Special Issue

Non-Coding RNA in Physiology and Pathophysiology: Second Edition

Message from the Guest Editor

Non-coding RNAs (ncRNAs) are a class of non-proteincoding transcripts widely expressed in mammalian cells with a tissue- and cell-specific distribution pattern. NcRNA mainly includes microRNA (miRNA), long noncoding RNA (IncRNA), and circular RNA (circRNA). The dysregulation of ncRNAs has been implicated in a wide variety of pathological conditions, including pain. senescence and degenerative disease such as cardiometabolic disease, cancer, and neurodegenerative disorders. The functions of ncRNAs in pathogenesis are unique for each disorder, as are the pertinent networks of ncRNA/miRNA/mRNA that mediate these functions. This Special Issue aims to collect novel findings on molecular mechanisms related to ncRNA function in physiological and pathological conditions. Bioinformatics studies that explore how data analysis and computational technologies can reveal new targets for the implementation of innovative therapeutic strategies are also encouraged. Original research articles, up-to-date reviews, and commentaries are all welcome.

Guest Editor

Dr. Maria Rosaria Tumolo

- 1. Department of Biological & Environmental Sciences & Technology, University of Salento, 73100 Lecce, Italy
- 2. National Research Council, Institute of Clinical Physiology, Lecce, Italy

Deadline for manuscript submissions

20 February 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/218524

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





International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9 CiteScore 9.0 Indexed in PubMed





Message from the Editor-in-Chief

The International Journal of Molecular Sciences (*IJMS*, ISSN 1422-0067) 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, molecular biophysics, molecular medicine, and all aspects of molecular research in chemistry. *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. Maurizio Battino

Department of Odontostomatologic and Specialized Clinical Sciences, Sez-Biochimica, Faculty of Medicine, Università Politecnica delle Marche, Via Ranieri 65, 60100 Ancona, Italy

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)

