

## Japan's Volcanic Disaster Mitigation Initiatives: Work Projects of the Commission on Mitigation of Volcanic Disasters, VSJ and Volcanic Hazard Maps in Japan, 2nd Edition

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The Commission on Mitigation of Volcanic Disasters (CMVD) was organized by the Volcanological Society of Japan (VSJ) in 2004. The Commission's aim is to explore various issues regarding volcanic disasters mitigations, and to put forward suggestions or recommendations to the public. To realize this agenda, the Commission holds open conferences for researchers, specialists, administrative staff and the general public at the time of the VSJ semiannual assemblies to exchange ideas and opinions in a broad and mutually beneficial cooperative atmosphere. Past topics have ranged widely and include the following: (1) systems for monitoring and observing active volcanoes, (2) volcanic warning and alert levels, (3) disaster management systems in active volcanic areas, (4) eruption scenarios and event-trees for disaster risk assessment, and (5) disaster mitigation concepts for wide-areas in the event of large-scale eruptions. Every public forum is held in autumn at a local city or town adjacent to an active volcano. This is a good opportunity for local citizens, regional disaster management staff, mitigation professionals, and volcanologists to have dialogues or conduct questionnaires regarding steady or urgent threats from active volcanoes. The Commission members obtain valuable opinions, ideas and feedback from the local people living adjacent to volcanoes.

Another main project of the Commission is to review or verify the current volcanic hazard maps that have been published in Japan. Therefore, a database system of volcanic hazard maps in Japan was worked out collaboratively by the Disaster Information Laboratory, NIED and CMVD. The first version of Volcanic Hazard Maps in Japan was published in 2006, followed by an English supplemental version in 2007. The current second version was published in March 2013. Also the revised online version is open to the public on the NIED website (<http://dil.bosai.go.jp/documents/v-hazard/>).

National Guideline for Producing Volcanic Eruption Disaster Hazard Maps was published in 1992. Subsequently several hazard maps for active volcanoes were published. However, the number of maps greatly increased after the 1991 eruptions of Unzen and the 2000 eruptions of Usu and Miyakejima. These large disasters were strong driving forces and great motivators to improve the volcanic disaster mitigation plans and hazard maps.

The present hazard map database includes 160 volcanic hazard maps in digital high-resolution images and the reference handbooks published for 40 of the 110 active volcanoes. We expect this publication and database to be an effective information infrastructure for local government officials, disaster management organizations, and researchers to develop future volcanic disasters mitigation plans.