Special Issue

Advances in Homeostasis and Metabolism in Health and Disease

Message from the Guest Editor

Homeostasis, the delicate balance that ensures an organism's survival by regulating fundamental needs such as food, water, and warmth, profoundly influences behavior and physiology. An intricate network of complex and redundant circuits, both central and peripheral, orchestrates a complex "dance" to meet these survival instincts. Disruptions to those circuits can result in various disorders, affecting the proper functioning of cells, tissues, and organs. Our understanding of the neuronal, metabolic and cellular mechanisms orchestrating homeostasis is far from complete. Obtaining this knowledge will serve as the foundational step to preventing or treating health conditions arising from imbalances in these intricate systems (e.g., obesity). In this Special Issue of the International Journal of Molecular Sciences, we eagerly invite researchers to submit both original research articles and review papers dedicated to advancing our understanding of the molecular underpinnings of homeostasis in health and unraveling how their disruption contributes to the onset of metabolic diseases.

Guest Editor

Dr. Marc Schneeberger

Department of Cellular and Molecular Physiology, Wu Tsai Institute for Mind and Brain, Yale Center for Molecular and Systems Metabolism, Yale University School of Medicine, New Haven, CT 06520, USA

Deadline for manuscript submissions

closed (20 February 2025)



International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9 CiteScore 9.0 Indexed in PubMed



mdpi.com/si/194042

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)

