

Performance and cost of materials for lithium-based rec

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Citation Report

#	ARTICLE	IF	CITATIONS
1	Reality check. Nature Energy, 2018, 3, 245-245.	19.8	3
2	Triphenylphosphine Oxide as Highly Effective Electrolyte Additive for Graphite/NMC811 Lithium Ion Cells. Chemistry of Materials, 2018, 30, 2726-2741.	3.2	110
3	Nanocomposite of Si/C Anode Material Prepared by Hybrid Process of High-Energy Mechanical Milling and Carbonization for Li-Ion Secondary Batteries. Applied Sciences (Switzerland), 2018, 8, 2140.	1.3	11
4	Supercritical CO <sub>2</sub> -assisted synthesis of 3D porous SiOC/Se cathode for ultrahigh areal capacity and long cycle life Li-Se batteries. Journal of Materials Chemistry A, 2018, 6, 24773-24782.	5.2	26
5	Fluorinated Electrolyte Compound as a Bi-Functional Interphase Additive for Both, Anodes and Cathodes in Lithium-Ion Batteries. Journal of the Electrochemical Society, 2018, 165, A3525-A3530.	1.3	29
6	Recent Advances in Energy Chemical Engineering of Next-Generation Lithium Batteries. Engineering, 2018, 4, 831-847.	3.2	169
7	Performance Metrics Required of Next-Generation Batteries to Electrify Vertical Takeoff and Landing (VTOL) Aircraft. ACS Energy Letters, 2018, 3, 2989-2994.	8.8	81
8	Enhanced Capacity of NiO Nanocubes with High Dispersion and Exposed Facets Reinforced by Thermal Plasma. ACS Applied Nano Materials, 2018, 1, 5981-5988.	2.4	13
9	Detrimental Effects of Chemical Crossover from the Lithium Anode to Cathode in Rechargeable Lithium Metal Batteries. ACS Energy Letters, 2018, 3, 2921-2930.	8.8	89
10	Properties of Ion Complexes and Their Impact on Charge Transport in Organic Solvent-Based Electrolyte Solutions for Lithium Batteries: Insights from a Theoretical Perspective. Batteries, 2018, 4, 62.	2.1	36
11	Before Li Ion Batteries. Chemical Reviews, 2018, 118, 11433-11456.	23.0	1,492
12	Will Sodium Layered Oxides Ever Be Competitive for Sodium Ion Battery Applications?. Journal of the Electrochemical Society, 2018, 165, A3714-A3722.	1.3	78
13	Impact of Trifluoromethylation of Adiponitrile on Aluminum Dissolution Behavior in Dinitrile-Based Electrolytes. Journal of the Electrochemical Society, 2018, 165, A3773-A3781.	1.3	25
14	High-Voltage Li-Ion Full Cells with Ultralong Term Cycle Life at Elevated Temperature. Advanced Energy Materials, 2018, 8, 1802322.	10.2	34
15	An Integrated Strategy towards Enhanced Performance of the Lithium-Sulfur Battery and its Fading Mechanism. Chemistry - A European Journal, 2018, 24, 18544-18550.	1.7	14
16	Hydrothermal-derived carbon as a stabilizing matrix for improved cycling performance of silicon-based anodes for lithium-ion full cells. Beilstein Journal of Nanotechnology, 2018, 9, 2381-2395.	1.5	14
17	Scalable Room-Temperature Synthesis of Multi-shelled Na <sub>3</sub> (VOPO <sub>4</sub> ) <sub>2</sub> F Microsphere Cathodes. Joule, 2018, 2, 2348-2363.	11.7	128
18	Perspective on Performance, Cost, and Technical Challenges for Practical Dual-Ion Batteries. Joule, 2018, 2, 2528-2550.	11.7	312

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19	A Hierarchical Silver Nanowire Graphene Host Enabling Ultrahigh Rates and Superior Long-Term Cycling of Lithium Metal Composite Anodes. <i>Advanced Materials</i> , 2018, 30, e1804165.	11.1	221
20	Size effects of micro-pattern on lithium metal surface on the electrochemical performance of lithium metal secondary batteries. <i>Journal of Power Sources</i> , 2018, 408, 136-142.	4.0	20
21	Activate metallic copper as high-capacity cathode for lithium-ion batteries via nanocomposite technology. <i>Nano Energy</i> , 2018, 54, 59-65.	8.2	22
22	Ameliorating Interfacial Ionic Transportation in All-Solid-State Li-Ion Batteries with Interlayer Modifications. <i>ACS Energy Letters</i> , 2018, 3, 2775-2795.	8.8	66
23	L-Leucine Templated Biomimetic Assembly of SnO <sub>2</sub> Nanoparticles and Their Lithium Storage Properties. <i>Scanning</i> , 2018, 2018, 1-8.	0.7	2
24	Unlocking Full Discharge Capacities of Poly(vinylphenothiazine) as Battery Cathode Material by Decreasing Polymer Mobility Through Cross-Linking. <i>Advanced Energy Materials</i> , 2018, 8, 1802151.	10.2	78
25	A Review: Carbon Additives in LiMnPO <sub>4</sub> - and LiCoO <sub>2</sub> -Based Cathode Composites for Lithium Ion Batteries. <i>Batteries</i> , 2018, 4, 50.	2.1	29
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27	High-performance Na ion cathodes based on the ubiquitous and reversible O redox reaction. <i>Journal of Materials Chemistry A</i> , 2018, 6, 24120-24127.	5.2	5
28	Outstanding electrochemical performance of high-voltage LiNi <sub>1/3</sub> Co <sub>1/3</sub> Mn <sub>1/3</sub> O <sub>2</sub> cathode achieved by application of LiPO <sub>2</sub> F <sub>2</sub> electrolyte additive. <i>Electrochimica Acta</i> , 2018, 290, 568-576.	2.6	78
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32	MXene Aerogel Scaffolds for High-Rate Lithium Metal Anodes. <i>Angewandte Chemie</i> , 2018, 130, 15248-15253.	1.6	49
33	MXene Aerogel Scaffolds for High-Rate Lithium Metal Anodes. <i>Angewandte Chemie - International Edition</i> , 2018, 57, 15028-15033.	7.2	279
34	Surface and Subsurface Reactions of Lithium Transition Metal Oxide Cathode Materials: An Overview of the Fundamental Origins and Remedying Approaches. <i>Advanced Energy Materials</i> , 2018, 8, 1802057.	10.2	207
35	Cation-Dependent Electrochemistry of Polysulfides in Lithium and Magnesium Electrolyte Solutions. <i>Journal of Physical Chemistry C</i> , 2018, 122, 21770-21783.	1.5	49
36	Mechanism of Charge/Discharge of Poly(vinylphenothiazine)-Based Organic Batteries. <i>Chemistry of Materials</i> , 2018, 30, 6307-6317.	3.2	57

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37	Li <sup>+</sup> intercalated V <sub>2</sub> O <sub>5</sub> with enlarged layer spacing and fast ion diffusion as an aqueous zinc-ion battery cathode. <i>Energy and Environmental Science</i> , 2018, 11, 3157-3162.	15.6	785
38	N-Doped Graphene Modified 3D Porous Cu Current Collector toward Microscale Homogeneous Li Deposition for Li Metal Anodes. <i>Advanced Energy Materials</i> , 2018, 8, 1800914.	10.2	155
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40	The big squeeze. <i>Nature Materials</i> , 2018, 17, 481-481.	13.3	0
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43	Pentafluorophenyl Isocyanate as an Effective Electrolyte Additive for Improved Performance of Silicon-Based Lithium-Ion Full Cells. <i>ACS Applied Materials &amp; Interfaces</i> , 2018, 10, 28187-28198.	4.0	49
44	Pre-Lithiation Strategies for Rechargeable Energy Storage Technologies: Concepts, Promises and Challenges. <i>Batteries</i> , 2018, 4, 4.	2.1	251
45	A strategy for designing new AB <sub>4.5</sub> -type hydrogen storage alloys with high capacity and long cycling life. <i>Journal of Power Sources</i> , 2018, 398, 42-48.	4.0	26
46	A surfactant-assisted strategy to tailor Li-ion charge transfer interfacial resistance for scalable all-solid-state Li batteries. <i>Sustainable Energy and Fuels</i> , 2018, 2, 2165-2170.	2.5	51
47	High-Coulombic Efficiency Carbon/Li Clusters Composite Anode without Recycling or Prelithiation. <i>Small</i> , 2018, 14, e1802226.	5.2	31
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50	Hierarchically Porous N-Doped Carbon Fibers as a Free-Standing Anode for High-Capacity Potassium-Based Dual-Ion Battery. <i>Advanced Energy Materials</i> , 2019, 9, 1901663.	10.2	128
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56	Design, synthesis and lithium-ion storage capability of Al <sub>0.5</sub> Nb <sub>24.5</sub> O <sub>62</sub> . <i>Journal of Materials Chemistry A</i> , 2019, 7, 19862-19871.	5.2	96
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59	A modeling framework to assess specific energy, costs and environmental impacts of Li-ion and Na-ion batteries. <i>Sustainable Energy and Fuels</i> , 2019, 3, 3061-3070.	2.5	36
60	Cl <sup>+</sup> /SO <sub>3</sub> <sup>2-</sup> -Codoped Poly(3,4-ethylenedioxythiophene) That Interpenetrates and Encapsulates Porous Fe <sub>2</sub> O <sub>3</sub> To Form Composite Nanoframeworks for Stable Lithium-Ion Batteries. <i>ACS Applied Materials &amp; Interfaces</i> , 2019, 11, 30801-30809.	4.0	18
61	Lithiation-Induced Structural Rearrangement and Stress Change in SiCO-Derived Porous Carbon: A First-Principles Study. <i>Journal of Physical Chemistry C</i> , 2019, 123, 19315-19321.	1.5	2
62	Manipulation of an ionic and electronic conductive interface for highly-stable high-voltage cathodes. <i>Nano Energy</i> , 2019, 65, 103988.	8.2	45
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74	Electrochemical synthesis of nanowire anodes from spent lithium ion batteries. <i>Electrochimica Acta</i> , 2019, 319, 481-489.	2.6	25
75	High-Performance, Low-Cost, and Dense-Structure Electrodes with High Mass Loading for Lithium-Ion Batteries. <i>Advanced Functional Materials</i> , 2019, 29, 1903961.	7.8	93
76	Preparative hydrophilic interaction liquid chromatography of acidic organofluorophosphates formed in lithium ion battery electrolytes. <i>Journal of Chromatography A</i> , 2019, 1603, 438-441.	1.8	4
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1255	Digitalization of Battery Manufacturing: Current Status, Challenges, and Opportunities. <i>Advanced Energy Materials</i> , 2022, 12, .	10.2	51
1256	Geometrical engineering of a SPANâ€“graphene composite cathode for practical Liâ€“S batteries. <i>Journal of Materials Chemistry A</i> , 2022, 10, 10844-10853.	5.2	15
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1258	Built-in electric field accelerated polysulfide conversion for advanced lithium-sulfur batteries. <i>Materials Letters</i> , 2022, , 132265.	1.3	3
1259	Multi-Role Surface Modification of Single-Crystalline Nickel-Rich Lithium Nickel Cobalt Manganese Oxides Cathodes with WO <sub>3</sub> to Improve Performance for Lithium-Ion Batteries. <i>Nanomaterials</i> , 2022, 12, 1324.	1.9	8
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1262	Boosting Lithium Storage in Grapheneâ€“sandwiched Cathodes Containing Multiâ€“Carbonyl Polyquinoneimine Nanosheets. <i>Energy and Environmental Materials</i> , 2023, 6, .	7.3	7
1263	Thickness dependence of high volumetric energy density lithium ion battery based on Snâ€“Zn eutectic alloy foil anode. <i>Ionics</i> , 2022, 28, 2685-2692.	1.2	4
1264	Nonlinear health evaluation for lithium-ion battery within full-lifespan. <i>Journal of Energy Chemistry</i> , 2022, 72, 333-341.	7.1	69
1265	Influence of external pressure on silicon electrodes in lithium-ion cells. <i>Electrochimica Acta</i> , 2022, 419, 140354.	2.6	9
1266	Phosphorusâ€“Based Anodes for Fast Charging Lithiumâ€“Ion Batteries: Challenges and Opportunities. <i>Small Science</i> , 2022, 2, .	5.8	25
1267	Health factor analysis and remaining useful life prediction for batteries based on a cross-cycle health factor clustering framework. <i>Journal of Energy Storage</i> , 2022, 50, 104661.	3.9	2
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1286	Assessment of optimization strategies for battery electrode active particles based on chemo-mechanical analysis. <i>Journal of Electrochemical Energy Conversion and Storage</i> , 0, , 1-26.	1.1	0
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1319	A greyscale erosion algorithm for tomography (GREAT) to rapidly detect battery particle defects. <i>Npj Materials Degradation</i> , 2022, 6, .	2.6	3
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1329	Carbon binder domain networks and electrical conductivity in lithium-ion battery electrodes: A critical review. <i>Renewable and Sustainable Energy Reviews</i> , 2022, 166, 112624.	8.2	41
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1551	Long-Range Cationic Disorder Induces two Distinct Degradation Pathways in Co-Free Ni-Rich Layered Cathodes. <i>Angewandte Chemie</i> , 0, , .	1.6	2
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