

International Symposium on Disaster Medicine and Public Health Management: Review of the Hyogo Framework for Action

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The size of a disaster is commonly measured by the death toll, number of injured, and the loss of property. Health professionals are obliged to respond as quickly as possible and to save the lives of as many people affected by the incident as possible. The progress made in the response to disasters has many features in common with those made in the diagnosis and treatment of diseases. In both areas, it has been necessary to move from the methods of trial and error and toward an evidence-based, systematic, and coordinated approach.

Disasters are a consequence of the hazards that can affect the health of people and the risk to property, and the risk reduction of disasters can be achieved by decreasing hazard and vulnerability and increasing capacity, according to the following equation:

$$\text{Risk} = \text{Hazard} \times \text{Vulnerability} / \text{Capacity}$$

The Hyogo Framework for Action,¹ endorsed by 168 countries in 2005, established 5 main priorities to achieve disaster risk reduction, as follows:

1. Ensure that disaster risk reduction is a national and a local priority with a strong institutional basis for implementation;
2. Identify, assess, and monitor disaster risks and enhance early warning;
3. Use knowledge, innovation, and education to build a culture of safety and resilience at all levels;
4. Reduce the underlying risk factors; and
5. Strengthen disaster preparedness for effective response at all levels.

For the past 10 years, the validity of these actions to reduce risk of disasters has been demonstrated, and the HFA has been used to promote resilience to disaster many times over. Moreover, the post-HFA framework has been designated as a promising prologue to HFA 2. In reviewing the HFA, however, it was found that the word *health* appeared only 3 times in a paragraph regarding the safe hospital in the entire document of more than 10 000 words. Consequently, the voices of health professionals appeared quite weak in the field of disaster risk reduction.

Health professionals are very aware of what happens in disasters. The solution for huge medical and public health needs are sought in the hospitals, often in a surge, even though the facilities and the health providers themselves can be affected by the events. Local, national, regional, and global preparedness is required to avoid an uncoordinated and untrained response that only creates additional chaos. In addition, the disruption of lifelines, supply chains, and logistics results in major problems and in the ability of hospitals to function. Not only are the patients with acute care needs affected, but also those with chronic diseases and special vulnerabilities. All require complete medical and public health support.

In addition, the mental health of people affected by disasters, including first-responders and health care professionals, is an extremely important area of consideration. The psychological trauma suffered during these events can last months and years. Therefore, the education and training of disaster-specialized and general health care providers are key to coordinate an effective response. To continue to increase the progress in all of these areas, health professionals need to engage in the process of disaster risk reduction and adopt a policy making framework.

The international symposium that took place this summer,² which was officially supported by the Ministry of Health, Labour and Welfare of Japan, aimed to improve the international agreement signed onto by the members

of the HFA 1 by recommending revisions to HFA 2. These proposals will be presented at the 3rd World Conference of Disaster Risk Reduction, to be held in Sendai, Japan, in 2015.

In advance of this year's symposium, the core organizers managed a website named Base Camp to submit and discuss the consultative themes. On the first day, members of the Science and Technical Advisory Group of the United Nations International Strategy for Disaster Reduction (UNISDR), the World Health Organization, and the Centers for Disease Control and Prevention presented a strong and unified voice across health sectors for disaster risk reduction. Each working group had conducted sessions with lively discussions and summarized their outcomes for all participants.

On the second day, each group presented the outcomes of the plenary sessions, and Virginia Murray FRCP, FRCPath, vice-chair of the UNISDR's Science and Technical Advisory Group, provided the symposium's concluding remarks. The core organizers then organized all of the results of the symposium in a position paper.³ these proceedings served not only to publicize the outcome of this symposium, but also to convey to the policy makers and general population the consensus of the participating health professionals and scientists.

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