

# RSC Sustainability

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**Cover**  
See Yuan Jiang *et al.*, pp. 1356–1366. Image reproduced by permission of Battelle Memorial Institute from *RSC Sustainability*, 2026, 4, 1356.



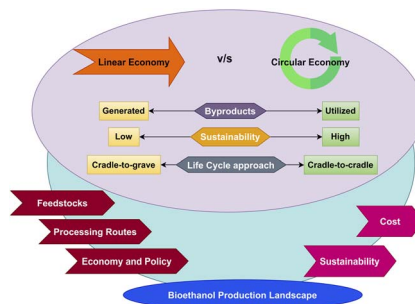
**Inside cover**  
See Erlind Mysliu, Malgorzata Chojak Halseid, Andreas Erbe *et al.*, pp. 1367–1375. Image reproduced by permission of Erlind Mysliu and Malgorzata Halseid from *RSC Sustainability*, 2026, 4, 1367. Image created with AI.

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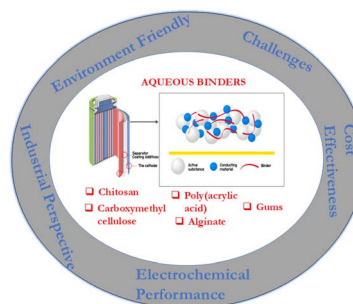
Sanyam Jain and Shushil Kumar\*



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### A review of aqueous-based binders used for cathode fabrication in lithium-ion batteries

Samuel O. Ajayi,\* Tarekegn H. Dolla, Peter R. Makgwane, Xinying Liu, Moses M. Solomon, Cyril O. Ehi-Eromosele and Mkhulu K. Mathe\*



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## Sustainable extraction of bioactive compounds: a life cycle perspective on technologies, solvents, and process scale-up

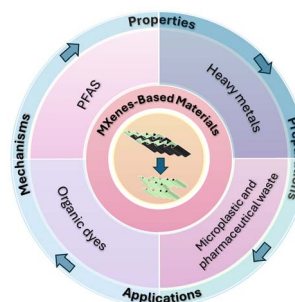
Justin Z. Lian, Tie Liu, Jintian Yang, Hengyi Zhu, Nalinpat Chalermchotiwong, Yemima Grain, Long Yue, Xiang Luo, Stefano Cucurachi, Jian Li,\* Fanran Meng\* and Bin Dong\*



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## Application of MXenes for emerging contaminant removal and water purification: a revolutionary approach

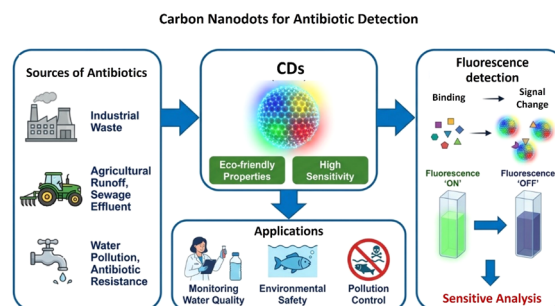
Savan K. Raj,\* Prem P. Sharma, Dominika Bury, Agnieszka M. Jastrzebska and Vaibhav Kulshrestha\*



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## Fluorescence-based detection of antibiotics in aquatic environments using carbon nanodots: a review

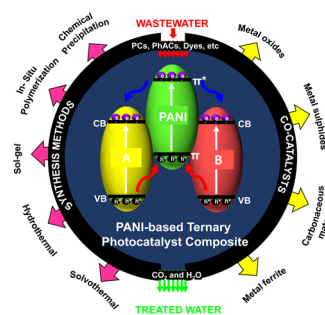
Marwan Sardar, Khalid M. Omer,\* Sameera Sh. Mohammad Ameen and Kosar Hikmat Hama Aziz\*



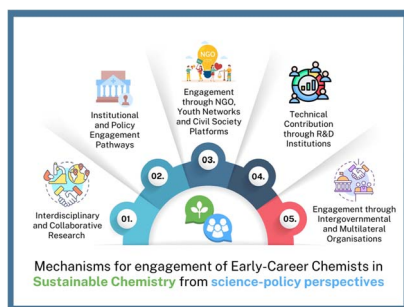
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## Polyaniline-based ternary composites for the photocatalytic degradation of organic pollutants in wastewater: multifunctional properties, synthetic routes, and mechanistic insights

Jyoti Kumari, Adarsh Singh, Akash Rawat, Suneel Kumar Srivastava and Ashok Kumar Gupta\*



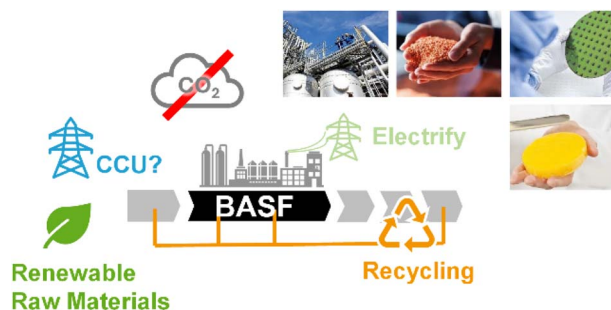
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### Engagement of early-career scientists in sustainable chemistry: science policy perspectives

Lovish Raheja, Francisca J. Benítez,\* José Ferraz-Caetano, Maulline G. Leviev, Aanchal Saxena and Anna Isabel Becker

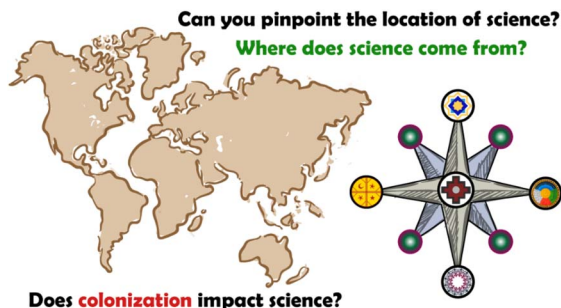
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Bernhard von Vacano,\* Wolfgang Hübinger, Willis Muganda, Grigorios Kolios, Talke Schaffranek, Alois Kindler, Kai Ehrhard and Markus Weber\*

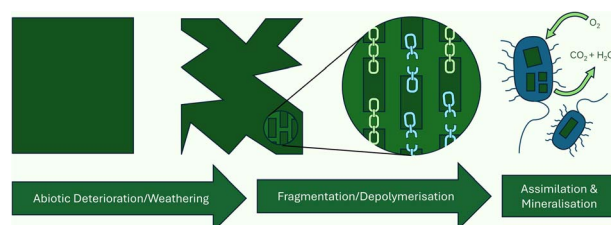
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### Decolonizing green chemistry research through Matharu plots

Francisco Yarur Villanueva,\* Daniel J. Inglis and Avtar S. Matharu\*

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### Beyond the guidelines: rethinking OECD biodegradability testing for polymers in liquid formulations

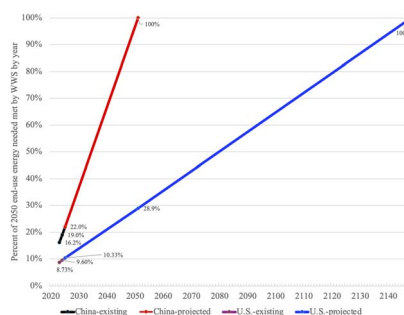
Frank Stott, Edisa García Hernández, Jessica Staniland,\* Amy Goddard, Sarah Davidson and Ian Tooley



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## Projections of when each of 150 countries may eliminate air pollution and carbon emissions from all energy

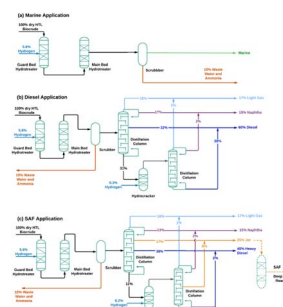
Mark Z. Jacobson\*



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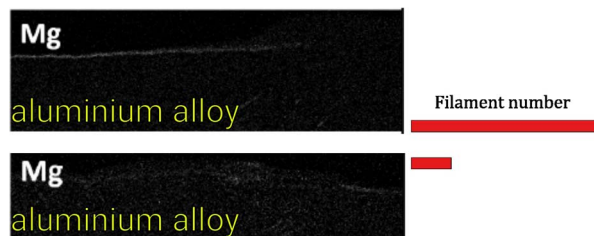
Shuyun Li, Longwen Ou, Yuan Jiang,\* Hao Cai, Daniel M. Santosa, Uriah J. Kilgore, Senthil Subramaniam, Igor Kutnyakov, Huamin Wang, Michael R. Thorson and Mariefel Olarte



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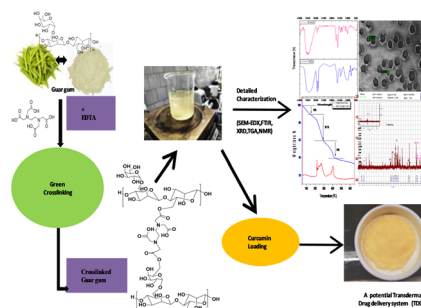
Erlind Mysliu,\* John Erik Lein, Per Erik Vullum, Jan Tore Buvik Gundersen, Malgorzata Chojak Halseid,\* Otto Lunder and Andreas Erbe\*



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## EDTA-mediated crosslinking of guar gum: a sustainable platform for transdermal curcumin delivery

Jyoti Rajput, Vineet Kumar,\* Kalpana Chauhan, Dhruv Kumar, Garima Singh and Ashish Mathur

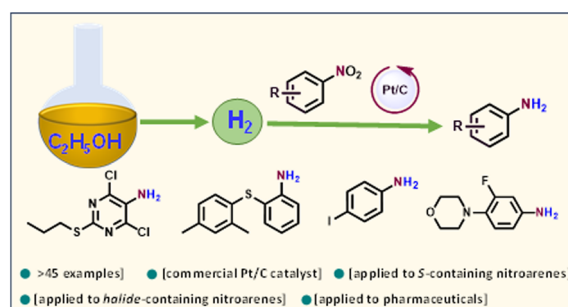




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### Ethanol as a H<sub>2</sub> source: transfer hydrogenation of sulfur and halogen containing nitroarenes with an anti-poisoning platinum on carbon catalyst

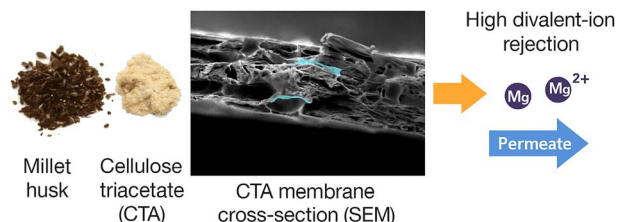
Chitrarekha Dewangan, Reeshma Rameshan, Suresh Perumal, Narayana V. Kalevaru, Sebastian Wohlrab,\* Rajenahally V. Jagadeesh\* and Kishore Natte\*



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### Nanofiltration membranes based on cellulose triacetate from millet husk

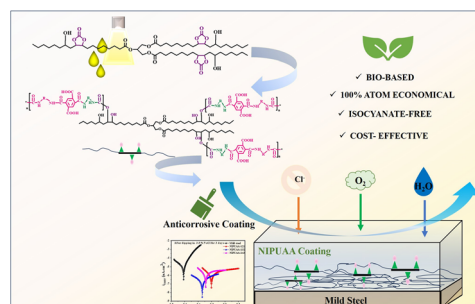
Maryam Khadim MBACKE,\* Mouhamed Ndoye, El Hadji Moussa Diop and Moustapha Sene



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### Sustainable bio-based isocyanate-free poly(urethane amic acid) coatings for the corrosion protection of mild steel

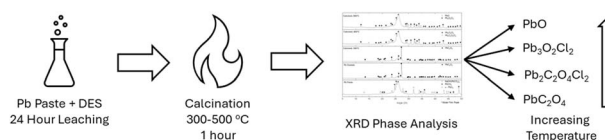
Rakesh Rapolu, Kashmiri Borah, P. Ermiya Prasad, Aqueeb Javeed and Aruna Palanisamy\*



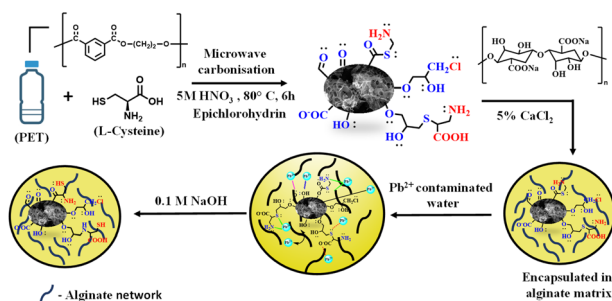
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### Synthesising lead oxide and oxychloride minerals from spent lead acid battery waste using a choline-chloride based deep eutectic solvent

Enrico W. Manfredi-Haylock,\* Gwilherm K. Kerherve and David J. Payne



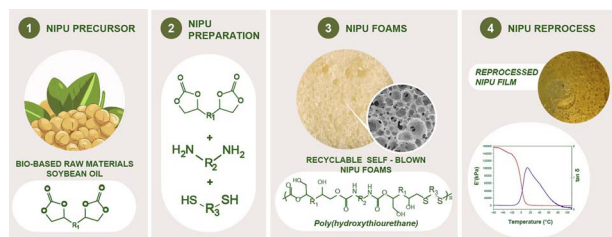
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### Sustainable approach for the sequestration of lead from water involving the synergistic influence of PET waste and L-cysteine encapsulated in sodium alginate beads

K. Krishna Priyanka, Arunraj Balasubramanian, M. Christina Nilavu, Himanshu Aggarwal\* and N. Rajesh\*

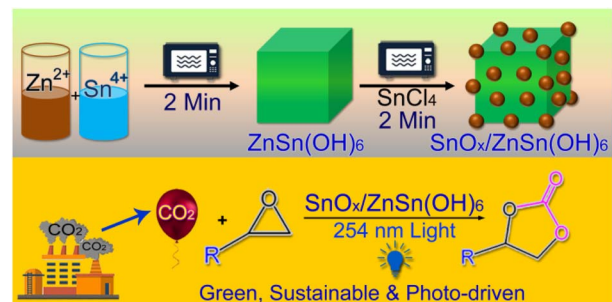
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### Design of fully reprocessable composite non-isocyanate polyurethane (NIPU) foams from sustainable blends of cyclic carbonates

Federica Orabona, Federica Recupido, Krzysztof Polaczek, Giuseppe Cesare Lama, Martina Morra, Francesco Taddeo, Martino Di Serio, Tapio Salmi, Letizia Verdolotti\* and Vincenzo Russo

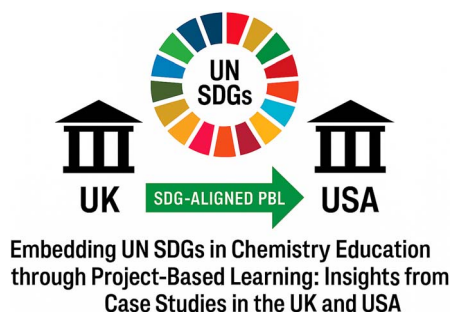
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### Microwave assisted construction of a SnO<sub>x</sub>/ZnSn(OH)<sub>6</sub> heterojunction for photocatalytic CO<sub>2</sub> cycloaddition

Soumita Sarkar, Soumalya Banerjee, Sk Afsar Ali, Sunny Sarkar and Astam K. Patra\*

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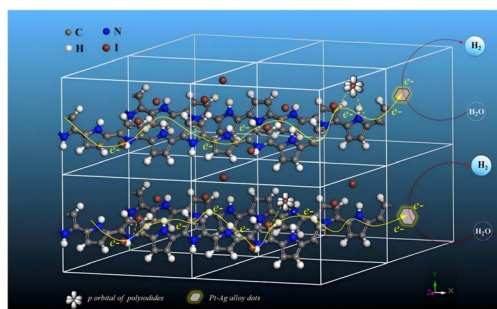
Yalinu Poya\*



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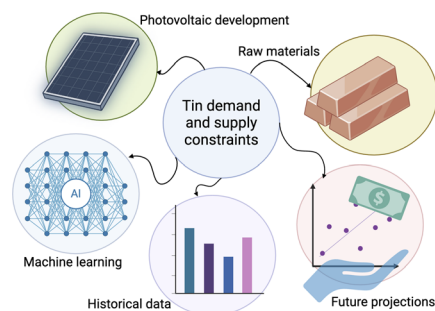
Wenyan Zhang,\* Chaoqun Jiang, Weidong Tao, Yihan Wang, Hangmin Guan and Lingyun Hao



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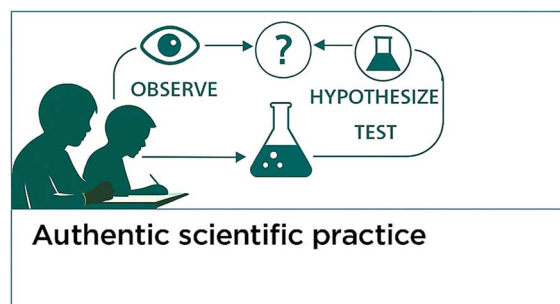
Rahul Aggarwal,\* Rickard Arvidsson and Gregory Peters



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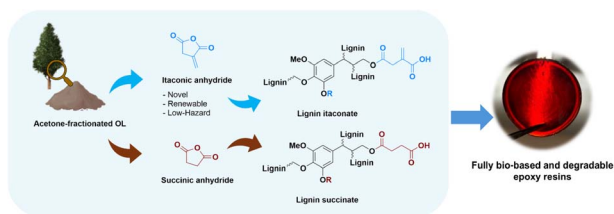
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Yalinu Poya\*



## PAPERS

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Celeste Libretti, Gianluca Giuseppe Rizzo, Sophia Abou El Mirate, Mats Johansson\* and Michael A. R. Meier\*

## CORRECTION

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### Correction: Change of tides in European chemical legislation. A turning point in European chemicals policy: reconciling green ambitions with the viability of the manufacturing sector in Europe

Éva Ujaczki and Jan Backmann\*

