

Special Issue

Ecohydraulics and Fish Behavior Simulation

Message from the Guest Editor

The development of hydropower provides services for the deployment of water resources, the storage of clean energy and the prevention of disasters. However, hydropower has inevitably altered the natural environment of rivers, changed the conditions of fish habitats, and resulted in changes in the movement of fish. Hydraulics can be perceived by fish via their hydrodynamic sensory system and be used to alter the behavioral responses of fish. The effects of hydraulics on the behavior of fish is associated with several challenges, including the swimming abilities of fish, the hydraulics of fish passing facilities, and behavior of fish during passage.

The Special Issue focuses on the advancement of ecohydraulics and the simulation of fish behavior. The scope of this Special Issue includes, but is not limited to, the following topics:

Fishway structure design and optimization; Fishway hydraulics; Fish attraction facilities and efficiency; Ecohydraulics; Fish-friendly fishways; Hydrodynamics; Fish behavior experiments and simulations ; Field monitoring; Evaluation of fish passage; Fish lift

Guest Editor

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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.

Editor-in-Chief

Dr. Jean-Luc PROBST

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