PREFACE

In the present thesis, an endeavour has been made to elucidate the stratigraphy, micropalaeontology and source rock evaluation for hydrocarbon generation of the Lower Tertiary sediments of KabirKuh Anticline, Lurestan, Iran as well as Western Rajasthan, India.

The subject of thesis has been subdivided into eleven chapters. The first chapter highlights the scope of the present study along with details of the area investigated, its physiography, climate, location and accessibility.

The general geology of Iran, its Major Structural Zones, Stratigraphy of the Zagros Mountains and the area understudy along with historical review and a detailed description of the stratigraphic sections measured for the investigation have been dealt with the second chapter.

Third chapter includes the general geology of Western Rajasthan, particularly stratigraphy of the Lower Tertiary sediments, a brief description of the work carried over them and the field investigation procedures.

The fourth chapter of the thesis is concerned with various maceration techniques adopted in the laboratory during the course of the present study.

Chapters five and six deal with systematic description of recovered microflora and fauna. It also incorporates a checklist of the reworked palynotaxa that have no direct bearing with present investigation.

The seventh chapter contains the interpretation of the field and laboratory data. It includes botanical and zoological aspects, floral and faunal comparisons with neighboring states of India as well as Iran. Besides, biostratigraphic zonations and age correlation have also been discussed in detail in this part.

The evolution of Iran and Western Rajasthan basins has been discussed in chapter eight in the form of Geological History.

The organic maturation studies and source rock palynology of the Lower Tertiary successions of KabirKuh Anticline, Lurestan, Iran and Western Rajasthan are given in the chapter nine.
Finally, the significant achievements gained during the present Research Programme have been highlighted in the form of conclusion in chapter ten. The selected references which were available for study and illustrations pertaining to the field and laboratory observations are returned in chapter eleven as well as separate respectively.