



an Open Access Journal by MDPI

# Single Crystal Growth and Crystal Structure Analysis

Guest Editors:

### Prof. Dr. Sławomir Kaczmarek

Department of Technical Physics, Faculty of Mechanical Engineering and Mechatronics, West Pomeranian University of Technology, Al. Piastów 17, 70-310 Szczecin, Poland

### Prof. Dr. Tomasz Bodziony

Department of Physics, Faculty of Mechanical Engineering and Mechatronics, West Pomeranian University of Technology, Al. Piastów 17, 70-310 Szczecin, Poland

Deadline for manuscript submissions: closed (20 June 2023)

# Message from the Guest Editors

New knowledge on the subject of creating crystals, e.g., through the Czochralski process or Bridgman–Stockbarger technique, is necessary. While we have a broad understanding of the structure of crystals, not only due to traditional XRD research, neutron or electron scattering, or cutting-edge techniques, but also through magnetic and optical investigations, such as SQUID, EPR, NMR, and advanced spectroscopy, we need new methods to determine crystal structures globally and locally, e.g., around the dopant ion. It would therefore be advisable to examine new crystals, or known ones but in new configurations, for example, doped with other rare-earth or transition metal elements. Some of the topics of interest include crystals and powders, nanopowders, stoichiometries, pure and doped crystals, defects and impurities, dopant ions and ion pairs, clusters, and color centers in crystals, and their properties and applications.



mdpi.com/si/142941







an Open Access Journal by MDPI

# **Editor-in-Chief**

#### Prof. Dr. Maryam Tabrizian

 Department of Biomedical Engineering, Faculty of Medicine and Health Sciences, McGill University, Montreal, QC H3A 2B6, Canada
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 iournal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites. advanced materials characterization, porous materials, manufacturing processes and svstems. 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 & Metallurgical Engineering*) / CiteScore - Q2 (*Condensed Matter Physics*)

# **Contact Us**

*Materials* Editorial Office MDPI, St. Alban-Anlage 66 4052 Basel, Switzerland Tel: +41 61 683 77 34 www.mdpi.com mdpi.com/journal/materials materials@mdpi.com X@Materials\_Mdpi