

Giant lava flows, giant dyke swarms: The Deccan Traps, India

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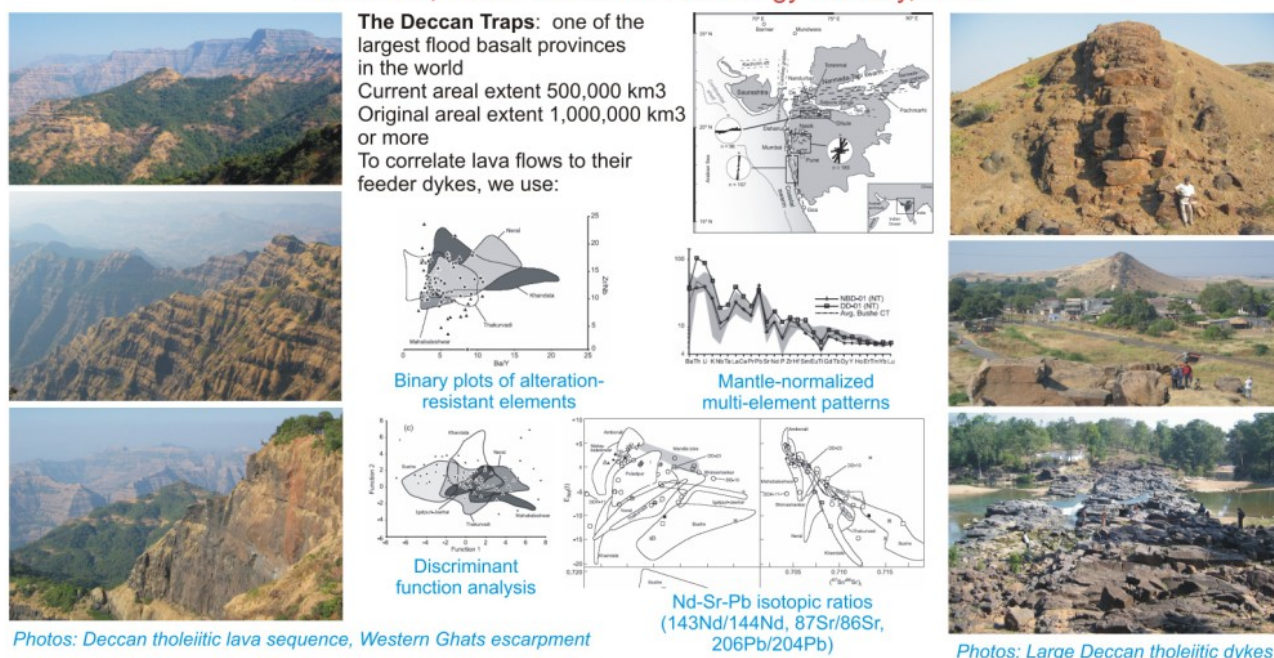
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This poster presents the main results of the work done by the author and his colleagues on the mafic dyke swarms of the Deccan Traps flood basalt province and their geochemical correlations to the volcanic units, with the aim to identify the feeder dykes of the huge lava flows and lava flow sequences.

Keywords: Flood basalt volcanism, Deccan Traps, Giant dyke swarms

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Important conclusions: There are three major mafic dyke swarms in the Deccan Traps flood basalt province. Field, petrographic, and geochemical-isotopic work shows many Deccan dykes that are highly probable feeders. Large (30-50 km long) dykes could have supplied large (~1000 km³) lava flows over only ~10 years. Distances of surface lava transport were likely several hundred kilometers.

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