

Special Issue

Host–Microbiome–Environment Interactions in Domestic and Wild Animals

Message from the Guest Editors

This Special Issue invites original research and reviews exploring how microbiomes influence animal health, productivity, and conservation across species and ecosystems. We welcome studies on microbial communities in diverse anatomical sites (gut, skin, milk, reproductive tract, etc.) and their interactions with environmental microbiomes (soil, water, housing systems, and habitats). **Key topics include:**

- **Host-microbiota-environment interactions** in domestic and wild animals
- Microbiota and **animal immunity, nutrition, reproduction, and resilience**
- **Environmental microbiomes** shaping host-associated communities
- **Wildlife microbiomes** as indicators of ecosystem health and conservation tools
- **Multi-omics and systems approaches** to enhance microbiome research

This Issue bridges fragmented fields by integrating **cross-species, cross-ecosystem, and cross-disciplinary** perspectives, aligning with **One Health** and global ecological priorities. Submit your work to help advance microbiome-based strategies for **animal well-being, sustainable production, and biodiversity conservation**.

Guest Editors

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Deadline for manuscript submissions

31 August 2026



Biology

an Open Access Journal
by MDPI

Impact Factor 3.5
CiteScore 7.4
Indexed in PubMed



mdpi.com/si/247683

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About the Journal

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.

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