Exploring new ways of integration, visualization and interaction with Geotechnical and Geophysical Data

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Abstract— The work presented in this paper aims at exploring new ways of integrating, visualizing and interacting with geotechnical and geophysical data that may be more rich and interactive than those offered by most current Geographic Information Systems (GIS). Some visualization techniques enabling simultaneous visualization of the several data types available in our case study are proposed. Moreover, methods were developed to guide experts while defining layers and other relevant geological structures. The work is still in an early stage and is main goal has been assessing the validity and adequacy of the proposed techniques to the specific geotechnical and geophysical data under consideration.

Keywords-component; Visualization; geotechnical and geophysical data; VTK (Visualization Toolkit)

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