Special Issue

Remote Sensing and GIS in Sustainable and Precision Agriculture

Message from the Guest Editors

This Special Issue aims to gather cutting-edge research on the application of geotechnologies, including remote sensing, Geographic Information Systems (GIS), UAVs, LiDAR, spatial modeling, and artificial intelligence, to address the challenges of modern agriculture. We welcome manuscripts that advance understanding and operationalization of the integrated use of these tools in the following:

- Monitoring crop phenology and productivity;
- Mapping the spatial and temporal variability of nutrients, water, and biotic/abiotic stresses;
- Supporting precision agriculture practices at multiple scales, from small farms to public policy;
- Developing data fusion methodologies (multispectral, hyperspectral, radar, UAV/LiDAR) with agricultural and climatic models;
- Assessing environmental impacts, ecosystem services, and sustainable soil use.

The focus is both on methodological advances, such as new vegetation indices, algorithms, digital platforms, and spatial models, and on practical applications, including case studies, field validation, economic analysis, and sustainability.

Guest Editors

Prof. Dr. Fernando Bezerra Lopes
Department of Agricultural Engineering, Federal University of Ceará, Fortaleza 60455-760, CE, Brazil

Prof. Dr. Adunias Dos Santos Teixeira
Department of Agricultural Engineering, Federal University of Ceara, Fortaleza 60455-760, CE, Brazil

Deadline for manuscript submissions

30 June 2026

Agronomy

an Open Access Journal by MDPI

Impact Factor 3.4
CiteScore 6.7

mdpi.com/si/258576

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

mdpi.com/journal/agronomy

Agronomy

an Open Access Journal by MDPI

Impact Factor 3.4
CiteScore 6.7

mdpi.com/journal/agronomy

MDPI

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), GEOBASE, PubAg, AGRIS, and other databases.

Journal Rank:

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