

mechanisms. However, routes to these enablers vary due to differences in policies, health system design, and legislation adoption procedures. Future research will include more countries and a detailed list of research questions to identify patterns in legislation and policy enablers for achievement of the Global EMT goals.

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Health Impacts of Climate-Change Related Natural Disasters on Persons with Disabilities in Developing Countries

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Background/Introduction: Persons with disabilities (PWD) in developing countries are particularly affected by climate change-related disasters.

Objectives: To explore the health impacts of climate change-related natural disasters on persons with pre-existing physical and mental disabilities in developing countries.

Method/Description: The Joanna Briggs Institute evidence synthesis guideline was applied and results were reported following PRISMA guidelines. PubMed, PsycINFO, Scopus, and Embase databases were searched using terms related to ‘persons with disabilities,’ ‘climate change,’ and ‘developing countries.’ The database search retrieved 406 articles, forty-two articles were eligible for full-text review and 14 met the inclusion criterion which were reviewed and thematic analysis was performed.

Results/Outcomes: The 14 articles included 5 studies generalized across multiple countries and nine profiled specific developing countries. Five key themes were identified: impact on PWD physical health and mental health, resilience, and coping strategies of PWD in disasters, PWD involvement in inclusive disaster planning, and climate-change related natural disasters on PWDs in developing countries as a human rights issue.

Conclusion: Additional research is needed to better understand the negative health impacts of climate change-related natural disasters on persons with pre-existing physical and mental disabilities in developing countries. Contributing social and economic factors as well as facilitative coping and resilience strategies of the affected population in this context also require further study. Addressing these research gaps can inform development of effective, disability-inclusive disaster management practices which contribute to more equitable climate-change related health and rights-based outcomes for PWDs in developing countries. Resulting trauma can concomitantly result in increased acute demand for physical rehabilitation therapy services.

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The Global Alarming Impact of Extreme Heat Waves: A Retrospective Analysis

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Background/Introduction: Extreme heat waves are a growing global health concern, with their frequency and intensity escalating due to climate change. Understanding past trends in heat wave impacts is crucial for informing effective mitigation and adaptation strategies.

Objectives: This study aims to analyze the historical impact of extreme heat waves on global mortality and morbidity, identifying geographical and temporal trends to inform public health interventions.

Method/Description: We conducted a retrospective analysis using data from the Emergency Events Database. This comprehensive database provided records of heat wave events and associated mortality and morbidity data spanning recent decades. Statistical analysis was performed to identify trends and patterns in heat wave occurrences and their health impacts.

Results/Outcomes: Our analysis reveals a concerning increase in both the frequency and severity of extreme heat waves globally. This trend corresponds with a significant rise in heat-related mortality and morbidity, particularly in regions with limited adaptive capacity and among vulnerable populations such as the elderly and those with pre-existing health conditions.

Conclusion: The findings underscore the urgent need for proactive measures to mitigate the health risks posed by extreme heat. These include strengthening healthcare infrastructure to manage heat-related illnesses, developing effective early warning systems, and implementing community-based interventions to reduce heat exposure. This research provides a critical historical perspective on the growing threat of extreme heat, emphasizing the importance of global cooperation and immediate action to protect populations from this escalating public health challenge.

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How the Understated Role of Rehabilitation Within Emergency Responses Can Be Addressed: A Call to Action from the IFRC Technical Working Group

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Background/Introduction: The role of rehabilitation in EMTs remains unclear. Due to this and reasons related to inadequate initial planning, the role of rehabilitation professions in emergencies is understated. Further, there is no one-size-fits-all approach to rehabilitation in emergencies.

Objectives: The IFRC Rehabilitation Technical Working Group proposes solutions to address these challenges.

Method/Description: There are three main challenges for EMTs to deliver rehabilitation in emergency settings. Firstly, a universal definition of ‘rehabilitation’ remains absent. Secondly, advocacy to integrate rehabilitation into EMTs is often not enough to ensure success. Thirdly, various rehabilitation needs may not match current offerings in EMTs.




Results/Outcomes: First, ‘rehabilitation’ must be defined based on its impact, interventions, and goals to encompass both specialized services and services integrated into the wider health system and a universal definition which creates wider understanding must follow. Second, the end recipients of rehabilitation service delivery prior, during or following emergencies, should be clearly accounted for at the outset of emergencies. Planning exit strategies post-emergencies involves choosing the appropriate iteration of rehabilitation in the local context that is socially acceptable and sustainable. Examples include modularization of rehabilitation services outside of traditional field hospitals, and extending services beyond traditional time frames.

Conclusion: The role of rehabilitation in EMTs is often overlooked due to three key challenges which may be addressed through clearly defining rehabilitation and its role in EMTs, adequately preparing for sustainable post-emergency rehabilitation handovers in local contexts and creating and delivering various rehabilitation offerings within EMTs. Research should explore the effect of these potential solutions in emergency settings.

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Enhancing KDRT’s Administration and Organizational Management through SWOT Analysis: A Systematic Review

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Background/Introduction: The Korea Disaster Relief Team (KDRT) plays a crucial role in international humanitarian assistance and disaster relief. Effective administration and organizational management are vital for the success.

Objectives: This study compares KDRT’s administration and organizational management with other emergency medical teams (EMTs) through a comprehensive literature review, ultimately providing recommendations to strengthen KDRT’s framework.

Method/Description: Using PRISMA methodology, a comprehensive literature search was conducted across major databases including PubMed, EMBASE, Cochrane Library based on their relevance to EMT initiatives, administration and organizational management, and disaster response strategies. Articles were analyzed to identify governance structures, defined roles and responsibilities, and regular organizational evaluations with SWOT analysis.


Results/Outcomes: Out of 20,343 articles, 18 were selected. The review identified key aspects of effective administration and organizational management in EMTs, including clear governance structures, well-defined roles, and continuous evaluations. For articles not included in the KDRT system, the SWOT analysis revealed strengths such as local knowledge (Japan), strong frameworks (USA), and clear funding strategies (Finland). Weaknesses included limited scalability (Japan), bureaucratic delays (USA), and funding limitations (Finland). Opportunities were found in community engagement (Japan), streamlined processes (USA), and increased donor engagement (Finland), while threats included policy misalignment (Japan), administrative burdens (USA), and financial instability (Finland).

Conclusion: This study highlights the need to reinforce KDRT’s administration and organizational management to improve its disaster response efficiency. Recommendations include improving resource allocation, integrating local knowledge, simplifying processes, diversifying funding, and enhancing transparency. By addressing these areas, KDRT can enhance its capability to provide effective humanitarian assistance and disaster relief internationally.

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Criteria for Deployment of the United States National Guard to Domestic Sudden-Onset Natural Disasters: A Scoping Review

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Background/Introduction: This study is a scoping review to identify literature pertinent to the question: “What are the criteria for deployment of the United States National Guard (USNG) to domestic sudden-onset natural disasters (SODs)?” As this question relies on factors across many disciplines—legal, medical, technical, cultural—and as there is no