The chapters in this book are grouped into sections comprising plates & plumes, convection & seismology, heat & temperature, geochronology & reference frames, oceanic and continental melting anomalies, planetary volcanism, education, and platonics & plumacy. Many of the chapters are followed by a block of formal discussion.

Individual chapters were formally reviewed by two or more external reviewers and by both of the volume editors. The review process for chapters authored by one of the editors was handled by the other editor. We sought reviewers expected to advocate contrasting viewpoints, to expose authors to the most challenging criticisms possible and to encourage the confrontation of difficulties.

We extend our grateful thanks to all the reviewers. They included Walter Zuern, Jerry Winterer, Marge Wilson, Howard Wilshire, Marie-Claude Williamson, Mike Widdowson, Mike Walter, Peter Vogt, Claudio Vita-Finzi, Surendra Verma, Jolante van Wijk, Arie van den Berg, Bob Tilling, John Tarduno, Christopher Talbot, William Stuart, Ellen Stofan, Paul Stoddard, Joann Stock, Bernhard Steinberger, Seth Stein, Norman Sleep, Tom Sisson, Hetu Sheth, Alison Shaw, Dave Scholl, Andy Saunders, Will Sager, Lars Rupke, Sergio Rocchi, Keith Putirka, Angelo Peccerillo, Manoj Pandit, Colin Pain, Jim Ogg, Jim Natland, David Naar, Dietmar Mueller, Tim Minshull, Romain Meyer, Greg McHone, G.J.H. McCall, Stephen Marshak, John Mahoney, Phil Leat, Art Lachenbruch, Scott King, Walter Kiefer, Richard Ketcham, Jeff Karson, Bruce Julian, Garrett Ito, Peter Hooper, Anne Hofmeister, Albrecht Hofmann, Kaj Hoernle, Jon Hernlund, Dion Heinz, Chris Hawkesworth, Rob Harris, Warren Hamilton, Stuart Hall, Tristram Hales, Yanni Gunnell, Jeff Gu, David Green, Richard Gordon, Godfrey Fitton, Cinzia Farnetani, Trevor Falloon, Richard Ernst, Linda Elkins-Tanton, Zhijun Du, Carlo Doglioni, Bob Detrick, Bob Christiansen, Françoise Chalot-Prat, Paterno Castillo, Hans-Peter Bunge, Erin Beutel, Keith Bell, Alexander Basilevsky, Ajoy Baksi, Jayne Aubele, Donald Argus, Don Anderson, Ercan Aldanmaz, and an additional 20 anonymous reviewers. Of the total 108 reviewers, 81% waived their anonymity.

Chapters were posted on the world wide web as they were accepted, and formal discussion of them was open to the public from November 2006 until the end of January 2007. Contributions were posted rapidly as they were submitted. To the Editors' knowledge, this is the first time such an exercise has been conducted. Our experience was that it was extremely successful. Response was vigorous and many emails of appreciation were received from both participants and observers.

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Gillian R. Foulger & Donna M. Jurdy Durham, U.K. & Evanston, Illinois, U.S.A. 26th February, 2007