



*materials*



an Open Access Journal by MDPI

## Preparation and Properties of Metals and Alloys for Biomedical Applications

Guest Editor:

**Prof. Dr. Jarosław Jakubowicz**

Institute of Materials Science and Engineering, Poznan University of Technology, Poznan, Poland

Deadline for manuscript  
submissions:

**closed (20 December 2024)**

### Message from the Guest Editor

Metal-based biomaterials are the most widely used among other groups of biomaterials. These include titanium and its alloys, cobalt alloys, and austenitic steels. Great interest in this group of materials results from their very good mechanical, physicochemical, and biological properties. There is also a great potential to modify the chemical composition, structure, and properties, as well as the potential to modify the surface of products made of them. Susceptibility to the many processes of surface treatment, such as, for example, anodic oxidation, PVD, CVD, thermal spraying, and so on, makes them as materials with unlimited biomedical possibilities. Particular attention should be paid to their use in orthopaedic, cardiology, and stomatology. This topic is dedicated to new and old type metallic biomaterials made by new and conventional techniques but with new and extraordinary properties.

It is my pleasure to invite you to submit a manuscript to this Special Issue that is related to the above topic. Full papers, communications, and reviews are all welcomed.



[mdpi.com/si/147014](https://mdpi.com/si/147014)

# Special Issue



an Open Access Journal by MDPI

## Editor-in-Chief

### Prof. Dr. Maryam Tabrizian

1. Department of Biomedical Engineering, Faculty of Medicine and Health Sciences, McGill University, Montreal, QC H3A 2B6, Canada

2. Faculty of Dentistry and Oral Health Sciences, McGill University, 3640 Rue University, Montreal, QC H3A 0C7, Canada

## Message from the Editor-in-Chief

*Materials* (ISSN 1996-1944) was launched in 2008. The journal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites, advanced materials characterization, porous materials, manufacturing processes and systems, advanced nanomaterials and nanotechnology, smart materials, thin films and interfaces, catalytic materials, carbon materials, materials chemistry, materials physics, optics and photonics, corrosion, construction and building materials, materials simulation and design, electronic materials, advanced and functional ceramics and glasses, metals and alloys, soft matter, polymeric materials, quantum materials, mechanics of materials, green materials, general. *Materials* provides a unique opportunity to contribute high quality articles and to take advantage of its large readership.

## 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, Ei Compendex, CaPlus / SciFinder, Inspec, Astrophysics Data System, and other databases.

**Journal Rank:** JCR - Q2 (Metallurgy and Metallurgical Engineering) / CiteScore - Q1 (Condensed Matter Physics)

## Contact Us

Materials Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland

Tel: +41 61 683 77 34  
[www.mdpi.com](http://www.mdpi.com)

[mdpi.com/journal/materials](http://mdpi.com/journal/materials)  
[materials@mdpi.com](mailto:materials@mdpi.com)  
[X@Materials\\_Mdpi](https://twitter.com/Materials_Mdpi)