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## **SOUTHERN POLAND MIDDLE TRIASSIC (MUSCHELKALK) MICRO- AND MACROVERTEBRATE REMAINS**

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Middle Triassic (Muschelkalk) limestones and dolostones of southern Poland are known to contain vertebrate remains. Here we present micro- and macrofossils from several sites and different sediment types, which allow recognition of geographic and lithologic trends in distribution of the collected material. Microfossils were picked under the binocular after dissolution of the crushed sediment samples in 10% acetic acid. Macrofossils were manually prepared by students of Jagiellonian University.

Macrospecimens comprise vertebrae, teeth and fragments of long bones, all belonging to aquatic or semi-aquatic reptiles, most probably nothosaurids. Microfindings are mostly fish remains, particularly actinopterygian teeth and scales and chondrichthyan teeth and fin spines, whereas reptilian remains are less common. The material and species diversity implies that faunas in the mid-Triassic sea was derived from many different biotopes. Geographical and stratigraphic differences in the fossil content probably reflect spatial and temporal changes in Middle Triassic vertebrate communities. Fossils can be found in all examined types of sediment, but the richest vertebrate remains are in crinoid limestone layers, interpreted as tempestites. This observation highlights storm activity as the main process of transport and accumulation of skeletal material.