Special Issue

Novel Avenues in Plant Omics and Bioinformatics Tools to Unravel the Biotic and Abiotic Stress Mechanisms

Message from the Guest Editor

Abiotic and biotic stresses are major environmental stressors which simultaneously encounter plant growth and productivity. This is a comprehensive topic on which several studies have been conducted worldwide to understand the molecular and physiological dynamisms under plant stress conditions. Despite all these efforts, the various adaptive mechanisms of plants under stressful environment still remain a major bottleneck. New and improved methods and tools for the production of stress-tolerant plant production with increasing yield and agronomical traits are needed. In recent years, ever-increasing plant multi-omics and bioinformatic tools are used to unravel deeper molecular biological insights imparting plant tolerance to diverse stress mechanisms. This Special Issue aims to integrate recent innovative high-throughput sequencing and computational omics approaches such as genomics, epigenomics, transcriptomics, proteomics, hormonomics, and other related topics which include breeding, biotechnology, biochemistry, systems biology, and agricultural practices to make novel progress in delineating the molecular and cellular systems level aspects of stress tolerant plant production.

Guest Editor

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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, 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.

Editor-in-Chief

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