

Special Issue

Innovative Micropropagation of Horticultural and Medicinal Plants—2nd Edition

Message from the Guest Editors

Micropropagation is an aseptic, controlled tissue culture technique for clonal mass propagation. It achieves year-round rapid multiplication of high-quality, disease-free plants from minimal tissue. Genetically uniform clonal plants preserve elite germplasm traits and yield high-yielding chemotypes, supporting large-scale production of key horticultural, silvicultural and medicinal plants. Various factors limit micropropagation multiplication rate. New approaches including LED lighting, bioreactor systems and plasma treatment elicitors boost biomass and metabolite production and reduce costs, enabling efficient, reliable and sustainable micropropagation protocols for specific plant species. Micropropagation serves as a valuable tool for plant development study, stress screening, in vitro conservation of rare plants and specialized metabolite production. This *Horticulturae* Special Issue focuses on innovative techniques for improved micropropagation systems, welcoming original research and reviews on its diverse applications.

Guest Editors

Dr. Milana Trifunović Momčilov

Department of Plant Physiology, Institute for Biological Research “Siniša Stanković”—National Institute of the Republic of Serbia, University of Belgrade, Bulevar despota Stefana 142, 11000 Belgrade, Serbia

Dr. Biljana K. Filipović

Department of Plant Physiology, Institute for Biological Research “Siniša Stanković”—National Institute of the Republic of Serbia, University of Belgrade, Bulevar Despota Stefana 142, 11000 Belgrade, Serbia

Deadline for manuscript submissions

30 January 2027



Horticulturae

an Open Access Journal
by MDPI

Impact Factor 3.4
CiteScore 6.1



mdpi.com/si/257764

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

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





Horticulturae

an Open Access Journal
by MDPI

Impact Factor 3.4
CiteScore 6.1



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



About the Journal

Message from the Editor-in-Chief

Horticultural plants and their products provide sustenance, health, and beauty. A confluence of factors is putting increasing pressure on horticultural production to evolve, and innovative research is addressing these challenges. *Horticulturae* provides a venue to communicate research results in a rapid manner with open access, allowing everyone the opportunity to stay abreast of leading research addressing horticulture. I invite you to consider publishing the results of your research in this high quality, peer-reviewed journal.

Editor-in-Chief

Prof. Dr. Luigi De Bellis
Department of Biological and Environmental Sciences and
Technologies (DiSTeBA), Salento University, 73100 Lecce, Italy

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, FSTA, and other databases.

Journal Rank:

JCR - Q1 (Horticulture) / CiteScore - Q1 (Horticulture)