

1. Record Nr.	UNINA9910452005303321
Autore	Frankel Henry R. <1944->
Titolo	The continental drift controversy . Volume 3 Introduction of seafloor spreading / / Henry R. Frankel [[electronic resource]]
Pubbl/distr/stampa	Cambridge : , : Cambridge University Press, , 2012
ISBN	1-139-36564-9 1-107-22590-6 1-280-64735-3 9786613633408 1-139-37817-1 1-139-02541-4 1-139-37531-8 1-139-37674-8 1-139-37960-7 1-139-37132-0
Descrizione fisica	1 online resource (xvi, 476 pages) : digital, PDF file(s)
Disciplina	551.1/36
Soggetti	Continental drift - Research - History - 20th century Academic disputations - History - 20th century
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Title from publisher's bibliographic system (viewed on 05 Oct 2015).
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Cover; THE CONTINENTAL DRIFT CONTROVERSY: Volume III: Introduction of Seafloor Spreading; Dedication; Title; Copyright; Contents; Foreword; Acknowledgments; Abbreviations; Introduction; 1: Extension and reception of paleomagnetic/paleoclimatic support for mobilism: 1960-1966; 1.1 Introduction; 1.2 Dott reexamines the Squantum Tillite; 1.3 Comparisons of paleomagnetic and paleoclimatic evidence: the 1959 Newcastle symposium and its 1961 publication Descriptive Palaeoclimatology; 1.4 Reviews of Descriptive Palaeoclimatology; 1.5 Speculations on mechanism in the early 1960s 1.6 The 1962 anthology Continental Drift and MacDonald's review of it 1.7 Blackett turns to paleoclimatology; 1.8 Deutsch proposes continental drift without polar wandering; 1.9 The 1963 Newcastle

NATO conference; 1.10 Bucher continues to criticize mobilism at the NATO conference; 1.11 Harland and Rudwick link mobilism, the Great Infra-Cambrian Ice Age and the burgeoning of Cambrian fauna; 1.12 Responses of some biogeographers to the paleomagnetic case for continental drift; 1.13 Hamilton welcomes paleomagnetism's support of mobilism

1.14 Kay and Colbert reassess mobilism because of its paleomagnetic support1.15 Japanese rock magnetists avoid accepting the paleomagnetic case for mobilism; 1.16 Further poles from Australia, 1958-1964; 1.17 Further poles from Africa: the Salisbury (Harare) Group and further work at the Bernard Price Institute, Johannesburg, 1959-1964; 1.18 Convergence of paleomagnetism and paleoclimatology at Canberra, 1959-1966; Notes; 2: Reception of the paleomagnetic case for mobilism by several notables: 1957-1965; 2.1 Introduction; 2.2 Gutenberg's career

2.3 Gutenberg supports mobilism during the 1920s and 1930s2.4 In the 1950s Gutenberg reconsiders mobilism and appeals to paleomagnetism; 2.5 Vening Meinesz reconsiders mobilism; 2.6 Vening Meinesz becomes favorably inclined toward mobilism because of its paleomagnetic support; 2.7 MacDonald denies mantle convection and Runcorn responds; 2.8 MacDonald renews his attack on the paleomagnetic case for mobilism; 2.9 Harold Jeffreys, his career; 2.10 Jeffreys renews his attack on mobilism in the first Harold Jeffreys Lecture; 2.11 Bullard's journey to mobilism: his early career

2.12 Bullard considers mantle convection and measures ocean floor heat flow2.13 Bullard begins to consider mobilism seriously; 2.14 Bullard recognizes that all obstacles to the paleomagnetic case had been removed and becomes a mobilist; 2.15 Bullard squabbles with geologists about the contributions of geology and geophysics to the mobilism debate; 2.16 Arthur Holme's attitude to the paleomagnetic case for mobilism; 2.17 Mobilism's solution to divergent APW paths, its difficulty-free status

2.18 On the general failure to recognize the difficulty-free status of the paleomagnetic case for mobilism

Resolution of the sixty-year debate over continental drift, culminating in the triumph of plate tectonics, changed the very fabric of Earth science. This four-volume treatise on the continental drift controversy is the first complete history of the origin, debate and gradual acceptance of this revolutionary theory. Based on extensive interviews, archival papers and original works, Frankel weaves together the lives and work of the scientists involved, producing an accessible narrative for scientists and non-scientists alike. This third volume describes the expansion of the land-based paleomagnetic case for drifting continents and recounts the golden age of marine geology and geophysics. Fuelled by the Cold War, US and British workers led the way in making discoveries and forming new hypotheses, especially about the origin of oceanic ridges. When first proposed, seafloor spreading was just one of several competing hypotheses about the evolution of ocean basins.

Sommario/riassunto

Resolution of the sixty-year debate over continental drift, culminating in the triumph of plate tectonics, changed the very fabric of Earth science. This four-volume treatise on the continental drift controversy is the first complete history of the origin, debate and gradual acceptance of this revolutionary theory. Based on extensive interviews, archival papers and original works, Frankel weaves together the lives and work of the scientists involved, producing an accessible narrative for scientists and non-scientists alike. This third volume describes the expansion of the land-based paleomagnetic case for drifting continents and recounts the golden age of marine geology and geophysics. Fuelled by the Cold War, US and British workers led the way in making discoveries and forming new hypotheses, especially about the origin of oceanic ridges. When first proposed, seafloor spreading was just one of several competing hypotheses about the evolution of ocean basins.