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RSC Applied Interfaces

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Cover
See Scott E. Crawford *et al.*, pp. 689–698.
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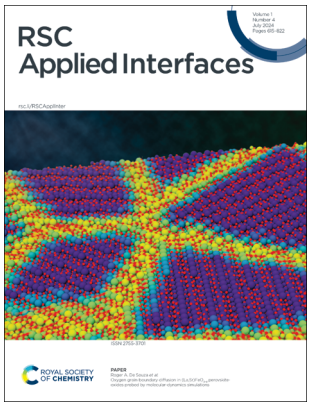

Inside cover
See Roger A. De Souza *et al.*, pp. 699–710.
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REVIEWS

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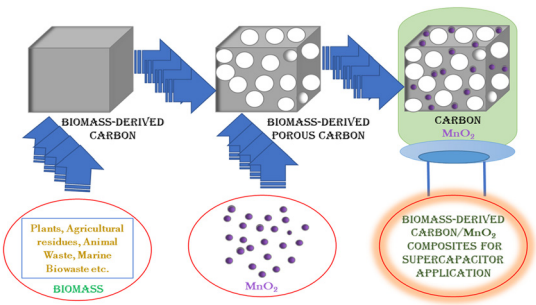
Manganese dioxide (MnO_2) and biomass-derived carbon-based electroactive composite materials for supercapacitor applications

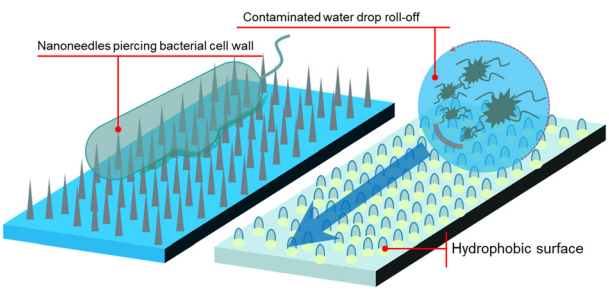
Pranoti H. Patil and Sushilkumar A. Jadhav*



648

Biological design and inspiration of bactericidal hierarchical interfaces

Mahreen Muneer, Hariprasad Parayil Kalappurackal, Akshay Balachandran and Saifullah Lone*



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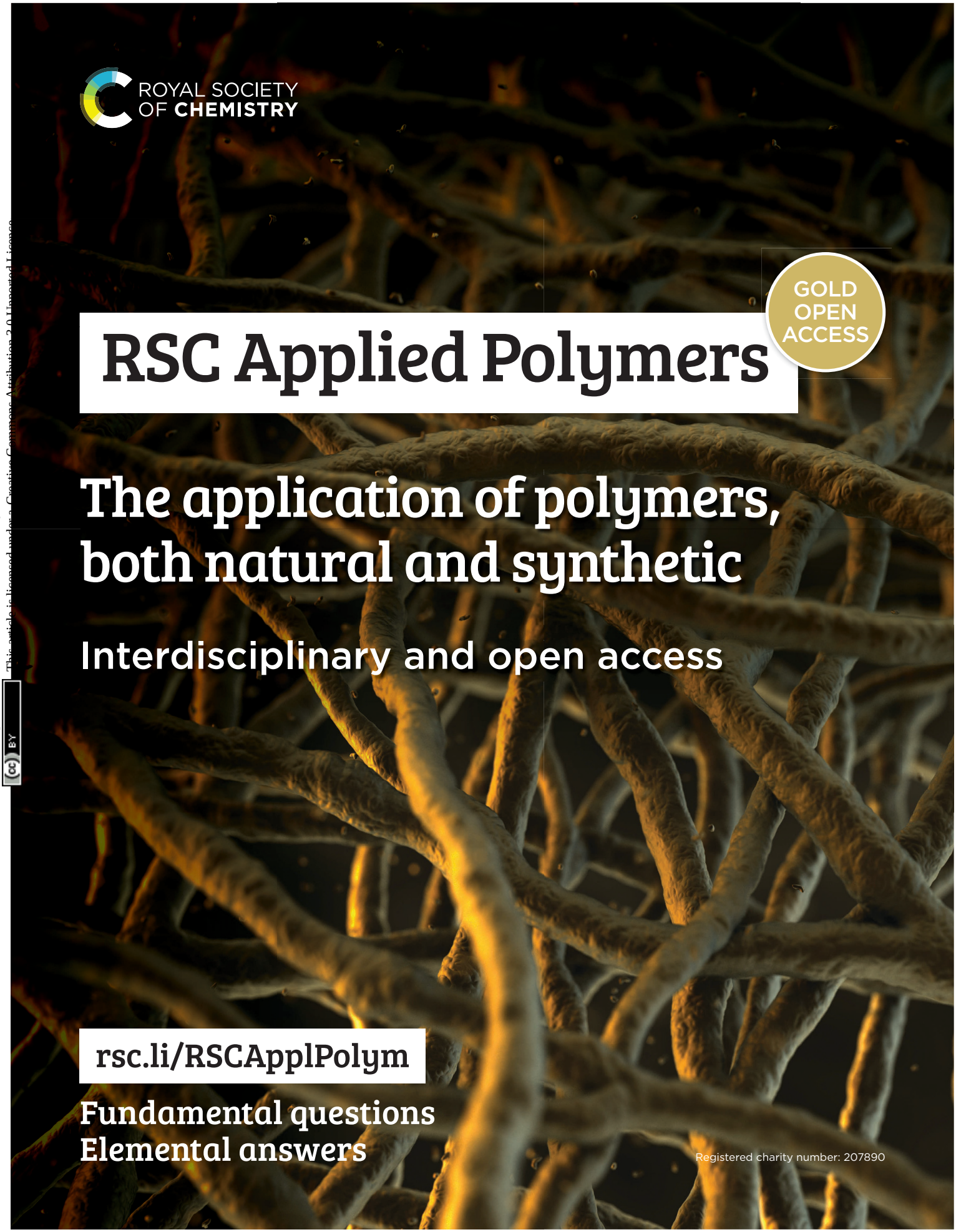

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COMMUNICATIONS

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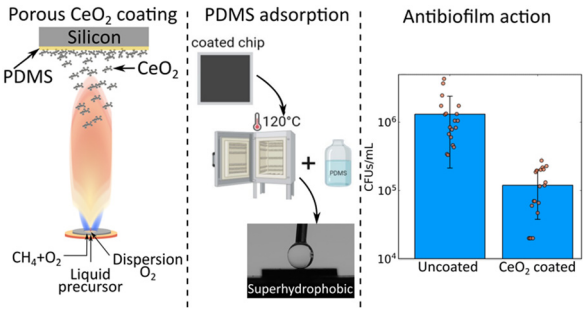
Prevention of uropathogenic *E. coli* biofilm formation by hydrophobic nanoparticle coatings on polymeric substrates

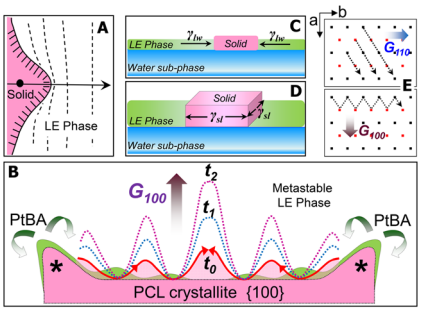
Stefanie Dietl, Padryk Merkl and Georgios A. Sotiriou*



671

Interface-modulated morphological transition of biodegradable poly(ε-caprolactone) crystals

Bingbing Li* and Alan R. Esker



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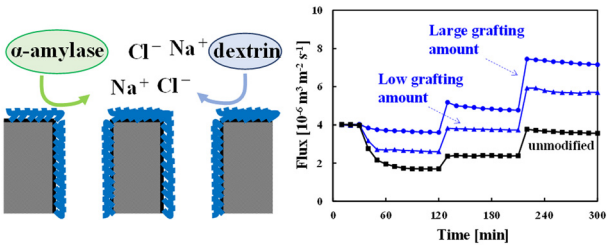
Poly(2-methoxyethyl acrylate)-grafted microfiltration membranes exhibiting low-fouling properties in the presence of salt species

Kazuki Akamatsu,* Masamune Sano, Fumio Okada, Shin-ichi Nakao and Xiao-lin Wang



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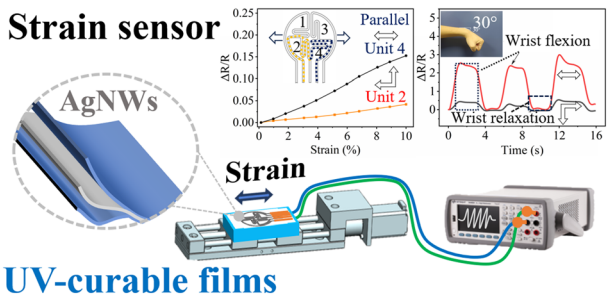
Flexible strain sensors based on silver nanowires and UV-curable acrylate elastomers for wrist movement monitoring

Shuhao Li, Wenjin Wu, Yu Chang, Weiquan Chen, Yijie Liu, Zifeng He, Yan Pu, Ivan S. Babichuk,* Terry Tao Ye, Zhaoli Gao and Jian Yang*



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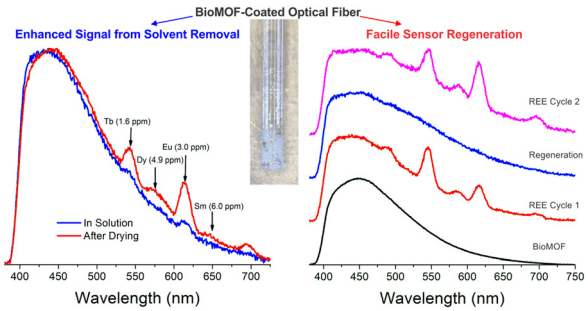

Zinc adeninate metal–organic framework-coated optical fibers for enhanced luminescence-based detection of rare earth elements

Scott E. Crawford,* Ward A. Burgess, Ki-Joong Kim, John P. Baltrus and Nathan A. Diemler

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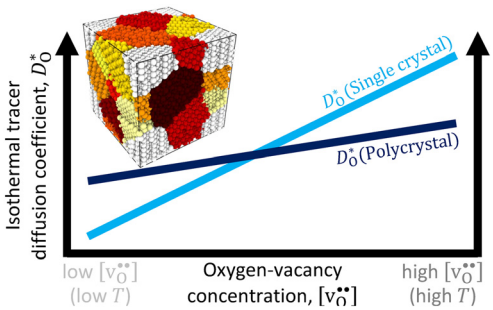

Oxygen grain-boundary diffusion in (La,Sr)$FeO_{3-\delta}$ perovskite-oxides probed by molecular-dynamics simulations

Alexander Bonkowski, John A. Kilner and Roger A. De Souza*

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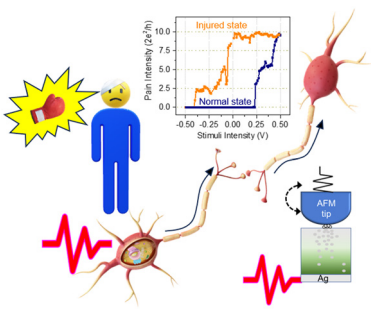

Artificial nociceptor using an Ag/Ag_2S/Pt atomic switch

Anwesha Mahapatra and Alpana Nayak*

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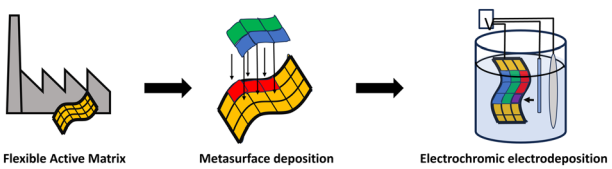

Electrochromic active matrix with plasmonic metasurfaces

Oliver Olsson,* Marika Gugole, Jolie C. Blake, Maxim Chukharkin and Andreas Dahlin

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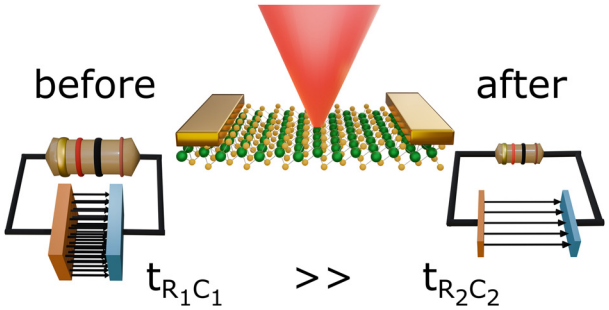
A simple 230 MHz photodetector based on exfoliated WSe_2 multilayers

Fabian Strauß, Pia Kohlschreiber, Jakob Keck, Patrick Michel, Jonas Hiller, Alfred J. Meixner and Marcus Scheele*



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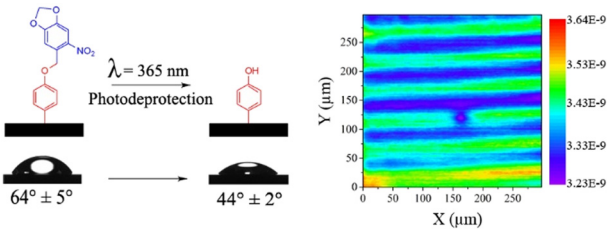
Patterned organic layers on gold surfaces prepared by electro-grafting of photolabile-protected aryl diazonium salts

Max Taras, Jean-Francois Bergamini, Paula A. Brooksby, Philippe Hapiot, Corinne Lagrost and Yann R. Leroux*



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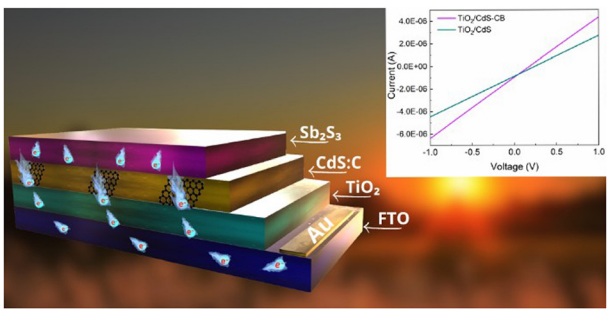
CdS-carbon black hybrid nanocomposite buffer layer for antimony sulfide solar cells

Ronal Edgardo Castellanos-Pineda, Agustin Baron-Jaimes, Mario Alejandro Millán-Franco, Marina Elizabeth Rincón and Oscar Andrés Jaramillo-Quintero*



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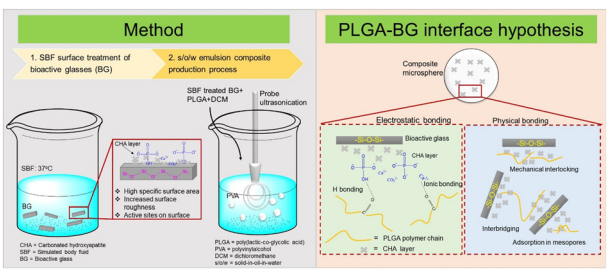
Surface modification of bioactive glasses for successful incorporation with poly(lactic-*co*-glycolic acid) (PLGA)

Nishant Jain, Johannes Schmidt, Oliver Görke, David Karl, Aleksander Gurlo and Franziska Schmidt*



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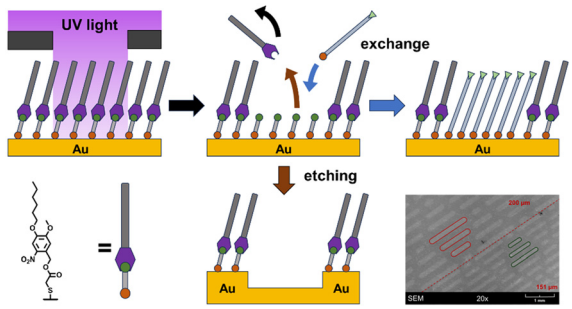

Enhancement of replacement lithography by combination of photocleavable groups with ultrashort thiolates

Christian Fischer, Florian Born and Andreas Terfort*

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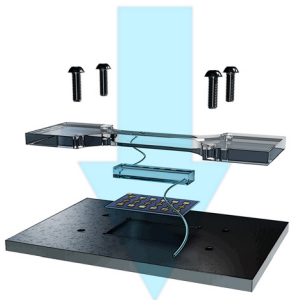

Microfluidic-organic thin film transistor coupled platform for simple solution exposure

Nicholas T. Boileau, Benjamin King, Sparsh Kapar, Ali Najafi Sohi, Joseph G. Manion, Michel Godin and Benoît H. Lessard*

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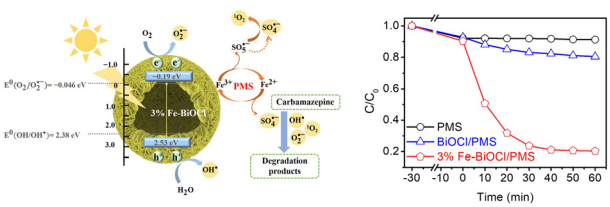

Efficient peroxymonosulfate activation by Fe–BiOCl hollow microspheres for carbamazepine removal

Liyong Ding,* Xuejuan Huang, Yuqin Liu, Qingqing Jiang and Juncheng Hu*

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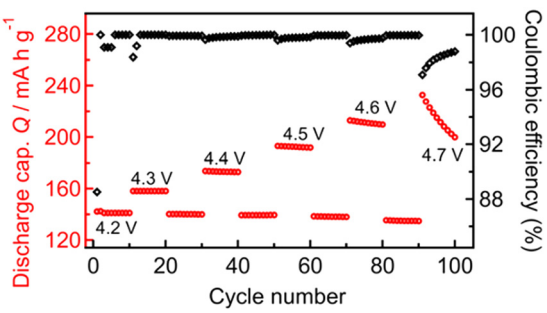

Degradation of a lithium cobalt oxide cathode under high voltage operation at an interface with an oxide solid electrolyte

Kotaro Ito, Kazuhisa Tamura, Keisuke Shimizu, Norifumi L. Yamada, Kenta Watanabe, Kota Suzuki, Ryoji Kanno and Masaaki Hirayama*

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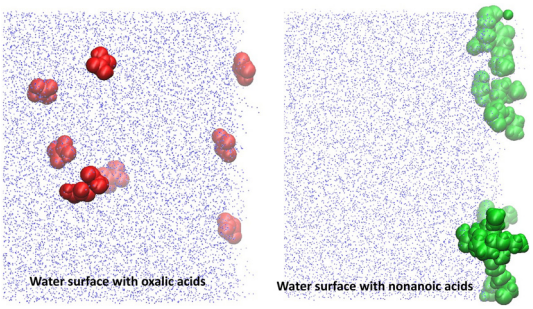
Energetic description of the liquid–vapor interface of water with organic coating molecules

Julien Devémy, Alain Dequidt, Pascal Renard, Laurent Deguillaume and Patrice Malfreyt*



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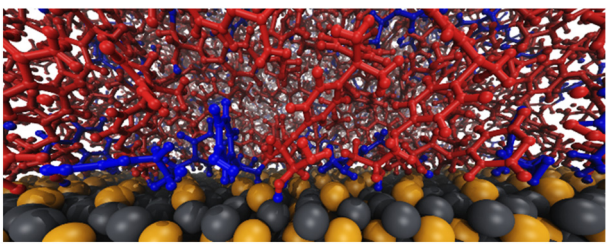
Segregation in epoxy/amine systems on iron oxide surfaces

Kieran Harris,* Charlie R. Wand, Peter Visser and Flor R. Siperstein