

## Special Issue

# Bioactive 3D Scaffolds: Design, Materials and Processes

### Message from the Guest Editors

Advances in tissue engineering rely on the development of bioactive scaffolds endowed with mechanical and biochemical cues able to drive tissue regeneration. In turn, these aspects are closely linked to the development of novel biomaterials providing cells with tissue-specific signals, along with the optimization of complex scaffold architectures mimicking the native tissue biomechanics and facilitating tissue ingrowth. Recent years have witnessed advances in instructive biomaterials, as well as the establishment of new manufacturing processes (including additive manufacturing). Additionally, the access to nanotechnologies has allowed researchers to design biomaterials at the supramolecular level. This Special Issue will provide readers with an overview of bioactive scaffold design and manufacturing, with a special focus on biomaterial-related aspects. Contributions will be selected at the convergence of materials science, nanotechnology, biology, and bioengineering, based on their ability to envisage the future of the field.

### Guest Editors

Prof. Dr. Alberto Rainer

Faculty of Engineering, Università Campus Bio-Medico di Roma, 00128 Rome, Italy

Dr. Filippo Rossi

Dipartimento di Chimica, Materiali e Ingegneria Chimica "Giulio Natta", Politecnico di Milano, Piazza Leonardo da Vinci 32, 20133 Milano, Italy

### Deadline for manuscript submissions

closed (31 March 2021)



## Journal of Functional Biomaterials

an Open Access Journal  
by MDPI

Impact Factor 5.2  
CiteScore 6.8  
Indexed in PubMed



[mdpi.com/si/46194](https://mdpi.com/si/46194)

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

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

[jfb](#)





# Journal of Functional Biomaterials

---

an Open Access Journal  
by MDPI

---

Impact Factor 5.2  
CiteScore 6.8  
Indexed in PubMed



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

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



## About the Journal

### 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.

---

### Editor-in-Chief

Prof. Dr. Pankaj Vadgama

School of Engineering and Materials Science, Queen Mary University of London, London, UK

---

### 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, Embase, Ei Compendex, Inspec, CAPIus / SciFinder, and other databases.

#### Journal Rank:

JCR - Q1 (Engineering, Biomedical) / CiteScore - Q2 (Biomedical Engineering)