

## Activity of granitic magmas controlled by plate subducting-rate: deduction from the compilation of the Japanese granite plutonism

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The compilation of Japanese granite activity shows that the exposure area of granite positively correlates with the production rate of the oceanic crusts formed at 20 m.y. before the production of the granites. The ratio of ilmenite-series granites also positively correlates with the production rate of oceanic crusts. This suggests that the subducting-rate controls the production rate and redox states of granitic magmas in subduction zones. We have also found that the production rate of granites, the ratio of ilmenite-series granites, and the initial Sr isotope ratios of granites decreased abruptly at the K-T boundary. The above changes would be due to the changes of subducting-rate and property of drawing sediments with oceanic crusts, because both changes are chronologically linked.