Special Issue

Bio-Convergence: Microorganism Usage for Sustainability Applications

Message from the Guest Editor

Microorganisms are increasingly vital in promoting sustainability. As global challenges like climate change and resource depletion grow, harnessing microorganisms offers a crucial strategy. Bio-convergence merges biological engineering, such as synthetic biology, with traditional engineering disciplines. This integration allows for the creation of sustainable products and processes by combining biological innovation with classical engineering practices. This Special Issue explores how industries optimize production methods, enhance resource efficiency, and minimize environmental impacts through bio-convergence. For example, engineered microbial strains can produce biofuels, pharmaceuticals, or biodegradable materials. Bio-convergence offers a holistic approach to problem-solving, applying biological insights to engineering challenges, advancing biotechnology, and promoting sustainability across various sectors. I invite you to submit research articles, review articles, and short communications addressing the challenges of bio-convergence. I look forward to your contributions.

Guest Editor

Dr. Yuval Dorfan
Holon Institute of Technology, Holon 810201, Israel

Deadline for manuscript submissions

31 July 2025

Microorganisms

an Open Access Journal by MDPI

Impact Factor 4.2
CiteScore 7.7
Indexed in PubMed

mdpi.com/si/214888

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

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

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).

MDPI