

# Integrated Management of Rivers and Reservoirs

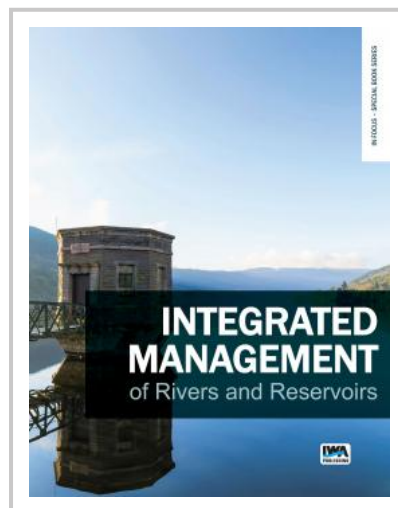


**Editor(s):** Weiwei Shao, Quan Jin

Climate change has altered hydrologic conditions, which directly affects water resources. In addition, increasing human activities have an impact on water resources, water environment and water ecology. Rivers are important channels of water cycle, the main source of fresh water for human consumption and an important renewed resource, which play essential roles in material cycle, energy flow and climate regulation. Reservoirs are important components of water conservancy constructions, and play vital roles in regional flood interception, water storage, and the regulation of water flow. It is of great significance to study the mechanism of the water cycle under the changing environment and build an optimized water resource management based on it.

Rivers and reservoirs are faced with many problems, and it is necessary to study the optimal management of water resources in rivers, lakes and reservoirs, the hydrological mechanism and ecological environment process (including experimental and numerical simulation methods), the optimal operation of engineering facilities and their natural and social effects, as well as the mitigation of water security problems and ensuring the sustainability of the ecosystem through the integrated management of rivers and reservoirs.

**In Focus – a book series that showcases the latest accomplishments in water research. Each book focuses on a specialist area with papers from top experts in the field. It aims to be a vehicle for in-depth understanding and inspire further conversations in the sector.**



**Publication Date:** 15/08/2021

**ISBN13:** 9781789062663

**Pages:** 170

**Print:**

**Standard price:** £75 / €94 / \$113

**Member price:** £56 / €70 / \$84