

Preface

Several very significant events in earth history occurred during the Proterozoic Era and affected the lithosphere, atmosphere and the biosphere. Covering almost two billion years of geologic time, the Proterozoic Era witnessed the formation of stable continents, an oxygenated atmosphere, evolution of multicellular life and extensive glaciations. India has been an integral part of the supercontinents prior to Gondwanaland, and hosts several proterozoic sedimentary successions that contain information on ancient depositional environments and processes. The Vindhyan Supergroup of central and western India is one such major sedimentary succession. With a rock record that embraces much of geological time and space, the Vindhyan have been extensively studied over the last few decades. However, it is particularly the last few years that have seen a surge of research on these rocks, in part because of a couple of contentious fossil discoveries with profound implications.

We therefore felt that at this juncture, a comprehensive research volume including the recent advances in Vindhyan geology would be valuable in bringing about a better understanding of the development of this great succession and the global implications of various discoveries. This special issue, **Vindhyan Geology: Status and Perspectives**, contains eleven peer-reviewed research papers that cover many aspects of the Vindhyan. The main goals of this multidisciplinary research volume are to:

- evaluate and synthesize the large quantity of data available from earlier studies;
- present new data, ideas and methods to resolve the outstanding issues; and
- identify the future areas for research.

The first five papers in this volume deal with the stratigraphy and sedimentology of the Vindhyan rocks, and the next two papers are on the paleobiology. The paper number eight presents new stable isotope data from the carbonate formations in the Son valley, and the next paper contains results of a seismic reflection study in the Vindhyan of Rajasthan. A review of the recent geochronology of the Vindhyan sequences is presented in the paper number ten. The final paper discusses the petrological and geochemical aspects of kimberlitic rocks that intrude the Vindhyan Supergroup.

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