



# *biology*



an Open Access Journal by MDPI

## Plant Functional Genomics in the Era of Omics Approaches

Guest Editors:

### **Dr. Mariateresa Volpicella**

Department of Biosciences,  
Biotechnology and Environment,  
University of Bari “Aldo Moro”, Via  
Amendola 165/A, 70126 Bari, Italy

### **Dr. Cinzia Montemurro**

Department of Soil, Plants and  
Food Sciences, Faculty of  
Agricultural Science, University of  
Bari “Aldo Moro”, 70126 Bari, Italy

Deadline for manuscript  
submissions:

**closed (31 August 2023)**

### **Message from the Guest Editors**

In recent years, omics approaches have offered an extraordinary opportunity to identify and measure a huge number of genes and proteins that play a crucial role in the regulation of several plant cellular processes. The availability of the entire genome from model plants, such as *Arabidopsis thaliana* and rice, lays the foundations for understanding and assigning functions to unknown genes, using different and multiparallel approaches. Indeed, comparative genome analysis is actually a powerful approach, which is useful in the identification of gene functions associated with plant metabolic processes and development. In this perspective, all the data derived from transcriptomics, proteomics and metabolomics studies allow the investigation of the intricate network of relationships between biomolecules within the plant system.

This Special Issue welcomes the submission of original research and review manuscripts focusing on plant functional genomic studies, including methods and developments that have made contributions to field development.



[mdpi.com/si/57225](https://mdpi.com/si/57225)

# Special Issue



an Open Access Journal by MDPI

## Editors-in-Chief

### **Prof. Dr. Jukka Finne**

Research Programme in  
Molecular and Integrative  
Biosciences, Faculty of Biological  
and Environmental Sciences,  
University of Helsinki, P.O. Box  
56, FI-00014 Helsinki, Finland

### **Prof. Dr. Andrés Moya**

Integrative Systems Biology  
Institute, University of Valencia  
and CSIC, 46980 Valencia, Spain

## Message from the Editorial Board

A major strength of biological science is the diversity of approaches that biological scientists apply to their research problems. *Biology* reflects this diversity and brings together studies employing the varied experimental and theoretical approaches that are fueling biological discovery. *Biology*, the journal, is a fully peer-reviewed publication with a rapid and economical route to open access publication and is listed on PubMed. All articles are peer-reviewed and the editorial focus is on determining that the work is scientifically sound rather than trying to predict its future impact.

## Author Benefits

**Open Access:** free for readers, with article processing charges (APC) paid by authors or their institutions.

**High Visibility:** indexed within Scopus, SCIE (Web of Science), PubMed, PMC, PubAg, CAPlus / SciFinder, and other databases.

**Journal Rank:** JCR - Q1 (Biology) / CiteScore - Q1 (General Agricultural and Biological Sciences)

## Contact Us

*Biology* Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland

Tel: +41 61 683 77 34  
[www.mdpi.com](http://www.mdpi.com)

[mdpi.com/journal/biology](http://mdpi.com/journal/biology)  
[biology@mdpi.com](mailto:biology@mdpi.com)  
X@Biology\_MDPI