

Special Issue

Green Synthesis of Nanomaterials for Environmental and Biomedical Applications

Message from the Guest Editors

This Special Issue aims to collect perspectives, review articles, and original research papers on topics including, but not limited to: Green synthesis of nanomaterials using plant materials, microorganisms, bacteria, micro- and macro-algae, biopolymers, and various biowastes, in the context of a clean environment—synthesis which uses environmentally friendly materials, is cost-effective, and avoids the use of hazardous and expensive precursors as well as the production of unwanted end products; The environmental applications of green nanomaterials, including wastewater treatment, water remediation, air treatment, water and air pollutants monitoring, antimicrobial activity, and CO₂ capture and conversion; NPs with antioxidant, antibacterial, and antimicrobial characteristics, making them suitable candidates for application in different biomedical applications; The development of green nanomaterials to reduce energy consumption and raw materials as well as environmental impact during production, utilization, and release throughout the whole life cycle—therefore, life cycle impact and analysis, environmental impact, and toxicity are challenges.

Guest Editors

Prof. Dr. Luminița Andronic

Faculty of Product Design and Environment, Department of Product Design, Mechatronics and Environment, Transilvania University of Brasov, Eroilor 29, 500036 Brasov, Romania

Dr. Jagpreet Singh

1. Department of Chemical Engineering, Chandigarh University, Gharuan, Mohali 140413, India
2. University Centre for Research and Development, Chandigarh University, Gharuan, Mohali 140413, India

Deadline for manuscript submissions

closed (17 July 2023)



Nanomaterials

an Open Access Journal
by MDPI

Impact Factor 4.3
CiteScore 9.2
Indexed in PubMed



mdpi.com/si/112629

Nanomaterials
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
nanomaterials@mdpi.com

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





Nanomaterials

an Open Access Journal
by MDPI

Impact Factor 4.3
CiteScore 9.2
Indexed in PubMed



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



About the Journal

Message from the Editor-in-Chief

Nanoscience and nanotechnology are exciting fields of research and development, with wide applications to electronic, optical, and magnetic devices, biology, medicine, energy, and defense. At the heart of these fields are the synthesis, characterization, modeling, and applications of new materials with lower nanometer-scale dimensions, which we call “nanomaterials”. These materials can exhibit unusual mesoscopic properties and include nanoparticles, coatings and thin films, metal–organic frameworks, membranes, nano–alloys, quantum dots, self-assemblies, 2D materials such as graphene, and nanotubes. Our journal, *Nanomaterials*, has the goal of publishing the highest quality papers on all aspects of nanomaterial science to an interdisciplinary scientific audience. All of our articles are published with rigorous refereeing and open access.

Editor-in-Chief

Prof. Dr. Eugenia Valsami-Jones

School of Geography, Earth and Environmental Science, University of
Birmingham, Birmingham B15 2TT, UK

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, CAPIus / SciFinder, Inspec, and other databases.

Journal Rank:

JCR - Q2 (Physics, Applied) / CiteScore - Q1 (General
Chemical Engineering)