

## Special Issue

# Plant-Derived Bioinsecticides: Mechanisms of Action and Pest Control Applications

### Message from the Guest Editors

Insect pests of crops and stored products pose a major threat to food security, biodiversity, and economies worldwide. Synthetic insecticides, though effective, raise concerns due to resistance, environmental persistence, and harm to beneficial species. Plant-derived insecticides offer a sustainable alternative. From crude extracts to purified metabolites, these natural compounds show great chemical diversity and can affect insect physiology, including neural activity, digestion, and reproduction. Their biodegradability and selectivity make them valuable tools for Integrated Pest Management (IPM), helping reduce reliance on synthetic chemicals. This Special Issue of *Plants* invites research articles, reviews, and case studies on the discovery, mechanisms, and application of plant-based insecticides. Topics such as formulation, field trials, synergistic effects, crop safety, and ecological compatibility are especially welcome. The goal is to advance botanical insecticide research and promote eco-friendly crop protection strategies.

### Guest Editors

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### Deadline for manuscript submissions

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## Plants

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### Message from the Editor-in-Chief

*Plants* is an open access journal which provides an advanced forum for research findings in areas related to plant function, its physiology, biology, taxonomy, stresses, and its interactions with other organisms. It publishes original research articles, reviews, reports, and conference proceedings (peer reviewed full articles) and communications. In original research papers, it is important that full experimental details are provided. We also encourage timely reviews and commentaries on topics of interest to the plant research community.

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### Editor-in-Chief

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