



Wake- Up Call to Public Health Crisis: Floods driving Looming Outbreaks in Pakistan

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Dear Editor,

Floods in Pakistan are among the most recent recurring national disasters since the last three decades that have exposed several times the fragility of infrastructures, leading to the silent emergency of disease outbreaks beyond repair. The 2010, 2022, and 2025-based floods clearly depicted that Pakistan is in constant war with not only climate change but also with the devastating epidemics of vector-borne diseases ¹. The World Health Organization (WHO) in 2022 reported more than 33 million people as direct victims of floods, more than 1,400 damaged health facilities, along with 8 million displaced people, including children and women ². United Nations Children's Fund (UNICEF) reported over 3.4 million children with urgent need of medical and nutritional assistance over this period of time ³. Thousands of people (displaced) with the symptoms of diarrheal diseases, malaria, and dengue, followed by the monsoon rains, flooded Punjab and Khyber Pakhtunkhwa ⁴.

Emphasizing waterborne diseases, a hub of Pathogens spreading among displaced populations by dint of poor sewage systems and scarcity of clean drinking water. The most typical culprits are cholera, typhoid, hepatitis A and E, and acute watery diarrhea ⁵. During the floods in 2022, the Sindh province recorded almost 90,000 cases of diarrhea in one day, which is an absolute question mark over the sanitation infrastructure of Pakistan ⁶. Stagnant water creates breeding areas of mosquitoes, resulting in dengue, malaria, and chikungunya spikes. In 2022, the cases of dengue and malaria were seen as reportedly increased in Sindh and Punjab within weeks of the monsoon floods ⁷. Children

bearing malnourishment (under-five populations) are particularly vulnerable to increased mortality rates, and over 600,000 pregnant women were reported to require emergency maternal care ^{8,9}.

Flood response should prioritize strong public health interventions to prevent avoidable disease outbreaks. This includes Early Disease Surveillance (the implementation of rapid disease surveillance systems with mobile reporting systems and geographic information systems), Water and Sanitation Interventions (Ensuring access to safe drinking water through chlorination of water bodies, distribution of purification tablets, and installation of portable filtration units), and Vector Control (Scaling up mosquito-control programs, spraying campaigns, insecticide-treated nets) ^{10,11}. The management of disaster risk should also include health in the national policy, and the National Disaster Management Authority (NDMA) should coordinate with the Ministry of Health in disaster preparedness and response.

Disaster preparedness and disease surveillance should be provided to the community health workers, such as Lady Health Workers, so that they become the first line of defense ¹². Simply put, the chronic crises, the health effects of which can be forecasted, are the floods in Pakistan. Pakistan actually requires crisis management planning and resiliency-building dynamics. It requires a precise revolution to save the lives of millions of men.

The waters may be reduced, but unless active steps are taken, the germs of these pestilences might plague us even after the waters have subsided into their banks. The Government must cooperate with the desperate population at priority to their losses who are alone and toiling to make their own. We can rebuild the Houses with the regaining of materials, but not the homes. It is only possible through healthy members of the family with an enhanced health and recovery index. Therefore, the bridge towards the future is getting tough, and there is a wake-up call to the Public Health Crisis: Floods are driving looming outbreaks in Pakistan.

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CONFLICT OF INTEREST

None

AUTHORS' CONTRIBUTION

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