

Continents perdus : l'Islande revisitée

Continents in oceans: revisited Iceland

The goal of the Ice-Cont PhD proposal is to test new and exciting ideas about the crustal nature and origin of Iceland and surrounding regions in the Northeast Atlantic, namely the "Icelandia" hypothesis^{1,2,3}. This international project will involve a number of groups, both in France (UBO, IUEM), UK (U. of Durham), Iceland (Iceland Geo-Survey) and Deutschland (Univ. Tuebingen). The PhD project involves onshore geology in Iceland, satellite image analysis, cross-analysis of various geophysical data and, eventually, numerical modelling. The main goal is to characterize the rheological and physical properties of the deep crust in Iceland, a probable mafic-injected continental material. The candidate must be scientifically polyvalent, with proven backgrounds in geophysics and physical geodynamics. This topic has a much broader scope than just the Northeast Atlantic example³. It concerns, on a global scale, a revision of the true extent of the continental lithosphere in the oceans², an issue of major political and economic importance

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1. Foulger, G. R., Gernigon, L., and Geoffroy, L., 2022, *Icelandia*: in: In the Footsteps of Warren B. Hamilton: New Ideas in Earth Science, edited by G. R. Foulger, D. M. Jurdy, C. A. Stein, L. C. Hamilton, K. Howard, and S. Stein, Geological Society of America, Boulder, CO. [https://doi.org/10.1130/2021.2553\(04\)](https://doi.org/10.1130/2021.2553(04))

2. Geoffroy, L., Gernigon, L. and Foulger, G. R., 2022, *Linear magnetic anomalies and the limits of oceanic crust in oceans*. In: In the Footsteps of Warren B. Hamilton: New Ideas in Earth Science, edited by G. R. Foulger, D. M. Jurdy, C. A. Stein, L. C. Hamilton, K. Howard, and S. Stein, Geological Society of America, Boulder, CO. [https://doi.org/10.1130/2021.2553\(06\)](https://doi.org/10.1130/2021.2553(06))

3. Rouat, S., 2021, In: Sciences et Avenir/La Recherche, décembre 2021, front page and article « *Continent englouti : Icelandia réécrit l'histoire de la Terre* », n° 898, pp. 48-55 + numerous international press articles and TV/radio interviews

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