

Mesozoic radiolarian biostratigraphy in pelagic sediments in the Kermanshah area, west Iran

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The ophiolite belts in Iran are important regions to elucidate paleoenvironmental reconstruction of the entire Neo-Tethys. Pelagic sequences associated with ophiolitic rocks are well exposed in the Kermanshah area, west Iran. In our field survey in 2011, we worked at several localities of the pelagic sequences. Radiolarian analysis revealed that the pelagic sequences are categorized into two groups: Upper Triassic sequence represented by the Gohareh section and Middle Jurassic-Lower Cretaceous sequence represented by the Bisetun section.

The Gohareh section is composed mainly of red bedded chert with alternating beds of chert and limestone. Some micritic limestone beds contain nodular cherts. Several samples of red chert yield moderately preserved Late Triassic radiolarians including *Tritortis*(?) sp. and *Capnucosphaera* sp. The Bisetun section consists of red and green chert. Limestone-dominated intervals are also recognized in the section. Middle Jurassic to Early Cretaceous radiolarians were obtained from red and green chert samples. Identified radiolarian zones include the *Striatojaponocapsa conexa* Zone (middle Bathonian-late Callovian), *Kilinora spiralis* Zone (Oxfordian), *Hsuum maxwelli* Zone (Kimmeridgian), and *Pseudodictyomitra carpatica* Zone (Tithonian-early Valanginian).

Gharib and De Wever (2010) reported Mesozoic radiolarians ranging in age from early Pliensbachian to Turonian in the Kermanshah area for the first time. Our research adds the occurrences of Late Triassic radiolarians from pelagic sequences together with Middle Jurassic-Early Cretaceous radiolarians. The pelagic sequences in the study area were accumulated at different depositional sites of the Neo-Tethys. Our research clarified that the depositional history of the ophiolitic belts in west Iran, part of the Neo-Tethys, can be traceable to the Late Triassic.

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