Hydrogen

an Open Access Journal by MDPI

CiteScore: 5.5
Impact Factor: 3.0

Special Issue Reprint

Advances in Hydrogen Production, Storage, and Utilization

Edited by: Guo-Ming Weng

Hydrogen continues to play a central role in the transition to sustainable, low-carbon energy systems. As a clean and versatile energy carrier, it facilitates decarbonization and the integration of renewable energy across multiple sectors. This Special Issue Reprint highlights recent developments across the hydrogen value chain, including innovative production methods such as electrolysis, photochemical, thermochemical, and biological processes; advancements in storage materials and systems; and applications in fuel cells, industrial processes, and integrated energy networks.

The Special Issue emphasizes interdisciplinary research spanning materials science, chemistry, engineering, and policy, addressing technical, economic, environmental, and social aspects of hydrogen technologies. Collectively, the articles provide a current overview of progress in hydrogen science and technology and offer insights to accelerate the deployment of sustainable hydrogen solutions worldwide.

https://www.mdpi.com/books/reprint/12370