Special Issue

Calmodulin Function in Health and Disease 2.0

Message from the Guest Editors

Calmodulin (CaM) transduces the Ca2+ signal in all eukaryotic cells, regulating hundreds of proteins, including enzymes, ion channels, transcription factors, receptors, adaptors and structural proteins. The multifunctional role of CaM is facilitated by differential occupancy of its four Ca2+-binding sites and its enormous structural flexibility, allowing linkage between distinct or identical proteins and/or two segments of the same protein forming dimeric complexes or operational motifs with specific functional roles. Post-translational modifications of CaM, particularly its phosphorylation, allows further modulation of its multiple regulatory roles. The discovery of CaM mutations in humans has uncovered its critical role in cardiac physiology and enabled new insights into the cause of different types of cardiac arrhythmias. Similar genetic alterations could be the cause of yet uncovered pathologies. The study of CaM functionality in health and its dysfunction in disorders, including cancer, could help to identify new potential pharmacological targets to combat diseases.

Guest Editors

Prof. Dr. Antonio Villalobo
Instituto de Investigaciones Sanitarias (IdiPAZ), Hospital Universitario La Paz, Madrid, Spain

Prof. Dr. Martin W. Berchtold
Department of Biology, University of Copenhagen, Copenhagen, Denmark

Deadline for manuscript submissions

closed (31 December 2020)

International Journal of Molecular Sciences

an Open Access Journal by MDPI

Impact Factor 4.9
CiteScore 9.0
Indexed in PubMed

mdpi.com/si/44941

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*, 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)