

Special Issue

Physics, Electrical and Structural Properties of Dielectric Layers

Message from the Guest Editor

Dielectric materials have a very wide application range in a different kind of sensors and detectors, data storage devices, electro-optic devices, transducers, energy harvesters, etc. In the studies of dielectric materials, of particular interest are issues such as the physics of charged dielectric materials, conduction mechanisms, dielectric polarization and dielectric relaxation mechanisms, space charge, nonlinear effects, and electric aging. Recent advances in deposition and processing of dielectric layers allow for superior control and tailoring of their properties to meet the requirements of a certain application. On the other hand, precise characterization techniques make possible the elucidation of the mechanisms that control these properties on a micro- and nanoscale in close relation to the technology of dielectric layer. In this Special Issue, recent progress in dielectric layers, their technology, and advanced characterization are addressed. Emerging applications specific to dielectric material are also of particular interest. It is my pleasure to invite you to submit a manuscript for this Special Issue. Full papers, communications, and reviews are all welcome.

Guest Editor

Prof. Dr. Albena Paskaleva

Institute of Solid State Physics, Bulgarian Academy of Sciences,
Tzarigradsko Chaussee 72, 1784 Sofia, Bulgaria

Deadline for manuscript submissions

closed (10 April 2023)



Materials

an Open Access Journal
by MDPI

Impact Factor 3.1
CiteScore 5.8
Indexed in PubMed



mdpi.com/si/40475

Materials

MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
materials@mdpi.com

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





Materials

an Open Access Journal
by MDPI

Impact Factor 3.1
CiteScore 5.8
Indexed in PubMed



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



About the Journal

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.

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

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 - Q1 (Metallurgy and Metallurgical Engineering) /
CiteScore - Q2 (Condensed Matter Physics)