

Results of the STAHY Best Paper Award 2014

The STAHY Best Paper Award 2014 is assigned to:

- Ludovic Oudin, University Pierre et Marie Curie, Paris,
- Alison Kay, Centre for Ecology and Hydrology, Wallingford, UK
- Vazken Andréassian, Irstea, Antony, France
- Charles Perrin, Irstea, Antony, France,



Ludovic Oudin, Alison Kay, Vazken Andréassian and Charles Perrin

for the paper:

Oudin L., Kay A., Andraassian V., Perrin C. Are seemingly physically similar catchments truly hydrologically similar? *Water Resources Research*. 46 (11) 2010.

The STAHY Best Paper 2014 is the result of evaluation of 20 papers, selected among the 289 papers (published in 2010-2011-2012) present in ICSH website and ordered by citations (SCOPUS database, excluding self citations).

The list of 20 eligible papers were:

1. * Kao S.-C., Govindaraju R.S. A copula-based joint deficit index for droughts. *Journal of Hydrology* 380(1-2) 2010. 70 citations
2. Wong G., Lambert M.F., Leonard M., Metcalfe A.V. Drought analysis using trivariate copulas conditional on climatic states. *Journal of Hydrologic Engineering* 15 (2) 2010. 39 citations
3. Xu K., Milliman J.D., Xu H. Temporal trend of precipitation and runoff in major Chinese Rivers since 1951. *Global and Planetary Change* 73 (3-4) 2010. 30 citations.
4. Sousa P.M., Trigo R.M., Aizpurua P., Nieto R., Gimeno L., Garcia-Herrera R. Trends and extremes of drought indices throughout the 20th century in the Mediterranean. *Natural Hazards and Earth System Science* 11 (1) 2011. 28 citations.
5. Mailhot A., Duchesne S. Design criteria of urban drainage infrastructures under climate change. *Journal of Water Resources Planning and Management* 136 (2) 2010. 27 citations.
6. Salvadori G., De Michele C. Multivariate multiparameter extreme value models and return periods: A copula approach. *Water Resources Research*. 46 (10) 2010. 26 citations.
7. Tabari H., Hosseinzadeh Talaee P. Temporal variability of precipitation over Iran: 1966-2005. *Journal of Hydrology*. 396 (3-4) 2011. 23 citations.
8. Lopez-Moreno J.I., Vicente-Serrano S.M., Angulo-Martinez M., Begueria S., Kenawy A. Trends in daily precipitation on the northeastern Iberian Peninsula, 1955-2006. *International Journal of Climatology*. 30 (7) 2010. 23 citations.

9. Villarini G., Smith J.A. Flood peak distributions for the eastern United States. *Water Resources Research*. 46 (6) 2010. 23 citations.
10. Song S., Singh V.P. Meta-elliptical copulas for drought frequency analysis of periodic hydrologic data. *Stochastic Environmental Research and Risk Assessment*. 24 (3) 2010. 23 citations.
11. Tao H., Gemmer M., Bai Y., Su B., Mao W. Trends of streamflow in the Tarim River Basin during the past 50years: Human impact or climate change? *Journal of Hydrology*. 400 (1-2) 2011. 22 citations.
12. Oudin L., Kay A., Andraassian V., Perrin C. Are seemingly physically similar catchments truly hydrologically similar? *Water Resources Research*. 46 (11) 2010. 22 citations.
13. Song S., Singh V.P. Frequency analysis of droughts using the Plackett copula and parameter estimation by genetic algorithm. *Stochastic Environmental Research and Risk Assessment*. 24 (5) 2010. 22 citations.
14. Sang H., Gelfand A.E. Continuous spatial process models for spatial extreme values. *Journal of Agricultural, Biological, and Environmental Statistics*. 15 (1) 2010. 22 citations.
15. Caloiero T., Coscarelli R., Ferrari E., Mancini M. Trend detection of annual and seasonal rainfall in Calabria (Southern Italy). *International Journal of Climatology*. 31 (1) 2011. 21 citations.
16. Burn D.H., Sharif M., Zhang K. Detection of trends in hydrological extremes for Canadian watersheds. *Hydrological Processes*. 24 (13) 2010. 21 citations.
17. Vandenberghe S., Verhoest N.E.C., De Baets B. Fitting bivariate copulas to the dependence structure between storm characteristics: A detailed analysis, based on 105 year 10 min rainfall. *Water Resources Research*. 46 (1) 2010. 20 citations.
18. Lima C.H.R., Lall U. Spatial scaling in a changing climate: A hierarchical bayesian model for non-stationary multi-site annual maximum and monthly streamflow. *Journal of Hydrology*. 383 (3-4) 2010. 20 citations.
19. Lorenzo-Lacruz J., Vicente-Serrano S.M., Lopez-Moreno J.I., Moran-Tejeda E., Zabalza J. Recent trends in Iberian streamflows (1945-2005). *Journal of Hydrology* 414-415 2012. 19 citations.
20. Koutsoyiannis D. Hurst-Kolmogorov Dynamics and Uncertainty. *Journal of the American Water Resources Association*. 47 (3) 2011. 19 citations.

* this paper will be excluded by the selection since it was the winner of 2013 edition.

The recipient of the STAHY Best Paper award 2014 will be keynote speaker at the STAHY'14 Workshop, Abu Dhabi, November 2014.

The STAHY Best Paper Award 2013 Committee: Salvatore Grimaldi, Uwe Haberlandt, Emna Gargouri, Simon Micheal Papalexou, Ebru Eris