crystals

an Open Access Journal by MDPI

IMPACT FACTOR 2.4

CITESCORE 4.2

Synthesis, Characterization and Application of Novel Nanoparticles

Guest Editors:

Dr. Fedlu Kedir Sabir

Dr. Osman Ahmed Zelekew

Dr. Bedasa Abdisa Gonfa

Dr. Lemma Teshome Tufa

Dr. Noto Susanto Gultom

Dr. Andebet Gedamu Tamirat

Deadline for manuscript submissions:
30 April 2025

Message from the Guest Editors

Currently, the green synthesis of nanometals, nanometal oxides, and nanocomposites has received significant attention in the fields of environmental nanotechnology and bio-nanotechnology. As compared to chemical and physical synthesis methods, the synthesis of nanoparticles using green materials is more environmentally friendly, cost-effective and avoids use of toxic chemicals. The use of plants, bacteria, algae and fungi represents an easy and eco-friendly strategy for the green synthesis of nanometal oxides. Different types of nanometal oxides, mainly including transition metal oxides, as well as metal nanoparticles such as silver, copper, cobalt, and zinc, have been applied for various environmental applications. Thus, our aim is to attract the attention of the readers to this Special Issue aiming to cover the latest developments in the synthesis, characterization and multifunctional application of novel nanostructures. The Special Issue solicits research and review articles highlighting current research relevant to environmental, catalytic, renewable energy and biomedical applications of novel nanoparticles.

crystals

an Open Access Journal by MDPI

IMPACT FACTOR 2.4

CITESCORE 4.2

Editor-in-Chief

Prof. Dr. Alessandra Toncelli
Department of Physics, University of Pisa, 56126 Pisa, Italy

Message from the Editor-in-Chief

Welcome to *Crystals*, the journal dedicated to the fascinating world of crystallographic research! Crystals are more than mere decorative elements; they hold the key to understanding the fundamental structure of matter. Our mission is to explore the crucial significance of this research across various fields. From medicine to technology, chemistry to geology, crystals play a vital role. Their structure provides insights into new advanced materials, innovative drugs, and groundbreaking technologies. Through *Crystals*, we delve into the microscopic world to discover solutions that will shape the future. Join us on a journey through the *Crystals*, where science merges with beauty and innovation.

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), Inspec, CAPlus / SciFinder, and other databases.
Journal Rank: JCR - Q2 (*Crystallography*) / CiteScore - Q2 (*Condensed Matter Physics*)

Contact Us

Crystals Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

Tel: +41 61 683 77 34
www.mdpi.com

mdpi.com/journal/crystals
crystals@mdpi.com
𝕏@Crystals_MDPI