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## Volcanism and tectonics unveiled in the Comoros Archipelago between Africa and Madagascar

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Geophysical and geological data acquired during the 2020–2021 SISMAORE oceanographic cruise reveal a corridor of recent volcanic and tectonic features 200 km wide and 600 km long within and north of Comoros Archipelago in the North Mozambique Channel. More than 2200 submarine volcanic edifices, comparable to the Fani Maoré volcano, have been identified. Most of them are distributed according to two large submarine tectonic-volcanic fields: the N'Drounde province oriented N160°E north of Grande-Comore Island, and the Mwezi province oriented N130°E north of Anjouan and Mayotte Islands. The presence of popping basaltic rocks sampled in the Mwezi suggests post-Pleistocene volcanic activity. The geometry and distribution of recent structures observed on the seafloor are consistent with a current regional dextral transtensional context. Their orientations change progressively from west to east (□N160°E, □N130°E, □EW). In the western part, the volcanism could be influenced by the pre-existing structural fabric of the Mesozoic crust. The wide tectono-volcanic corridor underlines the incipient Somalia–Lwandle dextral lithospheric plate boundary between the East-African Rift System and Madagascar. For details see Thinon et al. (2022; doi 10.5802/crgeos.159).

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