

## Magmagenesis of the Middle Miocene Granites on the outer zone of southwestern Japan : Evidence for a slab melting

# Yuji Orihashi [1], Kenichi Inagaki [2], Takafumi Hirata [2], Ryo Anma [3], Daiji Hirata [4], Shigenori Maruyama [5]

[1] Earth and Planetary Sci., TIT, [2] Earth and Planetary Sci., TITech, [3] Geosci., Tsukuba Univ., [4] Kanagawa Prefect. Mus. Nat. Hist., [5] Earth and Planetary Sci., Tokyo Institute of Technology

We determined REE patterns for single grain zircon separated from five Miocene granitic plutons ; Yakushima, Ashizurimisaki, Osuzuyama, Ichifusa and Ookueyama, in the outer zone of southwestern Japan to study the possibility of their slab melting origin. Variation in (Gd/Yb)<sub>CN</sub> values these five granitic plutons suggests to reflect the different chemical characteristics of a partially melted slab that had been metamorphosed in different degrees during its subduction.

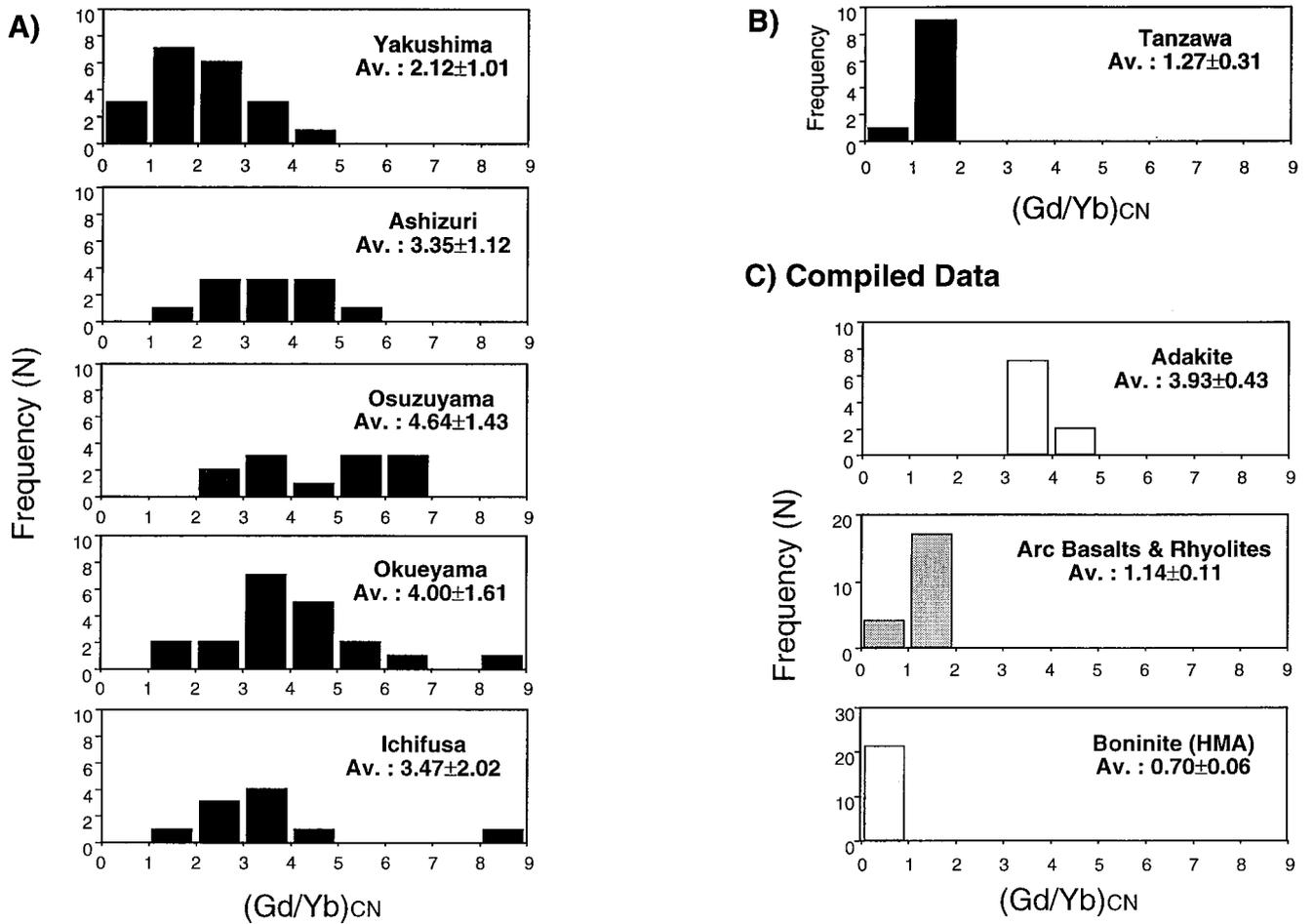


Fig. Histograms of Leedey normalized Gd/Yb values of the granitic melts in the outer zone of southwestern Japan.