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FIRST RECORD OF BEAUVERIA PSEUDOBASSIANA (CORDYCIPITACEAE, ASCOMYCOTA) FROM HUNGARY

A Beauveria pseudobassiana (Cordycipitaceae, Ascomycota) első adata Magyarországról

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The genus Beauveria Vuill. (Cordycipitaceae, Hypocreales) is a globally distributed genus, includes soilborne, entomopathogenic, pleomorphic fungi with high ecological and economic importance. These fungi play an important role in the regulation of insect populations in natural environments, and certain species are used as mycoinsecticides to control various insect pests in agronomy and forestry. In biological plant protection, the most widely used Beauveria species belong to the B. bassiana and B. brongniartii complexes. To investigate entomopathogenic fungi in Hungary, many samples have been collected in the past few years, also by amateur mycologists. One of the samples was found on the cadaver of a whitespotted stink bug (Eysarcoris ventralis). Stink bugs, like the brown marmorated stink bug (Halyomorpha halys) or the southern green stink bug (Nezara viridula) cause major economic damage in agriculture, notably in the horticultural sector. Based on morphological characteristics, our fungal sample isolated from a bug species belong to the B. bassiana species complex. However, to identify the sample at species level, a molecular phylogenetic analysis was also performed. Based on the nrDNA ITS sequences, our specimen collected in Hungary is identical to the sequences of *B. pseudobassiana* (incl. the sequences from the type specimen). According to literature, this species has not been identified from Hungary, therefore, here we present its first verified record from the country. As being part of the B. bassiana species complex and described from numerous insect pests worldwide, *B. pseudobassiana* is a perspective biological control agent.

However, further experimental studies are required in order to use this species in economical pest management.