



Controlled Environment Agriculture (CEA) for High Quality Medicinal and Aromatic Plants

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Message from the Guest Editors

The type and concentration of the bioactive compounds produced by a plant are influenced by a multitude of factors during growth. The most relevant are light irradiation, temperature, water, CO₂ and nutrient availability and soil characteristics. All these aspects variably affect the quality and quantity of the secondary metabolites, limiting the extensive exploitation. Improving the productivity of medicinal and aromatic plants requires innovative solutions that increase yields and quality from greenhouse to indoor farming.

This Special Issue aims to publish articles improving our knowledge of how to enhance the content in bioactive substances through plant cultivation systems with CEA, from greenhouses to indoor farms. Investigations or reviews on soilless culture systems, bioreactors, hydroponics, aeroponics, fogponics and any other advanced and controlled system are welcome, unravelling the influences of light, nutrients, water, relative humidity, air or root temperature, CO₂, eustress, and elicitors on the bioactive compounds. Life cycle assessment (LCA), facility planning, and system efficiency evaluations will also be accepted.





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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.

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