical staff to work in isolation wards far beyond the number of hours recommended as safe.

In the past, some Ebola outbreaks became visible only after transmission was amplified in a health care setting and doctors and nurses fell ill. However, once the Ebola virus was identified and proper protective measures were put in place, cases among medical staff dropped dramatically.

Moreover, many of the most recent Ebola outbreaks have occurred in remote areas, in a part of Africa that is more familiar with this disease, and with chains of transmission that were easier to track and break.

The current outbreak is different. Capital cities as well as remote rural areas are affected, vastly increasing opportunities for undiagnosed cases to have contact with hospital staff. Neither doctors nor the public are familiar with the disease. Intense fear rules entire villages and cities.

Several infectious diseases endemic in the region, like malaria, typhoid fever, and Lassa fever, mimic the initial symptoms of Ebola virus disease. Patients infected with these diseases will often need emergency care. Their doctors and nurses may see no reason to suspect Ebola and see no need to take protective measures.

Some documented infections have occurred when unprotected doctors rushed to aid a waiting patient who was visibly very ill. This is the first instinct of most doctors and nurses: aid the ailing.

In many cases, medical staff are at risk because no protective equipment is available – not even gloves and face masks. Even in dedicated Ebola wards, personal protective equipment is often scarce or not being properly used.

Training in proper use in absolutely essential, as are strict procedures for infection prevention and control.

In addition, personal protective equipment is hot and cumbersome, especially in a tropical climate, and this severely limits the time that doctors and nurses can work in an isolation ward. Some doctors work beyond their physical limits, trying to save lives in 12-hour shifts, every day of the week. Staff who are exhausted are more prone to make mistakes.

All personal protective equipment despatched or approved by WHO meets the appropriate international safety standards.

The heavy toll on health care workers in this outbreak has a number of consequences that further impede control efforts.

It depletes one of the most vital assets during the control of any outbreak. WHO estimates that, in the three hardest-hit countries, only one to two doctors are available to treat 100,000 people, and these doctors are heavily concentrated in urban areas.

It can lead to the closing of health facilities, especially when staff refuse to come to work, fearing for their lives. When hospitals close, other common and urgent medical needs, such as safe childbirth and treatment for malaria, are neglected.

The fact that so many medical staff have developed the disease increases the level of anxiety: if doctors and nurses are getting infected, what chance does the general public have? In some areas, hospitals are regarded as incubators of infection and are shunned by patients with any kind of ailment, again reducing access to general health care.

The loss of so many doctors and nurses has made it difficult for WHO to secure support from sufficient numbers of foreign medical staff.

The African Union has launched an urgent initiative to recruit more health care workers from among its members.