

Advances in Volcanology

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The Mixing of Magmas

Field Evidence, Numerical Models, Experiments

This book provides a common theoretical and practical basis to the multifaceted nature of magma mixing. This process represents a fundamental phenomenon both in the evolution of igneous rocks and in triggering explosive volcanic eruptions. The topic is attacked surgically merging field evidence, numerical models, and experiments in order to draw the most complete picture about this natural process. Arguments are discussed in the light of Chaos Theory and Fractal Geometry as new tools to understand the role of magma mixing as a fundamental petrological and volcanological process. The book is intended to be a source of information and a stimulus for new ideas in students, young and possibly more experienced researches.

ISBN 978-3-030-81813-5



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