

## Special Issue

# Advanced Nanomaterials for Photocatalytic Application

### Message from the Guest Editor

With the rapid development of industrialization, there is an urgent need to develop new technologies to alleviate the energy and environmental problems facing humanity. The emerging photocatalytic technology has attracted the attention of a wide range of researchers and can utilize the generated electrons and holes from the semiconductors excited by inexhaustible sunlight to drive some interesting redox reactions. Clean photocatalytic technology can achieve effective solar energy conversion and storage, as well as environmental remediation by photocatalytic water splitting, H<sub>2</sub> production, CO<sub>2</sub> reduction, pollutant degradation, and value-added organic transformation. In order to promote the development of photocatalytic technology, this Special Issue aims to present the latest research progress on advanced nanomaterials for photocatalytic applications. Topics of interest include, but are not limited to, the following: photocatalytic H<sub>2</sub> production, CO<sub>2</sub> reduction, water splitting, pollutant treatment, organic synthesis, and nanomaterials synthesis. It is our pleasure to invite you to submit a manuscript to this Special Issue.

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### Guest Editor

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### Deadline for manuscript submissions

closed (20 April 2026)



## Materials

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### Message from the Editorial Board

*Materials* (ISSN 1996-1944) was launched in 2008. The journal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites, advanced materials characterization, porous materials, manufacturing processes and systems, advanced nanomaterials and nanotechnology, smart materials, thin films and interfaces, catalytic materials, carbon materials, materials chemistry, materials physics, optics and photonics, corrosion, construction and building materials, materials simulation and design, electronic materials, advanced and functional ceramics and glasses, metals and alloys, soft matter, polymeric materials, quantum materials, mechanics of materials, green materials, general. *Materials* provides a unique opportunity to contribute high quality articles and to take advantage of its large readership.

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