Special Issue

Precision Irrigation Management and Soil Moisture Optimization in Agroecosystems

Message from the Guest Editors

In face of the the increasing water scarcity, climate vriability and the demand of higher agricultural productivity, prescision irrigation and soil moisture optimization is crucial for sustainable agricultural production. Exploring the the cutting-edge advances in precision management technologies, smart soil moisture sensing sysytems and precisie sensors to assess the plants internal water status with integrated irrigation management strategies which supports a climate resilient and sustainable agroecosystems.
We invites global researchers to submit novel reserch articles, reviewes, meta-analysis and case-studies , including but not limited to:

- Precision irrigation strategies for sustainable crop production
- Sensors technologies for precision irrigation schedulling
- Soil moisture sensor based, ET based and plant based irrigation schedulling
- Site specific and variable rate irrigation mangement
- Deficit and regulated defict irrigation management
- Irrigation system design, evaluation and performance
- IoT, AI and remote senseng integration for irrigation schedulling

Guest Editors

Dr. Nawab Ali

Department of Biosystems and Agricultural Engineering (BAE), College of Agriculture and Natural Resources, Michigan State University, East Lansing, MI, USA

Dr. Younsuk Dong

Department of Biosystems and Agricultural Engineering (BAE), College of Agriculture and Natural Resources, Michigan State University, East Lansing, MI, USA

Deadline for manuscript submissions

20 July 2026

Water

an Open Access Journal by MDPI

Impact Factor 3.0
CiteScore 6.0

mdpi.com/si/246108

Water
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
water@mdpi.com

mdpi.com/journal/water

Water

an Open Access Journal by MDPI

Impact Factor 3.0
CiteScore 6.0

mdpi.com/journal/water

About the Journal

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
Centre de Recherche sur la Biodiversité l'Environnement (CRBE) UMR CNRS/UPS/INPT/IRD, Centre National de la Recherche Scientifique (CNRS), University of Toulouse, Campus ENSAT, Auzeville Tolosane, Toulouse, France

Author Benefits

Open Access:

free for readers, with article processing charges (APC) paid by authors or their institutions.

High Visibility:

indexed within Scopus, SCIE (Web of Science), Ei Compendex, GEOBASE, GeoRef, PubAg, AGRIS, CAPlus / SciFinder, Inspec, and other databases.

Journal Rank:

JCR - Q2 (Water Resources) / CiteScore - Q1 (Aquatic Science)

MDPI