

Special Issue

Flood Frequency Analysis and Modelling

Message from the Guest Editors

This Special Issue focuses on flood estimation in catchments using flood frequency analysis and different modelling methods.

Flood frequency analysis (FFA) is often adopted to estimate design floods, which are needed for many water resources management tasks. The selection of an appropriate probability distribution-associated parameter estimation procedure, accounting for climate change and uncertainty, is of prime importance in at-site FFA.

Potential topics for this Special Issue include, but are not limited to:

Annual maximum and peaks-over-threshold flood frequency analysis.

Impacts of climate change on flood frequency analysis.

Uncertainty in flood frequency analysis.

Impact of distributional assumptions, parameter estimates, record lengths and outliers on flood frequency analysis.

Bayesian methods and Monte Carlo simulation in flood frequency analysis.

Goodness-of-fit methods for flood frequency analysis.

Bivariate flood frequency analysis using copulas.

Historical and paleohydrologic information in flood frequency analysis.

Entropy-based flood frequency analysis.

Urbanization effects on flood frequency analysis.

Regional flood frequency analysis.

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In the context of global changes, the sustainable management of water cycles, going from global and regional water cycles to urban, industrial and agricultural water cycles, plays a very important role on the water resources and on their relationships with food, energy, biodiversity, ecosystem functioning and human health. *Water* invites authors to provide innovative original full articles, critical reviews and timely short communications and to propose special issues devoted to new technological and scientific domains and to interdisciplinary approaches of the water cycles. We ensure a critical review process and a quick turnaround between submission and final decision.

Editor-in-Chief

Dr. Jean-Luc PROBST

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