





an Open Access Journal by MDPI

# Molecular and Cellular Mechanisms of Bone and Cartilage Diseases

Guest Editor:

#### Dr. M. Alaa Terkawi

Department of Orthopaedic Surgery, Faculty of Medicine and Graduate School of Medicine, Hokkaido University, Sapporo, Japan

Deadline for manuscript submissions:

closed (31 December 2022)

## **Message from the Guest Editor**

Bones and cartilage form the most important parts of the musculoskeletal system. Musculoskeletal disorders, namely, those affecting bone and cartilage, limit the mobility and productivity of individuals, leading to early retirement from work and a reduced ability of people to participate in society. Osteoarthritis, rheumatoid arthritis, osteoporosis, and low back pain are the major musculoskeletal disorders and represent a significant socioeconomic burden on individuals and medical services worldwide. A better understanding of the pathophysiology of bone and cartilage in these diseases should provide important clues for the discovery of new therapies. The current Special Issue focuses on molecular and cellular mechanisms underlining bone and cartilage pathology and novel therapeutic approaches targeting the above diseases. We welcome research or review articles focusing on the following topics:

- 1. Molecular and cellular mechanisms underlining bone and cartilage pathology in related diseases;
- 2. Bone and cartilage metabolism in health and disease;
- 3. Therapeutic strategies for prevention of bone and cartilage pathology;
- 4. Novel approaches for bone and cartilage regeneration.













an Open Access Journal by MDPI

## **Editor-in-Chief**

### Prof. Dr. Felipe Fregni

1. Neuromodulation Center and Center for Clinical Research Learning, Spaulding Rehabilitation Hospital and Massachusetts General Hospital, Harvard Medical School, Boston, MA 02114, USA 2. Department of Epidemiology, Harvard T.H. Chan School of Public Health, Boston, MA 02115, USA

# **Message from the Editor-in-Chief**

Biomedicines (ISSN 2227-9059) is an open access journal devoted to all aspects of research on human health and disease, the discovery and characterization of new therapeutic targets, therapeutic strategies, and research of naturally driven biomedicines, pharmaceuticals, and biopharmaceutical products. Topics include pathogenesis mechanisms of diseases, translational medical research. biomaterial in biomedical research, natural bioactive molecules, biologics, vaccines, gene therapies, cell-based therapies, targeted specific antibodies, recombinant therapeutic proteins, nanobiotechnology driven products, targeted therapy, bioimaging, biosensors, biomarkers, and biosimilars. The journal is open for publication of studies conducted at the basic science and preclinical research levels. We invite you to consider submitting your work to Biomedicines, be it original research, review articles, or developing Special Issues of current key topics.

### **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, CAPlus / SciFinder, and other databases.

**Journal Rank:** JCR - Q1 (Pharmacology and Pharmacy) / CiteScore - Q1 (Medicine (miscellaneous))

#### **Contact Us**