Special Issue

Transition Metal lons in Biology

Message from the Guest Editor

Transition metal ions are fundamental for life as we know it. They are present in all essential biological processes and pathways, such as nitrogen fixation, photosynthesis, cellular respiration, cell proliferation, stress response, biomineralization, among others. While iron is the most abundant of these elements. manganese, zinc, copper, molybdenum, cobalt, chromium, vanadium, nickel and tungsten also play a substantial role in biological systems. The successful use of transition metal ions is certainly due to the fundamental ability to exist in different oxidation states and in a multitude of coordination structures with three of the five most abundant elements in life (oxygen. nitrogen and sulfur). With the application of up-to-date methodologies to study biological and biochemical systems, new and sophisticated roles of metal ions in living systems can be revealed in articles in this Special Issue that aims to highlight some of the recent advances. We would like to invite experts in the field to contribute both original research papers, as well as review articles, covering basic aspects and future directions in the field

Guest Editor

Dr. Pedro Tavares

1. UCIBIO-Applied Molecular Biosciences Unit, Department of Chemistry, NOVA School of Science and Technology, Universidade NOVA de Lisboa, 2829-516 Caparica, Portugal

 Associate Laboratory i4HB, Institute for Health and Bioeconomy, NOVA School of Science and Technology, Universidade NOVA de Lisboa, 2829-516 Caparica, Portugal

Deadline for manuscript submissions

closed (31 December 2023)



International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9 CiteScore 8.1 Indexed in PubMed



mdpi.com/si/133154

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





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)

