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The Central European Flood in June 2013: Experiences from a Near-Real Time Disaster Analysis in Germany

Kai Schröter (1,2), Bijan Khazai (1,3), Bernhard Mühr (1,4), Florian Elmer (1,10), Tina Bessel (1,5), Stella Möhrle (1,6), André Dittrich (1,7), Heidi Kreibich (1,2), Joachim Fohringer (1,8), Tina Kunz-Plapp (1,3), Werner Trieselmann (1,9), Michael Kunz (1,4), Bruno Merz (1,2)

(1) CEDIM - Center for Disaster Management and Risk Reduction Technology, (2) German Research Centre for Geosciences (GFZ), Section Hydrology, Potsdam, Germany, (3) Karlsruhe Institute of Technology (KIT), Geophysical Institute (GPI), Karlsruhe, Germany, (4) Karlsruhe Institute of Technology (KIT), Institute for Meteorology and Climate Research (IMK-TRO), Karlsruhe, Germany, (10) German Research Centre for Geosciences (GFZ), Scientific infrastructure and Platforms, Potsdam, Germany, (5) Karlsruhe Institute of Technology (KIT), Institute for Economics (ECON), Karlsruhe, Germany, (6) Karlsruhe Institute of Technology (KIT), Institute for Nuclear and Energy Technologies (IKET), Karlsruhe Germany, (7) Karlsruhe Institute of Technology (KIT), Institute of Photogrammetry and Remote Sensing (IPF), Karlsruhe Germany, (8) German Research Centre for Geosciences (GFZ), Section Geoinformatics, Potsdam, Germany, (9) German Research Centre for Geosciences (GFZ), Section Earthquake Risk and Early Warning, Potsdam, Germany

The central European flood in June 2013 once again revealed that complete flood protection is not possible. Inundations caused severe damage to buildings, infrastructure and agricultural lands. Official estimates of total damage in Germany amount to approx. 8bn € which is lower than the damage caused by the August 2002 flood - the most expensive natural hazard experienced so far in Germany.

Repeated and long lasting precipitation in combination with extremely adverse preconditions induced a large scale flood event. In Germany, particularly the catchment areas of the Danube and Elbe were affected. The June 2013 flood has been the most severe flood event in terms of spatial extent and magnitude of flood peaks in Germany during the last 60 years. Large scale inundation occurred as a consequence of levee breaches near Deggendorf (Danube), Groß Rosenau and Fischbeck (Elbe). The flood has had a great impact on people, transportation and the economy. In many areas more than 50,000 thousand people were evacuated. Electrical grid and local water supply utilities failed during the floods. Furthermore, traffic was disrupted in the interregional transportation network including federal highways and long distance railways.

CEDIM analysed and assessed the flood event within its current research activity on near real time forensic disaster analysis (CEDIM FDA: www.cedim.de). This contribution gives an overview about the CEDIM FDA analyses' results. It describes the key hydro-meteorological factors that triggered this extraordinary event and draws comparisons to major flood events in August 2002 and July 1954. Further, it shows the outcomes of a rapid initial impact assessment on the district level using social, economic and institutional indicators which are supplemented with information on the number of people evacuated and transportation disruptions and combined with the magnitude of the event.