

Location of crustal reflectors in the Unzen volcanic area

Miyako Kuriyama[1], Satoshi Matsumoto[2], Takeshi Matsushima[3], # Hiroshi Shimizu[4]

[1] Earth and Planetary Sci., Kyushu Univ, [2] SEVO, Sci., Kyushu Univ., [3] SEVO, Kyushu Univ., [4] Inst. Seismol. & Volcanol., Kyushu Univ.

<http://www.sevo.kyushu-u.ac.jp>

We revealed the subsurface structure of Unzen Volcano and detected crustal reflectors using the seismic data from the 1995 explosion experiment. Most of the reflectors in the Unzen volcanic area are inclined with large angle and distributed along the active faults which form the Unzen graben. The strike and dip direction of the reflectors consist roughly with those of the faults. Some of the reflectors are located in the vicinity of the pressure sources inferred from the ground deformation in the 1990-95 eruption. The distribution of these reflectors probably corresponds to the magma reservoirs and/or the ascent path of magma beneath the volcano.