



Processing, Characterization and Testing of Alloys and Metal Matrix Composites for Biomedical Applications

Guest Editor:

Prof. Iulian Antoniac

Faculty of Materials Science and
Engineering, University
Politehnica of Bucharest,
Bucharest, Romania

Deadline for manuscript
submissions:

closed (28 February 2021)

Message from the Guest Editor

Metals and their alloys have been used for biomedical applications for many years. Metallic biomaterials must meet biocompatibility requirements as well as mechanical properties and corrosion resistance. All these properties are significantly influenced by the processing technology and their resulting characteristics. Therefore, experimental studies on the relationships between processing technology, microstructure, and implant properties are essential.

Biodegradable metallic materials have played an important role in biomedical applications. The use of degradable metal matrix composite materials is an excellent alternative to solve the problems related to the faster degradation of biodegradable metals. Biodegradable metals can be successfully combined with other materials to form biodegradable metallic matrix composites for biomedical applications.

The aim of this Special Issue is to present the latest achievements in the processing technology, structure development and characterization, surface modification, and properties of various alloys and metal matrix composites for biomedical applications.





an Open Access Journal by MDPI

Editors-in-Chief

Prof. Dr. Hugo F. Lopez

Department of Materials Science
and Engineering, College of
Engineering & Applied Science,
University of Wisconsin-
Milwaukee, 3200 N. Cramer
Street, Milwaukee, WI 53211, USA

Prof. Dr. Yong Zhang

Beijing Advanced Innovation
Center of Materials Genome
Engineering, State Key
Laboratory for Advanced Metals
and Materials, University of
Science and Technology Beijing,
30 Xueyuan Road, Beijing 100083,
China

Message from the Editorial Board

Metallic materials play a vital role in the economic life of modern societies; contributions are sought on fresh developments that enhance our understanding of the fundamental aspects related to the relationships between processing, properties and microstructure – disciplines in the metallurgical field ranging from processing, mechanical behavior, phase transitions and microstructural evolution, nanostructures, as well as unique metallic properties – inspire general and scholarly interest among the scientific community.

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), Inspec, Ei Compendex, CAPus / SciFinder, and other databases.

Journal Rank: JCR - Q2 (Metallurgy and Metallurgical Engineering) / CiteScore - Q1 (Metals and Alloys)

Contact Us

Metals Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

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

mdpi.com/journal/metals
metals@mdpi.com
[X@Metals_MDPI](https://twitter.com/X@Metals_MDPI)