

POPULATION GENETIC STRUCTURE OF EUROPEAN GROUND  
SQUIRREL IN THE CZECH REPUBLIC ASSESSED  
BY MICROSATELLITES

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European ground squirrel (*Spermophilus citellus*) is endangered species in the Czech Republic. Huge level of landscape fragmentation has restricted ground squirrels into few isolated localities. Its abundance is decreasing and populations are disappearing. We analyzed six Czech and one Slovak (comparative) localities with European ground squirrel (n=172) using five microsatellite loci as genetic marker. The mean heterozygosity for the Czech population ( $H_e=0.333$ ) was much lower than for the Slovak one ( $H_e=0.608$ ). Investigated populations showed already high level of inbreeding (range of  $F_{IS}=0.553-0.907$ ) and strong genetic differentiation (mean of  $F_{ST}=0.16$ ). High inbreeding could affect the viability of the each population and it could be one of the factors leading to the present extinction trend. Unfortunately, so far, no another study of population genetic structure has been done on this species to compare heterozygosity in other places of ground squirrel natural distribution.