



## Advanced Biomaterials and Biotechnology: Applications in Dental Medicine

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Deadline for manuscript submissions:

**closed (20 February 2024)**

### Message from the Guest Editors

Dental biomaterials play an important role in the reconstruction of damaged oral hard and soft tissues, encompassing the fields of periodontology, endodontics, oral surgery, and ultimately attempting the replacement of the whole tooth organ. Biomaterials have evolved from simply replacing the damaged tissue, to allowing the 3D development of a structurally complex regenerated tissue. The development of biotechnologies applications in dentistry has achieved its goal regarding the implementation of biomaterials in order to replace oral tissue, including various novel approaches such as biomimetics and nano-biotechnology.

The aim of this Special Issue is to provide an updated outlook on the applications of advanced biomaterials and biotechnologies in dentistry. Research articles, reviews, and communications are invited for this Special Issue. Potential topics include, but are not limited to:

Advanced biomaterials for dental applications;  
Biotechnology applications in dental medicine;  
Role of scaffolds in dental tissue regeneration;  
Polymers applications in regenerative medicine;  
Current applications of 3D bioprinting in dentistry;  
Future perspectives of 4D bioprinting in dentistry.





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## Editor-in-Chief

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## Message from the Editor-in-Chief

The biomaterials field is one of the largest and fastest growing research areas both in the scientific community and in the industrial one. Biomaterials are the result of collaborations between different disciplines: chemistry, medicine, pharmacology, engineering and biology. The objective of this collaboration is to lead to the implementation of new devices to restore form and human body functions. The mission of the *Journal of Functional Biomaterials (JFB)* is to focus attention on physico-chemical characteristics and their importance in the interactions between biomaterials and living tissues. *JFB* seeks to publish studies on the preparation, performance and use of biomaterials in biomedical devices, as well as regarding their behavior in physiological environments. We are pleased to welcome you as our authors.

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