English abstract

This study is devoted to the flora and vegetation of walls in the region of south and west Moravia. Ecological conditions of these antropogenous habitats were described in detail. In total, 288 species of vascular plants and 39 bryophytes were recorded in 302 relevés. Flora of walls is composed of a high number of accidental species. Only 2 % of species occurred with frequency 20-50 %. The most common taxa were Taraxacum sect. Ruderalia (49 %), Chelidonium majus (32 %) and Poa compressa (31 %). The most common moss was Tortula muralis (28 %). The most frequent families of vascular plants were Asteraceae (14 %), Poaceaea (12%) and Brassicaceae (7%). Ecological and biological features of wall plants were studied. The most common life forms of vascular plants were hemicryptophytes (51 %) and therophytes (28 %). Prevailing life strategies of vascular plants were C (31 %), CSR (20 %) and CS (17%). The most common strategies of dissemination were anemochory (41%) and epizoochory (19 %). There were 40 % alien species (24 % archaeophytes and 16 % neophytes). Out of 39 bryophytes there were 62 % of acrocarpous mosses and 36 % of pleurocarpous mosses. The most common life strategies of bryophytes were perennial stayers (45 %) and colonists (42 %). For analysis of the relationship between species composition and environmental factors the methods of gradient analysis were used. The main factors influencing the flora and vegetation of walls were altitude and habitats types of walls (vertical and horizontal surfaces). Species of vascular plants growing on these habitats differed from each other in requirements for moisture, light, pH and continentality. Another factor influencing wall flora and vegetation was the type of building and binding material. In total, 10 communities were distinguished on the studied walls. Their species composition, ecological requirements and distribution were discussed. The communities were compared with analogous vegetation from other parts of the Czech Republic and Europe.