Special Issue

Irrigation Management in the Digital Age: To Enhance Resource Efficiency and Sustainability

Message from the Guest Editor

Precision agriculture has emerged as a promising approach to address the global challenges of food security, resource depletion, and environmental sustainability. The integration of advanced technologies, such as remote sensing, data analytics, and intelligent irrigation systems, has enabled the optimization of resource utilization and improved agricultural productivity. Efficient resource management, particularly of water, is critical for enhancing agricultural sustainability and resilience in the face of climate change and increasing population pressures. This Special Issue aims to showcase innovative research and technological advancements in precision agriculture. Topics may include, but are not limited to, water-saving irrigation technologies, multi-source remote sensing applications in agriculture, soil moisture monitoring, and the integration of smart technologies for sustainable agricultural practices. We invite high-guality original research articles, reviews, and case studies that focus on precision agriculture, resource efficiency, and sustainability. Both theoretical and practical contributions are welcome.

Guest Editor

Prof. Dr. Wen'e Wang College of Water Resources and Architectural Engineering, Northwest A&F University, Yangling 712100, China

Deadline for manuscript submissions

31 August 2025



Agronomy

an Open Access Journal by MDPI

Impact Factor 3.4 CiteScore 6.7



mdpi.com/si/230273

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

mdpi.com/journal/

agronomy





an Open Access Journal by MDPI

Impact Factor 3.4 CiteScore 6.7



agronomy



About the Journal

Message from the Editor-in-Chief

Agronomy draws together researchers from diverse areas of agricultural research with a common aim of enhancing agricultural productivity globally. The journal provides unlimited free access to all those interested in advancing agricultural science from both the research and general community. Papers are released immediately after acceptance through the internet. *Agronomy* is supported by our authors and their institutes through low article processing charges (APC) for accepted papers. We hope you will support the journal by becoming one of our authors.

Editor-in-Chief

Prof. Dr. Leslie A. Weston Gulbali Centre for Agriculture, Water and Environment Research, Charles Sturt University, Wagga Wagga, NSW 2678, Australia

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), PubAg, AGRIS, and other databases.

Journal Rank:

JCR - Q1 (Agronomy) / CiteScore - Q1 (Agronomy and Crop Science)