Sustainable Energy & Fuels

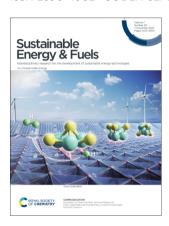
Interdisciplinary research for the development of sustainable energy technologies

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EDITORIAL

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Shaping the future of hybrid ion capacitors

Vanchiappan Aravindan,* Martin Oschatz,* Konstantin Schutjajew* and Marta Sevilla*

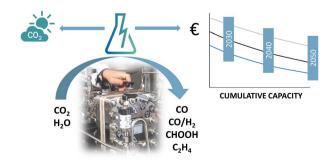


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Electrochemical CO₂ conversion technologies: state-of-the-art and future perspectives

Remko J. Detz,* Claire J. Ferchaud, Arie J. Kalkman, Jasmin Kemper, Carlos Sánchez-Martínez, Marija Saric and Manoj V. Shinde



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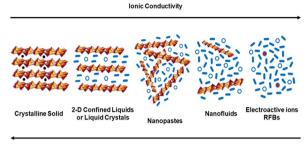


PERSPECTIVES

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To flow or not to flow. A perspective on large-scale stationary electrochemical energy storage

Anukriti Pokhriyal, Daniel Rueda-García and Pedro Gómez-Romero*



Electronic Conductivity

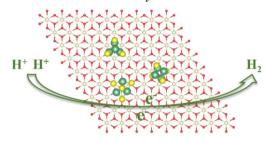
COMMUNICATIONS

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CeO₂-supported multi-nuclear Nb_xS_v clusters for hydrogen evolution reaction

Hongxian Liu,* Chencheng Zhao, Hong Li, Xuelan Li, Xianfeng Mu, Dunhua Hong, Furu Zhong, Zhenxing Fang* and Yanning Zhang*

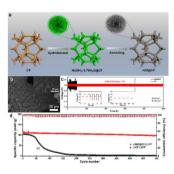
Single Nb_xS_v clusters



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Three-dimensional flower-like NiO on Cu foam as a lithiophilic current collector for high-performance lithium metal batteries

Jiping Ma, Zhanling Zhang,* Bin Zhang,* Changyong Huang, Xiaoqian Shi, Yong Liu and Guangmin Zhou



PAPERS

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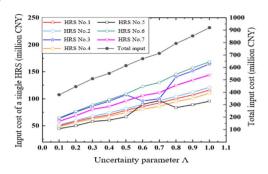
Modulating CsPbBr₃ nanocrystals encapsulated in PCN-224(Zr) for boosting full-spectrum-driven CO₂ reduction: S-scheme transfer, photothermalsynergistic effect, and DFT calculations

Yan-He Chen, Jin-Qiu Shen, Xiao-Lu Chen, Luobing Tang, Na Zhang, Jian-Yong Zhang³ and Zhen-Jiang Liu*



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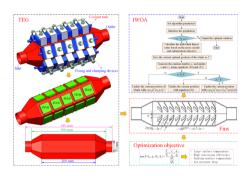
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Site planning and selection of hydrogen refueling stations considering the life cycle and demand uncertainty

Yan Zhou, Xunpeng Qin, Cenglin Yao,* Mao Ni, Jun Zhou, Ling Liu, Wenyi Li and Wenlong Yang

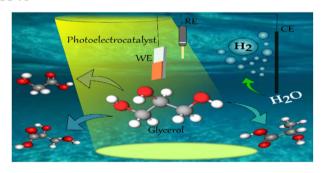
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Performance optimization of a thermoelectric generator for automotive application using an improved whale optimization algorithm

Rui Quan,* Haifeng Guo, Dazhi Liu, Yufang Chang and Hang Wan

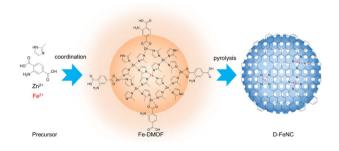
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Photoelectrochemical conversion of glycerol aqueous solution to value-added chemicals using Bi₂Fe₄O₉ as a photoanode

Bruno L. da Silva, Saulo A. Carminati, Matheus B. C. Souza, Leonardo C. Soares, Claudia Longo, Pablo S. Fernández and Ana F. Nogueira*

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MOF-derived Fe-N-C electrocatalyst via a dual ligand strategy for efficient oxygen reduction in acidic media

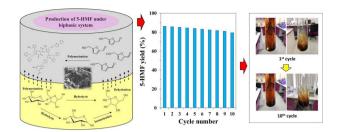
Yi Sheng, Hongmei Zheng, Jingting Hou, Wanying Zhang, Hong Chen, Luanjie Nie, Jing Zheng and Qingxue Lai*

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Selective regression models for the rapid upgrading of raw sugar into 5-HMF bio-fuel additive under a sustainable/reusable system

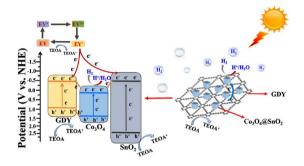
Panya Maneechakr,* Irwan Kurnia, Asep Bayu, Obie Farobie, Chanatip Samart, Suwadee Kongparakul, Guoqing Guan and Surachai Karnjanakom*



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Co₃O₄@SnO₂/graphdiyne type-II heterojunction and p-n heterojunction jointly enhance photocatalytic hydrogen production: Co-O-Sn bond as a bridge for electron transfer

Xin Guo,* Qian Xiao, Tingting Yang, Yantao Sun and Zhiliang Jin*



CORRECTION

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Correction: Closing the balance - on the role of integrating biorefineries in the future energy system

Julia Granacher,* Rafael Castro-Amoedo, Jonas Schnidrig and François Maréchal