

## Special Issue

# Research on Plant Production in Greenhouse and Plant Factory Systems—2nd Edition

### Message from the Guest Editors

The intelligent greenhouse and plant factory system can successfully optimize the crop growth environment. Through the precise monitoring of crop growth conditions such as temperature, moisture, and sunlight, agricultural workers can adjust indoor artificial lights and control irrigation frequency to regulate crop photosynthesis, accelerate crop breeding under controllable environments, and enhance secondary metabolism for quality improvement—thereby boosting water use efficiency, yield, and nutritional value of fruits and vegetables. Topics of this Special Issue include the following:

- Greenhouse and plant factory environment simulation;
- Temperature and heat control;
- Sunlight control and artificial light applications;
- Water use monitoring and irrigation management;
- Crop nutrient monitoring and sustainable fertilization;
- The design and operation of smart greenhouse and plant factory systems;
- The economic and biological benefits of intelligent greenhouse and plant factory production;
- Speed crop breeding under controllable environment;
- Regulation of crop photosynthesis;
- Secondary metabolism and quality improvement of crops.

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### Deadline for manuscript submissions

30 November 2025



## Agriculture

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## About the Journal

### Message from the Editor-in-Chief

*Agriculture* (ISSN 2077-0472) is an international, cross-disciplinary and scholarly journal on the science and technology of crop and animal production, and management of the natural resource base for agricultural production. We invite submissions from authors according to the aims and scope of the journal described in more detail on this page. *Agriculture* is published in an open access format – articles are published on the journal's website immediately after acceptance, giving the scientific community and the public unlimited and free access to the content.

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### Editor-in-Chief

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