



Developing a mapping tool for tablets

Alan Vaughan, Nathan Collins, and Mike Krus

Midland Valley Exploration, 144 West George St, Glasgow, G2 2HG, UK (avaughan@mve.com)

Digital field mapping offers significant benefits when compared with traditional paper mapping techniques in that it provides closer integration with downstream geological modelling and analysis. It also provides the mapper with the ability to rapidly integrate new data with existing databases without the potential degradation caused by repeated manual transcription of numeric, graphical and meta-data.

In order to achieve these benefits, a number of PC-based digital mapping tools are available which have been developed for specific communities, eg the BGS•SIGMA project, Midland Valley's FieldMove®, and a range of solutions based on ArcGIS® software, which can be combined with either traditional or digital orientation and data collection tools. However, with the now widespread availability of inexpensive tablets and smart phones, a user led demand for a fully integrated tablet mapping tool has arisen.

This poster describes the development of a tablet-based mapping environment specifically designed for geologists. The challenge was to deliver a system that would feel sufficiently close to the flexibility of paper-based geological mapping while being implemented on a consumer communication and entertainment device. The first release of a tablet-based geological mapping system from this project is illustrated and will be shown as implemented on an iPad during the poster session.

Midland Valley is pioneering tablet-based mapping and, along with its industrial and academic partners, will be using the application in field based projects throughout this year and will be integrating feedback in further developments of this technology.