2D/3D CARTOGRAPHIC DISPLAY OF DATA IN SLOVAKIA

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3D cartographic visualization on the Internet is one of the techniques used in various application sectors. These forms of visualization are increasingly appearing in geological science. Despite the fact that several 3D geological models have been produced in Slovakia, they are not available on the Internet due to problems with exports from modelling software. The prezentation deals with the development and implementation of a web information system for 2D and 3D cartographic visualization of natural resources.

Verification of the proposed concepts and newly developed technologies was performed in three areas of interest. Methods for exporting data from modelling software and searching for a format for displaying a 3D model were searched using the data from the Upper Nitra Basin (Hornonitrianska kotlina). The groundwork data for the 3D model of the Headquarters of the State Geological Institute of Dionýz Štúr (SGIDŠ) with samples of mineral raw materials were collected using UAV photogrammetry. Two 3D models of the area created by different procedures were tested for the response of the visualisation. In the territory of the Slovak Republic, methods obtained in smaller areas were used and a 3D model of the Slovak Republic was compiled.