

## Abstract

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# Comparison of the Utilization of Disaster Medical Assistance Teams (DMATs) and Multiple Physician-staffed Helicopters in Mass Casualty Responses

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## Abstract

**Objective:** To investigate the differences between doctor helicopters (DHs) and disaster medical assistance teams (DMATs) based on past examples and the current situation in Shizuoka Prefecture.

**Methods:** First, we examined cases in Shizuoka Prefecture from 2014 to 2023, where incidents involving five or more injured individuals were simultaneously managed using multiple DHs. Next, we investigated the presence of DMATs in Shizuoka Prefecture and assessed their role in disaster responses within the prefecture.

**Results:** Since 2014, there have been eight incidents in Shizuoka Prefecture where multiple DHs were deployed to respond to mass casualties. In contrast, Shizuoka DMATs were placed on standby three times during the same period, with one active deployment during a disaster caused by a landslide in Atami. The other two cases were managed solely by DHs and ambulance teams.

**Conclusion:** Localized disasters in Shizuoka Prefecture have seen the effective use of multiple DHs for timely patient transportation, particularly when suitable weather conditions permit. In contrast, DMATs are primarily deployed for extended medical activities lasting more than one day. This differentiation highlights the importance of choosing the appropriate medical response approach based on the nature and scope of the disaster.

**Supplementary material.** The supplementary material for this article can be found at <http://doi.org/10.1017/dmp.2024.188>.