

# **A SUSPECT PAN-AFRICAN SUTURE IN EAST GONDWANA: A CRITICAL REVIEW FROM MADAGASCAR, SOUTH INDIA, SRI LANKA AND EAST ANTARCTICA**

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East Gondwana has been considered to have assembled during the ca 1000 Ma Grenvillian/Circum East Antarctic orogeny. However, the argument that it assembled during the Pan-African/Brasiliano orogeny is becoming strong recently. A detailed perspective of the Pan-African and pre-Pan-African events in Madagascar, South India, Sri Lanka and East Antarctica is given. These areas are principally composed of two geotectonically different units with Nd model ages (DM) of Mesoproterozoic and Palaeoproterozoic to late Archaean terrains, associated with sporadic further older crustal fragments. Identification of possible Neoproterozoic metasupracrustal units, and characterization of Pan-African structures, metamorphism and magmatism from these areas are key importance and appear to suggest the development of the Pan-African suture in these areas. However, insufficient evidence of ophiolite in many of these areas, and widespread relics of Pre-Pan-African events being superimposed by the Pan-African events do not favor to the above suggestion. Especially important theme for the discussion is centered to the geochronology, arguing against the simple explanation of SHRIMP data sometimes apt to neglect previous geochronologic data derived from different methods, and also, payment of small attention to so far known geologic data indicative of a poly-orogenic signature of the area. As a whole, a total figure of the tectonics of East Gondwana, and those of amalgamation of the full Gondwanaland during the Proterozoic-early Palaeozoic will be discussed.