Special Issue

Characterization of Nanomaterials for Electrocatalytic Production of Hydrogen

Message from the Guest Editor

Nanomaterials possess unique properties such as a large surface area, tunable electronic properties, and high reactivity that make them the ideal catalysts for the electrocatalytic production of hydrogen. The characterization of these materials is of utmost importance in comprehending their electrocatalytic mechanism, and in turn, guiding advanced electrocatalyst design with tailored functionality and superior performance. The current Special Issue on Nanomaterials aims to present state-of-the-art characterization techniques for investigating the atomic and electronic structure of nanomaterials, as well as in situ/operando characterization techniques for tracking the structural evolution processes of the materials under operating conditions. We welcome original research and review articles that highlight the latest advancements in this field. See more information at https://www.mdpi.com/si/173600

Guest Editor

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Deadline for manuscript submissions

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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 nanometerscale 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.

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