

Special Issue

Nanomaterials for Potential Uses in Extraterrestrial Environments

Message from the Guest Editors

Many fields of science are utilizing nanomaterials to face new technological problems or to obtain materials with new properties. Nevertheless, the most difficult challenges have yet to be faced: the development of materials for ordinary use in extraterrestrial environments. This arising need is due to the increase in the field of space exploration and activity. Indeed, all the main space agencies are working on very intriguing projects with colonisation of the Moon and Mars as final goals. In this landscape, this Special Issue aims to collect research articles as well as communications and reviews regarding the synthesis and/or applications of nanomaterials that can be potentially used in extraterrestrial environments such as in low-orbit stations or stable structures on the Moon and/or Mars. In particular, articles regarding nanomaterials suitable for functional (i.e., sensing, energy, catalysis, etc.) and/or structural (i.e., shielding spacecraft, crew, or electronic devices) applications in outer space conditions are welcome.

Guest Editors

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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

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