SHIFT 02-175 - DIVERSITY OF HYPOGEOUS GENERA SCLEROGASTER AND WAKEFIELDIA (BASIDIOMYCOTA) IN NORTH MACEDONIA (ID 2212)

Topic

AS03. Evolution, biodiversity and systematics

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Abstract Body

Genera Sclerogaster and Wakefieldia, a hypogeous fungi (Basidiomycota), are rarely reported, particularly from poorly mapped regions of the Balkan Peninsula. Research on hypogeous fungi in North Macedonia is progressing steadily in recent last years, resulting in increasing number of collections in the Macedonian Collection of Fungi (MCF). We performed a morphological and molecular characterization of collections from the MCF, compare them to available collection from other areas of the Balkan Peninsula and available sequences in nucleotide databases. The area of focus in this study were mountains Bistra, Shar Planina and Vodno and the valley Skopsko Pole. Both morphological details and molecular diversity of the two genera based on the nr rDNA ITS marker are presented. We distinguished two species of genus Sclerogaster in North Macedonia. S. compactus with its second report for the Balkan Peninsula, and moderately more common S. hysterangioides. S. compactus is found from only one site in the riparian community of Populus alba and Ulmus laevis. S. hysterangioides is regarded as a common species, in North Macedonia recorded from four sites and different types of habitats. The genus Wakefieldia is monotypic genus with W. macrospora as the sole species in Europe. Our collections are first records for North Macedonia. As information on these species is scarce, we also provide information on their ecology. The study of hypogeous fungi in N. Macedonia supports the high diversity of this group of fungi in the area and calls for future and more detailed study of their distribution and ecology.