



Panta Rhei – Everything Flows
Change in Hydrology and Society
IAHS Scientific Decade 2013-2022
www.iahs.info/pantarhei

Summary of the activity of the Panta Rhei Working Groups – Year 2014

Title of the Working Group: Understanding flood changes

Report of the activity of the working group in 2014

In October 2014 the Flood Change Team of the Technical University of Vienna has organised the **symposium** [“Land Use Change Impacts on Floods”](#) with the aim to discuss possible impacts of land use changes on flood regimes. Many participants of the symposium are working on writing an opinion paper about state of the art and ways forward for the topic.

In October 2014 Flood Change team of the Slovak University of Technology in Bratislava has organised in Bratislava a one day **international conference** [“Hydrocarpath 2014: Catchment processes in regional hydrology: Confronting experiments and modeling in Carpathian drainage basins”](#). Among the themes of the conference the problems of flood regionalisation and generalisations of hydrological-extreme regimes on various temporal and spatial scales using new data and increased process knowledge were discussed.

Together with the WG “Changes in Flood Risk”, two **sessions** for the EGU 2015 meeting have been organised: [“Hydrological extremes: from droughts to floods”](#) and [“Flood changes: understanding the drivers of hazard and risk”](#).

Papers were also published in 2014 with acknowledgements to Panta Rhei WG on floods:

- Arheimer, B. and Lindström, G. (2014). Climate impact on floods – changes of annual high flows in Sweden during the past and in the future. HESSD (doi:10.5194/hessd-11-7551-2014).

- Hall, J., et al. (2014). Understanding Flood Regime Changes in Europe: A state of the art assessment, Hydrol. Earth Syst. Sci. (HESS), 18, 2735–2772 (doi:10.5194/hess-18-2735-2014)
- Viglione, A., et al. (2014). Insights from socio-hydrology modelling on dealing with flood risk – roles of collective memory, risk-taking attitude and trust, Journal of Hydrology, doi:10.1016/j.jhydrol.2014.01.018.

There has been an **exchange of students** (both master and PhD) among institutions involved in the WG, who have worked on the topic of flood change identification and attribution.

Description of the opportunities provided by Panta Rhei

The main benefits provided by Panta Rhei, and more specifically by the establishment of the WG, have been the enlargement of the **network** of many of the group members (mainly the young ones) and new **collaboration** opportunities (with reference to the symposium “Land Use Change Impacts on Floods”, a number of experts in land use research are collaborating now for the first time in drafting an opinion paper).

When establishing Panta Rhei, a parallel process on **attracting funds** for the work on floods was started, which resulted in the EU FP7 project “[SWITCH-ON](#)” (Grant agreement No 603587). Some partners of the working group are also partners in this project, which (among other things) conduct research on floods across Europe. Panta Rhei thus serve as a meeting place for finding partners to build project consortiums for funding proposals and projects.

Suggestions for the future development of Panta Rhei

List of wishes:

- There are many working groups and it is not clear how they link to three main themes or if this is matrix organisation. If its a matix organisation it would be nice to have workshops for each of these across the WGs.
- It is not clear what the responsibilities are to run a WG or to belong to a WG. This would help to increase the active actions of WG members in sharing of results and initiating collaborations.
- It would be great if Panta Rhei could provide more support for attracting funding for Panta Rhei topics in e.g. trigger specific calls, collecting suitable call information, actively motivate and support proposals, etc.