

## Special Issue

# Smart Manufacturing: Materials and Technologies for Advanced Equipment

### Message from the Guest Editor

In order to explore new progress in the field of high-end equipment and smart manufacturing, this Special Issue is being launched and will mainly focus on four topics: IC equipment and intelligent manufacturing, aerospace and aeronautics equipment and intelligent manufacturing, robot and intelligent manufacturing, and marine equipment and intelligent manufacturing. This SI will also receive support from the "2023 International Forum on High-end Equipment and Intelligent Manufacturing". This forum is organized by Hangzhou Dianzi University and will be held in Hangzhou, China, from 14 to 16 July 2023.

This SI will select suitable papers that demonstrate new achievements and progress in high-performance manufacturing technology research for key components, basic components, and core components of high-end equipment in the fields of integrated circuits, aviation, ocean, and new materials. This SI mainly focuses on the design and manufacture of machining tools, manufacturing theory and technology of aviation and nuclear power materials, multiphysics machining modeling, high surface integrity control, performance transferring rules and modeling methods, intelligent manufacturing, etc.

---

### Guest Editor

Prof. Dr. Jing Ni

School of mechanical engineering, Hangzhou Dianzi University,  
Hangzhou 310018, China

---

### Deadline for manuscript submissions

closed (20 May 2025)



## Materials

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.2  
CiteScore 6.4  
Indexed in PubMed



[mdpi.com/si/169221](https://mdpi.com/si/169221)

*Materials*  
Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland  
Tel: +41 61 683 77 34  
[materials@mdpi.com](mailto:materials@mdpi.com)

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





# Materials

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.2  
CiteScore 6.4  
Indexed in PubMed



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



## About the Journal

### Message from the Editorial Board

*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.

---

### Editors-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

Prof. Dr. Yuguang Ma

State Key Laboratory of Luminescent Materials and Devices, South China University of Technology, Guangzhou 510640, China

---

### 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)