



## Molecular Advances in Dental Pulp Tissue Engineering

Guest Editors:

**Prof. Dr. Matthias Widbiller**

Department of Conservative  
Dentistry and Periodontology,  
University Hospital Regensburg,  
Franz-Josef-Strauß-Allee 11, D-  
93093 Regensburg, Germany

**Prof. Dr. Kerstin M. Galler**

Department of Operative  
Dentistry and Periodontology,  
Friedrich-Alexander-University  
Erlangen-Nuernberg, D-91054  
Erlangen, Germany

Deadline for manuscript  
submissions:

**closed (31 January 2023)**

### Message from the Guest Editors

In recent years, creative and multi-faceted attempts have been made to regenerate this valuable tissue using advanced molecular biology methods. Promising approaches based on tissue engineering and regenerative medicine (TERM) have been developed for this purpose. These stem-cell-based or primarily cell-free procedures use specifically customized scaffold materials and biologically active molecules to achieve true regeneration of the dental pulp in terms of both its architecture and function. Several of these approaches are already taking requirements for clinical application into consideration.

This Special Issue aims to present the scientific progress in this field of research. The goal is to collect innovative studies in the field of stem cell biology, scaffold material development or molecular signaling that contribute to the transfer of this knowledge from the bench to the dental clinic.





an Open Access Journal by MDPI

## 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

## 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.

## 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)

## Contact Us

---

*International Journal of Molecular  
Sciences* Editorial Office  
MDPI, St. Alban-Anlage 66  
4052 Basel, Switzerland

Tel: +41 61 683 77 34  
www.mdpi.com

mdpi.com/journal/ijms  
ijms@mdpi.com  
X@IJMS\_MDPI