

Special Issue

Breeding Strategies for Enhancing Nutritional Quality of Legumes

Message from the Guest Editor

Legumes, belonging to the large plant family Fabaceae, have been integral to human and animal nutrition for millennia. Based on their nutritional uses, legumes can be categorized into four main groups: 1. Pulses 2. Vegetables in the form of fresh green pods 3. Oilseed legumes and 4. Forage legumes. This Special Issue focuses on the breeding challenges and advancements aimed at enhancing the nutritional value of legume crops, including grains, to meet the growing global demand, improve food security, and alleviate malnutrition. With the advent of advanced technologies in genome sequencing, transcriptomics, metabolomics, and bioinformatics, a more comprehensive and holistic understanding of key molecular pathways in legume species is emerging. This progress is paving the way for the development of improved legume varieties to address the global challenges posed by the climate crisis. The specific topics covered in this issue include the following: 1. Biofortification approaches, with a focus on pulses 2. The breeding of new legume cultivars 3. Genome-editing technologies 4. The utilization of omics technologies

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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.

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