Special Issue

Advances and Evolutions in Optical Data Storage

Message from the Guest Editor

The Special Issue provides an overview of the latest research and development in optical data storage (ODS), as well as new research and application areas of ODS technologies. The research and development into ODS has encountered a drastic change. A rapid increase in data density, capacity, and the data transfer rate of solid state disks, hard disk drives and tape drives have made these storage options a viable player in modern data communication and storage eco-systems. In the storage eco-system, ODS is considered an extra long-term (over 50 years) cold data archive system that is "green" due to its smaller total cost and energy consumption compared to the alternatives. While seeking to further develop ODS within the storage ecosystem, the ODS research and development community, both in academia and industry, is actively seeking application areas for the ODS technology that has accumulated over the past three decades. The Special Issue provides a perspective on current ODS technologies and technical assets, as well as its horizons, including new opportunities, killer devices and systems, which will have the same market size and technical challenges in the future.

Guest Editor

Prof. Yuzuru Takashima College of Optical Sciences, University of Arizona, Tucson, AZ, USA

Deadline for manuscript submissions

closed (31 October 2020)



an Open Access Journal by MDPI

Impact Factor 3.1
CiteScore 5.8
Indexed in PubMed



mdpi.com/si/16361

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

mdpi.com/journal/ materials





an Open Access Journal by MDPI

Impact Factor 3.1
CiteScore 5.8
Indexed in PubMed





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

 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

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)