Special Issue

Genome Structure, Function and Dynamic Regulation of Cell Fate

Message from the Guest Editors

The cell nucleus is a sophisticated system, housing chromatin organized into territories and domains. It allows for simultaneous reactions and functions, essential for cellular specialization. Within the nucleus, biomolecules like RNA, proteins, and enzymes float freely, actively or passively transported to precise interaction points. This interplay of genome organization, structure, and dynamics is a breakthrough in research. Recent advancements have illuminated how genetic information is encoded and regulated, while epigenetic pathways impact chromatin organization. This Special Issue seeks cutting-edge research on chromatin remodeling, epigenetic regulation, DNA damage response, and transcriptional control, and their impact on cell fate. Contributions from global researchers are invited.

Guest Editors

Prof. Dr. Georg Hildenbrand

Faculty of Engineering, University of Applied Science Aschaffenburg, Wuerzburger Str. 45, 63743 Aschaffenburg, Germany

Prof. Dr. Michael Hausmann

Experimental Biophysics, Kirchhoff-Institute for Physics, University of Heidelberg, Im Neuenheimer Feld 227, 69120 Heidelberg, Germany

Deadline for manuscript submissions

20 May 2025



International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9 CiteScore 8.1 Indexed in PubMed



mdpi.com/si/203638

International Journal of Molecular Sciences 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 8.1 Indexed in PubMed





About the Journal

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 (Inorganic Chemistry)