

Origin and Crystallization of the Shiraishino granodiorite from Higo metamorphic belt, SW JAPAN

Atsushi Kamei [1]

[1] Earth Sci., Yamaguchi Univ

The Shiraishino granodiorite as a part of the Higo pltonic rocks occur in the central part of Kyushu island, southwest Japan. Crystallization age for the granodiorite indicate an age of 122Ma, and its geochemical characteristic shows calk-alkaline series such as volcanic arc. The granodiorite has HREE depletions and slightly positive Eu anomaly ($(La/Yb)_N=16.9-28.8$, $Eu/Eu^*=1.01-1.15$). Based on petrographical and geochemical studies, fractional crystallization of the granodiorite was largely affected by plagioclase and hornbrende.