







an Open Access Journal by MDPI

# Nanomaterials for Electrocatalytic Applications in Energy and Sensing

Guest Editor:

#### Dr. Paolo Bertoncello

Systems and Process Engineering Centre, College of Engineering, Swansea University, Bay Campus, Crymlyn Burrows, Swansea SA1 8EN. UK

Deadline for manuscript submissions:

closed (31 December 2018)

## **Message from the Guest Editor**

Currently, there is a tremendous interest in the development of materials with intriguing and peculiar properties at the nanoscale for efficient applications in energy and sensing. Electrocatalysis is a branch of science that investigate chemical reactions occurring at the surface of a variety of nanomaterials from metal nanoparticles to carbon nanomaterials to cite few, with applications spanning from reactions of interest in fuel cells (hydrogen oxidation, oxygen reduction reactions, conversion of CO2 to methanol) to sensors (detection of analytes of clinical and/or environmental interest). This Special Issue of Nanomaterials on electrocatalytic applications in energy and sensing aims at collecting reviews and recent papers on the most recent development in electrocatalysis studies for energy and sensing applications.











an Open Access Journal by MDPI

### **Editor-in-Chief**

#### Prof. Dr. Shirley Chiang

Department of Physics, University of California Davis, One Shields Avenue, Davis, CA 95616-5270, USA

## **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, 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, metalorganic 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.

#### **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, CAPlus / SciFinder, Inspec, and other databases.

**Journal Rank:** JCR - Q2 (*Chemistry, Multidisciplinary*) / CiteScore - Q1 (General Chemical Engineering)

#### **Contact Us**