



water



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River Modeling and Riverbed Evolution

Guest Editor:

Dr. Xiaolei Zhang

School of Water Conservancy,
North China University of Water
Resources and Electric Power,
Zhengzhou, China

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Message from the Guest Editor

Riverbed evolution refers to the process of siltation and erosion in the riverbed under natural conditions and after the construction of remediation structures. It is a manifestation of two-phase water–sand flow movement with unconstant inlet and outlet conditions and complex movable boundaries. River modeling is an important research tool to predict the evolution process of riverbeds and the corresponding water and sediment movement.

The aim of this Special Issue of *Water* seeks to understand the latest advances in river modeling and riverbed evolution, including (1) the theory and technology behind river modeling including physical experiment and mathematical modeling, (2) the impact of human activities on riverbed evolution, and (3) the evolutionary processes of riverbeds in changing environments (riverbed erosion and siltation, river type and river potential, shoreline changes, etc.). We welcome original papers addressing research themes including, but not limited to, flood routing, numerical modelling of flow and sediment transport and riverbed evolution. Relevant research outcomes are expected to support the river training and flood management practices.



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Special *Issue*



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Auzeville Tolosane, Toulouse,
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Message from the Editor-in-Chief

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.

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Contact Us

Water Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

Tel: +41 61 683 77 34
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