

Special Issue

Potato Physiology, Genetics and Breeding

Message from the Guest Editor

Potato is the leading vegetable crop in the world, and produces more food per unit of production area than any cereal crop. It has been recommended by the Food and Agriculture Organization of the United Nations as a food security crop for the future; however, the genetic complexity of commercial potato cultivars represents a problem for breeders in selecting genotypes with multiple desirable traits, such as high yield potential, resistance to pathogens, and abiotic stress. Additionally, the genetic base for biotic and abiotic stress tolerance in cultivated potato is narrow. Advances in the understanding of potato physiology, genetics, and the omics approach can greatly help conventional and molecular breeding create more productive and stress-tolerant genotypes. In addition, desirable traits can be found in landraces and wild relatives of potatoes, and significant effort has been made to identify and utilize genes/alleles from this source. This Special Issue aims to provide an overview of current research and knowledge regarding potato physiology, genetics, genomics, and achievements in conventional and molecular breeding in the creation of new genotypes.

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.

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