

Special Issue

Advances in Microbial Pathogenesis and Host Responses

Message from the Guest Editors

The mechanisms of microbial pathogenesis are significantly influenced by the host response. Host-pathogen interaction is a highly dynamic process between different microbial pathogens and hosts at all stages of pathogenic infection, from invasion to spread. Following pathogenic infection, the innate immune system responds to pathogen-associated molecular patterns and activates immediate host inflammatory and antimicrobial responses. Innate host immune activation results in the production of multiple effective molecules, including cytokines and chemokines, as well as antimicrobial proteins, to fight off invading pathogens and parasites; however, many intracellular pathogens employ a variety of evolved strategies to escape, modulate, and hijack host immunity during infection. Keywords: microbial infections; pathogenesis; microbiota; immune response; host-pathogen interactions; antibiotic resistance; clinical microbiology; public health; drug development; new therapeutic strategies

Guest Editors

Dr. Alessandra Fusco

Department of Experimental Medicine, University of Campania "Luigi Vanvitelli", Naples, Italy

Dr. Giovanna Donnarumma

Dipartimento di Medicina Sperimentale, Università degli Studi della Campania "Luigi Vanvitelli", Naples, Italy

Deadline for manuscript submissions

closed (31 July 2024)



Microorganisms

an Open Access Journal
by MDPI

Impact Factor 4.2
CiteScore 7.7
Indexed in PubMed



mdpi.com/si/185811

Microorganisms
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
microorganisms@mdpi.com

[mdpi.com/journal/
microorganisms](https://mdpi.com/journal/microorganisms)





Microorganisms

an Open Access Journal
by MDPI

Impact Factor 4.2
CiteScore 7.7
Indexed in PubMed



[mdpi.com/journal/
microorganisms](https://mdpi.com/journal/microorganisms)



About the Journal

Message from the Editor-in-Chief

"Microorganism" merges the idea of the very small with the idea of the evolving reproducing organism is a unifying principle for the discipline of microbiology. Our journal recognizes the broadly diverse yet connected nature of microorganisms and provides an advanced publishing forum for original articles from scientists involved in high-quality basic and applied research on any prokaryotic or eukaryotic microorganism, and for research on the ecology, genomics and evolution of microbial communities as well as that exploring cultured microorganisms in the laboratory.

Editor-in-Chief

Dr. Nico Jehmlich

Department of Molecular Toxicology, UFZ-Helmholtz Centre for
Environmental Research, 04318 Leipzig, Germany

Author Benefits

High Visibility:

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

Journal Rank:

JCR - Q2 (Microbiology) / CiteScore - Q1 (Microbiology (medical))

Rapid Publication:

manuscripts are peer-reviewed and a first decision is provided to authors approximately 15.2 days after submission; acceptance to publication is undertaken in 2.9 days (median values for papers published in this journal in the first half of 2025).