

Special Issue

Molecular Insights and Therapeutic Advances in Cerebral and Spinal Tumors

Message from the Guest Editor

Cerebral and spinal tumors represent a complex group of central nervous system (CNS) malignancies with highly heterogeneous molecular profiles and clinical behavior. Despite advances in surgical techniques, radiation therapy, and chemotherapy, outcomes for many patients remain suboptimal due to challenges in diagnosis, therapeutic resistance, and tumor recurrence. This Special Issue aims to highlight recent progress in understanding the molecular and cellular mechanisms underlying CNS tumorigenesis, progression, and response to treatment. We invite original research articles and comprehensive reviews focusing on novel biomarkers, cutting-edge diagnostic methods, genetic and epigenetic alterations, immune modulation, and innovative therapeutic strategies, including targeted therapy, nanotechnology-based delivery, and personalized medicine approaches. By bringing together multidisciplinary insights, we aim to foster a deeper understanding that could lead to improved prognostic tools and more effective treatment paradigms for both cerebral and spinal neoplasms.

Guest Editor

Prof. Dr. Alexandru Vladimir Ciurea

1. Department of Neurosurgery, "Carol Davila" University of Medicine and Pharmacy, 020021 Bucharest, Romania
2. Neurosurgery Department, Sanador Clinical Hospital, 010991 Bucharest, Romania
3. Medical Section, Romanian Academy, 010071 Bucharest, Romania

Deadline for manuscript submissions

closed (31 January 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/244715

*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](https://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



[mdpi.com/journal/
ijms](https://mdpi.com/journal/ijms)



About the Journal

Message from the Editor-in-Chief

The *International Journal of Molecular Sciences (IJMS)* 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, and molecular biophysics. *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. José L. Quiles
Department of Physiology, Institute of Nutrition and Food Technology
"Jose Mataix", Biomedical Research Center, University of Granada,
Avda. Conocimiento s/n, 18100 Armilla, Granada, Spain

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, CAPus / SciFinder, and other databases.

Journal Rank:

JCR - Q1 (Biochemistry and Molecular Biology) / CiteScore - Q1 (Organic Chemistry)