



Evaluation and combination of new elevation data (ASTER / SRTM) for geomorphological and geoarchaeological questions

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Since a few years, new elevation data from the Advanced Spaceborne Thermal Emission and Reflection Radiometer (ASTER) on board of the Terra satellite and from the Shuttle Radar Topography Mission (SRTM) are available for free that cover nearly the whole land surface in high resolution. Although an increasing number of publications appeared using these data for various questions, e.g. by the calculation of digital elevation models as modules for other models, only a few evaluation studies exist up to now.

The poster presents such studies by a comparison of ASTER and SRTM data with other elevation data (e.g. laser-scan data) and with regard to their applicability for geomorphological and geoarchaeological questions on different scales in the Eastern Sahara.

In addition, a method is presented that allows an improvement of data quality by a combination of SRTM and ASTER data, e.g. by the filling of missing SRTM data with calibrated ASTER data within a Geographic Information System (ArcGIS).