



## **Landslide susceptibility zonation by using GIS in the region between the Slanicul Buzaului and the Buzau Valleys (Romania)**

**Mihaela Constantin**

Institute of Geography, Romanian Academy, Romania, mihaela.constantin@gmail.com/  
phone:+40-21-3135990

Landslides are natural hazards causing significant damage in Romania. Recent attempts have been made to apply GIS techniques to working out landslide susceptibility maps for severely affected areas. The studied area belongs to the Curvature Carpathian and the Subcarpathian regions of Romania and features a diverse lithological structure (flysch and molasses) and a wide range of slope declivities which are the two most influential conditions in decreasing slope stability. A certain score in terms of the correlation with the possible landslide occurrence and the parameters taken into consideration was assigned to each variable (lithology, slope declivity, slope aspect and land use). A landslide susceptibility map was obtained by overlapping thematic maps of conditioning factors.