Abstract

This thesis is focused on the phylum Tardigrada. The main goal is to implement this topic into the curriculum of primary and secondary education. The thesis is divided in two parts – theoretical and empirical. The theoretical part comprises five basic topics: the general introduction to phylum Tardigrada and other moss fauna; extraction methods; analysis of textbooks for primary and secondary schools; and application of obtained knowledge about phylum Tardigrada in education. In this thesis, water bears are used as model organisms for creating practical suggestions for teaching methods and forms that can be used when implementing this theme into a teaching process. The empirical part presents the results of extensive study focused on the occurrence of Tardigrada in moss from variety of habitats in the Czech Republic and its implication for practical use.

Keywords: moss fauna, cryptobiosis, education, teaching methods, research, analysis of textbooks