Special Issue

Physiopathology and Therapeutics of HIV Infection

Message from the Guest Editor

HIV primarily targets the immune system, specifically CD4+ T cells, leading to their gradual depletion. This weakens the body's ability to fight infections and diseases, progressing to AIDS if untreated. The physiopathology of HIV infection begins with viral entry into CD4+ cells, followed by integration of its genetic material into the host's DNA. The therapeutics for HIV focus on controlling viral replication through antiretroviral therapy (ART). However, HIV resistance to ART remains a significant challenge in the management of the virus. To combat this, new strategies are being developed. These include long-acting injectable therapies, which improve adherence by reducing the need for daily pills, and the use of broadly neutralizing antibodies (bNAbs) that target multiple strains of HIV, limiting its ability to mutate. Additionally, gene-editing technologies, like CRISPR, are being explored to potentially eradicate latent HIV reservoirs in the body. Combining these innovative approaches with existing ART could improve treatment outcomes and reduce the global impact of drug-resistant HIV.

Guest Editor

Dr. Inês Bártolo

Instituto de Investigação do Medicamento (iMed.ULisboa), Faculty of Pharmacy, Lisbon University, 1649-019 Lisbon, Portugal

Deadline for manuscript submissions

31 July 2026

International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9
CiteScore 9.0
Indexed in PubMed

mdpi.com/si/220528

International Journal of Molecular Sciences
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
ijms@mdpi.com

mdpi.com/journal/ijms

MDPI

International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9
CiteScore 9.0
Indexed in PubMed

mdpi.com/journal/ijms

MDPI

About the Journal

Message from the Editor-in-Chief

The *International Journal of Molecular Sciences* (*IJMS*) is an open access journal, which was established in 2000. The journal aims to provide a forum for scholarly research on a range of topics, including biochemistry, molecular and cell biology, and molecular biophysics. *IJMS* publishes both original research and review articles, and regularly publishes special issues to highlight advances at the cutting edge of research. We invite you to read recent articles published in *IJMS* and consider publishing your next paper with us.

Editor-in-Chief

Prof. Dr. José L. Quiles
Department of Physiology, Institute of Nutrition and Food Technology "Jose Mataix", Biomedical Research Center, University of Granada, Avda. Conocimiento s/n, 18100 Armilla, Granada, Spain

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, MEDLINE, Embase, CAPlus / SciFinder, and other databases.

Journal Rank:

JCR - Q1 (Biochemistry and Molecular Biology) / CiteScore - Q1 (Organic Chemistry)