

## Topical Collection

# State-of-the-Art Macromolecules in Russia

### Message from the Collection Editors

At present, polymer chemistry is progressing rapidly to address the challenges of the twenty-first century. New catalytic solutions for petrochemical industry, advanced biodegradable materials for household and biomedical applications, recycling and up-cycling of polymer wastes, polymers from renewable raw materials, macromolecular photonics, power source membranes and electrolytes—this is not a complete list of current areas of research. This Topical Collection focuses on creating a multidisciplinary forum of discussion on recent advances in polymer chemistry in the Russian Federation. All topics related to the design, synthesis, characterization, post-modification of macromolecules, new macromolecular structures, mechanisms explaining the formation of macromolecular architectures, polymerization kinetics and thermodynamics, and application of synthetic and biological macromolecules are covered, including biomacromolecules (proteins, nucleic acids, polysaccharides, lipids, etc.), sustainable macromolecules, degradable polymers, and conjugated polymers. Computational studies offering new insights into an understanding of experimental results will also be appreciated.

### Collection Editors

Prof. Dr. Ilya Nifant'ev

Chemistry Department, M.V. Lomonosov Moscow State University, 1–3 Leninskie Gory, 119991 Moscow, Russia

Prof. Dr. Oxana V. Galzitskaya

1. Institute of Protein Research, Russian Academy of Sciences, 142290 Pushchino, Russia
2. Institute of Theoretical and Experimental Biophysics, Russian Academy of Sciences, 142290 Pushchino, Russia



## International Journal of Molecular Sciences

---

an Open Access Journal  
by MDPI

---

Impact Factor 4.9  
CiteScore 9.0  
Indexed in PubMed



[mdpi.com/si/117557](https://mdpi.com/si/117557)

*International Journal of  
Molecular Sciences*  
Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland  
Tel: +41 61 683 77 34  
[ijms@mdpi.com](mailto: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*, 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)