

## Topical Collection

# Machine Learning in Digital Agriculture

### Message from the Collection Editors

Agriculture plays an important role in sustaining all human activities. The rapid increase in the world's population will further exacerbate food, water, and energy challenges. Digital agriculture—with precision farming, data analytics, machine learning, and artificial intelligence—has the potential to address the challenges of sustainable agricultural use. Machine learning—the scientific field that gives machines the ability to learn without being strictly programmed—has the potential to make agriculture more efficient and effective. This Issue on *Machine Learning in Digital Agriculture* provides international coverage of advances in the development and application of machine learning for solving problems in agricultural disciplines such as soil and water management. Novel methods, new applications, comparative analyses of models, case studies, and state-of-the-art review papers on topics pertaining to advances in the use of machine learning in agriculture are particularly welcomed.

---

### Collection Editors

Prof. Dr. Thomas Scholten

Dr. Karsten Schmidt

Dr. Ruhollah Taghizadeh-Mehrjardi

---



## Agronomy

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.4  
CiteScore 6.7



[mdpi.com/si/83782](https://mdpi.com/si/83782)

*Agronomy*  
Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland  
Tel: +41 61 683 77 34  
[agronomy@mdpi.com](mailto:agronomy@mdpi.com)

[mdpi.com/journal/  
agronomy](https://mdpi.com/journal/agronomy)





# Agronomy

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.4  
CiteScore 6.7



[mdpi.com/journal/  
agronomy](https://mdpi.com/journal/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), GEOBASE, PubAg, AGRIS, and other databases.

#### Journal Rank:

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