Special Issue

Application of Nanomaterials in the Field of Photocatalysis

Message from the Guest Editor

The application of nanomaterials in the field of photocatalysis has garnered significant attention due to their potential to address environmental and energy challenges. Nanomaterials, characterized by their small size and high surface area, offer unique electronic. optical, and surface properties that make them highly effective as photocatalysts. These properties enhance light absorption, charge separation, and the overall catalytic activity, making nanomaterials ideal for applications in environmental remediation, such as the degradation of pollutants, and in renewable energy production, such as water splitting for hydrogen generation and CO₂ reduction. Recent advancements in nanotechnology have led to the development of various nanomaterials, including metal oxides, sulfides, and carbon-based materials, which exhibit remarkable photocatalytic efficiencies under visible and ultraviolet light. This Special Issue aims to explore the latest innovations, challenges, and future directions in the application of nanomaterials in photocatalysis, highlighting their role in creating sustainable solutions for environmental and energy-related issues.

Guest Editor

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Message from the Editor-in-Chief

As the world of science becomes ever more specialized, researchers may lose themselves in the deep forest of the ever increasing number of subfields being created. This open access journal Applied Sciences has been started to link these subfields, so researchers can cut through the forest and see the surrounding, or quite distant fields and subfields to help develop his/her own research even further with the aid of this multi-dimensional network.

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