

Materials Advances

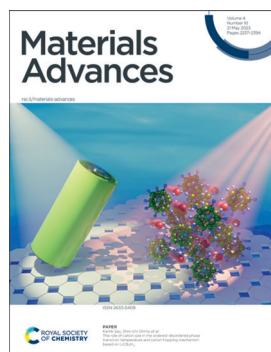
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ISSN 2633-5409 CODEN MAADC9 4(10) 2237-2394 (2023)



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Shin-ichi Orimo *et al.*,
pp. 2269–2280.
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EDITORIAL

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Introduction to biomass materials

Meisha L. Shofner* and Andrew G. Tennyson*

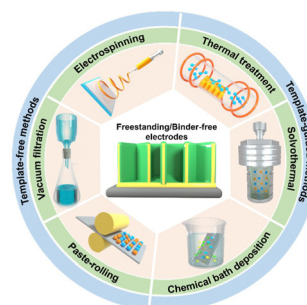


REVIEW

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Rational fabrication strategies of freestanding/binder-free electrodes for efficient capacitive deionization

Zhibo Zhao, Fangqiao Wang, Baobao Li, Zhuomin Chen, Hao Zhou, Xiaoru Wen* and Meidan Ye*



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Materials Advances (electronic: ISSN 2633-5409) is published 24 times a year by the Royal Society of Chemistry, Thomas Graham House, Science Park, Milton Road, Cambridge, UK CB4 0WF.

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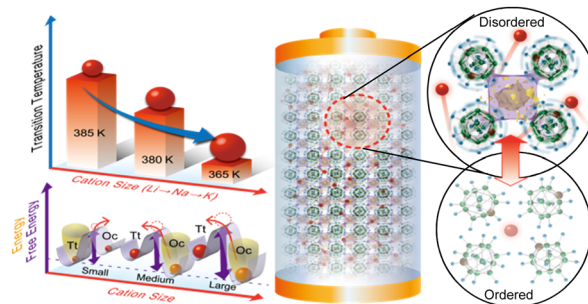
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The role of cation size in the ordered–disordered phase transition temperature and cation hopping mechanism based on $\text{LiCB}_{11}\text{H}_{12}$

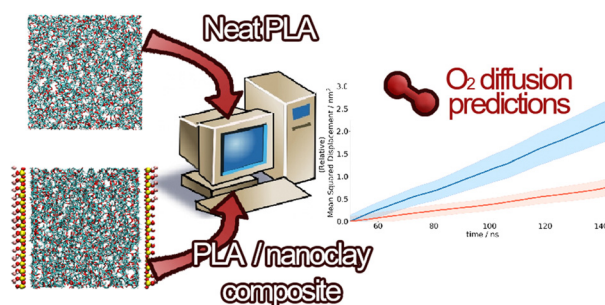
Kartik Sau,* Shigeyuki Takagi, Tamio Ikeshoji, Kazuaki Kisu, Ryuhei Sato and Shin-ichi Orimo*



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A molecular dynamics approach to modelling oxygen diffusion in PLA and PLA clay nanocomposites

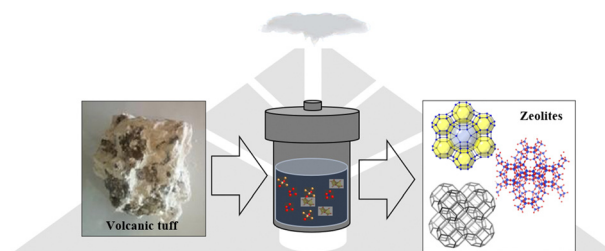
J. C. Lightfoot,* B. Castro-Dominguez, A. Buchard and S. C. Parker*



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Hydrothermal synthesis of zeolites using silica extracted from tropical volcanic ash

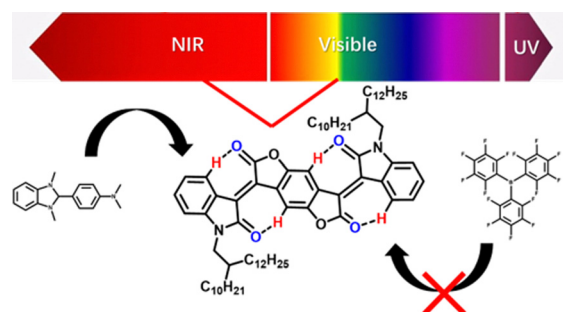
Stephen O. Otieno, Fredrick O. Kengara, Chrispin O. Kowenje* and Robert Mokaya*



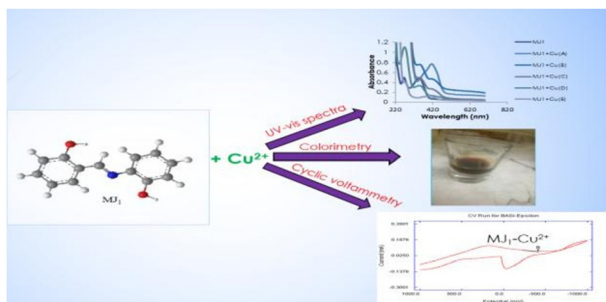
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Aldol condensation-polymerized semiconducting polymers based on a BDOPV unit with near infrared absorption and better n-doped ability

Li Tian,* Airong Wang, Haowei Lin, Wenxi Cheng, Mengya Shang, Shanhong Xu and Xuefei Zhou



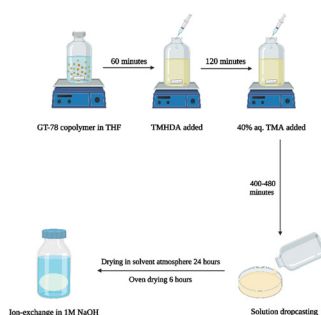
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Schiff bases as analytical tools: synthesis, chemo-sensor, and computational studies of 2-aminophenol Schiff bases

Felicia Ndidi Ejiah,* Mujeeb Olarewaju Rofiu, Oluwakemi Adekunbi Oloba-Whenu and Tolulope Mojisola Fasina

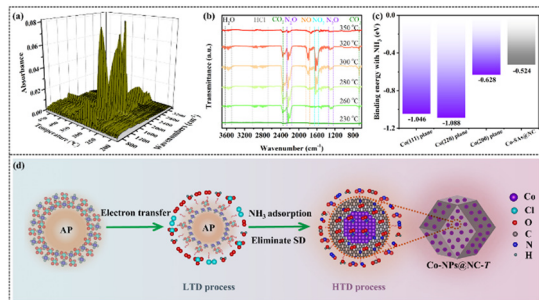
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In situ amination of anion conducting solid polymer electrolyte membranes

Parin N. Shah, Habin Park, Hui Min Tee, Chandler Dietrich and Paul A. Kohl*

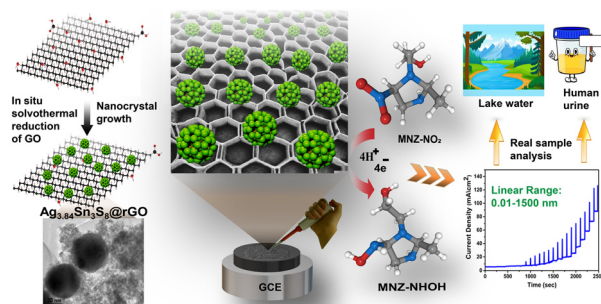
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Understanding the synergistically enhanced thermocatalytic decomposition of ammonium perchlorate using cobalt nanoparticle-embedded nitrogen-doped graphitized carbon

Hong Lin, Qingchun Zhang,* Huiyu Liu, Shiyong Shen,* Zhiliang Guo, Bo Jin* and Rufang Peng

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In situ fabrication and design of a novel electrochemical sensor based on the $\text{Ag}_{3.84}\text{Sn}_3\text{S}_8@\text{rGO}$ nanocomposite for competitive ultra-detection of metronidazole in human urine

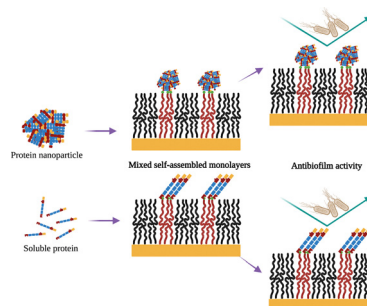
Jit Satra, Papri Mondal, Gopala Ram Bhadu and Bibhotosh Adhikary*



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Antibiofilm surfaces based on the immobilization of a novel recombinant antimicrobial multidomain protein using self-assembled monolayers

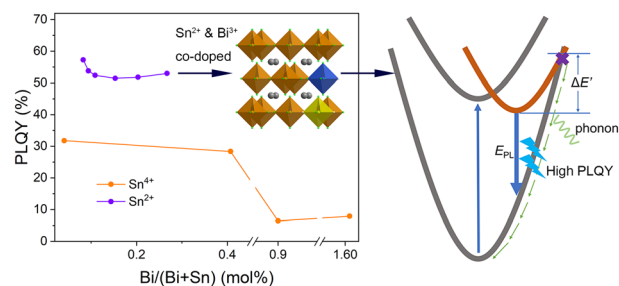
Adriana R. Kyvik, Ramon Roca-Pinilla, Karla Mayolo-Deloisa, Xavier Rodriguez Rodriguez, Marc Martinez-Miguel, Marta Martos, Mariana Köber, Nora Ventosa, Jaume Veciana, Judith Guasch, Elena Garcia-Fruitós, Anna Arís and Imma Ratera*



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Sn²⁺ doping-induced large extra vibrational energy of an excited state for efficient blue emission in Cs₂SnCl₆:Bi

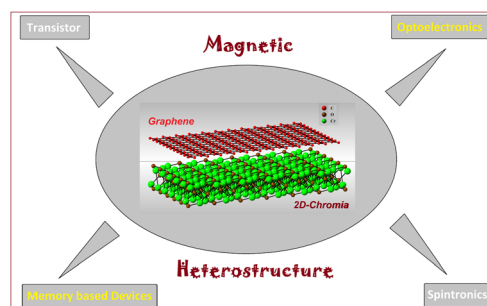
Shaofan Fang,* Jinbo Huang, Huixia Li, Jingheng Nie, Zexiang Liu, Feier Fang and Haizhe Zhong*



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Signature of magnetism in 2D-chromia: 2D analog of the natural α -Cr₂O₃ mineral and its heterostructure with graphene

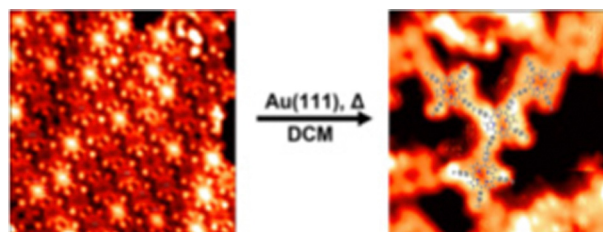
Renu Singla, Rahul Singla, Sarvesh Kumar, Timothy A. Hackett and Manish K. Kashyap*



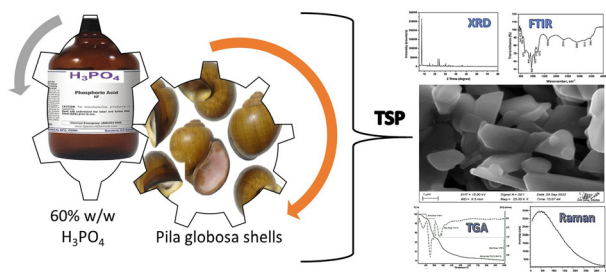
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Synthesis of extended covalently bound porphyrins on the Au(111) surface

José J. Ortiz-García* and Rebecca C. Quardokus



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Synthesis and characterization of nano-crystallite triple superphosphate from waste *Pila globosa* shells for sustainable industrial production

Md. Sahadat Hossain, Md. Aftab Ali Shaikh,*
Md. Farid Ahmed and Samina Ahmed*

