

Special Issue

Strategies to Improve Resource Use Efficiency and Stress Tolerance of Horticultural Crops in Controlled Environments

Message from the Guest Editors

We welcome contributions focusing on light management and spectral optimization, nutrient and water-use efficiency, advanced environmental control strategies, crop physiological responses to abiotic stress, innovative cultivation techniques, and smart farming solutions. Comprehensive review articles addressing recent advances, underlying mechanisms, and future research directions are encouraged.

Over six topics of interest for publication include, but are not limited to, the following:

- Resource use efficiency in controlled environment horticulture

 - Water and nutrient management strategies

 - Light quantity, quality, and photoperiod optimization

 - LED lighting and spectral management

- Crop responses to abiotic stresses (salinity, temperature, light, nutrient stress)

- Physiological and biochemical mechanisms of stress tolerance

 - Controlled environment systems

 - Greenhouse climate control and optimization

- Smart farming, sensor-based monitoring, and automation in controlled environments

- Sustainable cultivation techniques in controlled environments

- Yield, quality, and resource efficiency trade-offs in horticultural crops

Guest Editors

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Message from the Editor-in-Chief

Agriculture (ISSN 2077-0472) is an international, scholarly and scientific open access journal publishing peer-reviewed research papers, review articles, communications and short notes that reflect the breadth and interdisciplinarity of agriculture.

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