Ji-Guang Zhang

List of Publications by Year
in descending order

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232 papers	49,902 citations	1368 108 h-index	1561 217 g-index
238 all docs	238 docs citations	238 times ranked	22150 citing authors

#	Article	IF	Citations
1	Nonsacrificial Additive for Tuning the Cathodeâ€“Electrolyte Interphase of Lithium-Ion Batteries. ACS Applied Materials & Interfaces, 2022, 14, 4111-4118.	4.0	8
2	Interfacial-engineering-enabled practical low-temperature sodium metal battery. Nature Nanotechnology, 2022, 17, 269-277.	15.6	69
3	Low-solvation electrolytes for high-voltage sodium-ion batteries. Nature Energy, 2022, 7, 718-725.	19.8	137
4	Effects of Fluorinated Diluents in Localized Highâ€Concentration Electrolytes for Lithiumâ€“Oxygen Batteries. Advanced Functional Materials, 2021, 31, 2002927.	7.8	39
5	Optimization of fluorinated orthoformate based electrolytes for practical high-voltage lithium metal batteries. Energy Storage Materials, 2021, 34, 76-84.	9.5	65
6	Electrolytes for Lithium-Ion and Lithium Metal Batteries. , 2021, , .		0
7	Rational Design of Electrolytes for Long-Term Cycling of Si Anodes over a Wide Temperature Range. ACS Energy Letters, 2021, 6, 387-394.	8.8	58
8	Reviewâ€”Localized High-Concentration Electrolytes for Lithium Batteries. Journal of the Electrochemical Society, 2021, 168, 010522.	1.3	257
9	Influence of diluent concentration in localized high concentration electrolytes: elucidation of hidden diluent-Li⁺ interactions and Li⁺ transport mechanism. Journal of Materials Chemistry A, 2021, 9, 17459-17473.	5.2	28
10	Effects of fluorinated solvents on electrolyte solvation structures and electrode/electrolyte interphases for lithium metal batteries. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	131
11	Stabilizing ultrahigh-nickel layered oxide cathodes for high-voltage lithium metal batteries. Materials Today, 2021, 44, 15-24.	8.3	53
12	Robust Solid/Electrolyte Interphase (SEI) Formation on Si Anodes Using Glyme-Based Electrolytes. ACS Energy Letters, 2021, 6, 1684-1693.	8.8	87
13	Optimization of Magnesiumâ€Doped Lithium Metal Anode for High Performance Lithium Metal Batteries through Modeling and Experiment. Angewandte Chemie, 2021, 133, 16642-16649.	1.6	5
14	A review on the stability and surface modification of layered transition-metal oxide cathodes. Materials Today, 2021, 46, 155-182.	8.3	132
15	Balancing interfacial reactions to achieve long cycle life in high-energy lithium metal batteries. Nature Energy, 2021, 6, 723-732.	19.8	285
16	Optimization of Magnesiumâ€Doped Lithium Metal Anode for High Performance Lithium Metal Batteries through Modeling and Experiment. Angewandte Chemie - International Edition, 2021, 60, 16506-16513.	7.2	28
17	A Polymer-in-Salt Electrolyte with Enhanced Oxidative Stability for Lithium Metal Polymer Batteries. ACS Applied Materials & Interfaces, 2021, 13, 31583-31593.	4.0	28
18	Progressive growth of the solidâ€“electrolyte interphase towards the Si anode interior causes capacity fading. Nature Nanotechnology, 2021, 16, 1113-1120.	15.6	147

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19	A Micrometerâ€Sized Silicon/Carbon Composite Anode Synthesized by Impregnation of Petroleum Pitch in Nanoporous Silicon. Advanced Materials, 2021, 33, e2103095.	11.1	99
20	Stable Solid Electrolyte Interphase Layer Formed by Electrochemical Pretreatment of Gel Polymer Coating on Li Metal Anode for Lithiumâ€“Oxygen Batteries. ACS Energy Letters, 2021, 6, 3321-3331.	8.8	17
21	Recent Progress in Understanding Solid Electrolyte Interphase on Lithium Metal Anodes. Advanced Energy Materials, 2021, 11, 2003092.	10.2	271
22	Quantitatively analyzing the failure processes of rechargeable Li metal batteries. Science Advances, 2021, 7, eabj3423.	4.7	84
23	Highly stable Ni-rich layered oxide cathode enabled by a thick protective layer with bio-tissue structure. Energy Storage Materials, 2020, 24, 291-296.	9.5	51
24	Thermodynamics of Antisite Defects in Layered NMC Cathodes: Systematic Insights from High-Precision Powder Diffraction Analyses. Chemistry of Materials, 2020, 32, 1002-1010.	3.2	44
25	Atomic to Nanoscale Origin of Vinylene Carbonate Enhanced Cycling Stability of Lithium Metal Anode Revealed by Cryo-Transmission Electron Microscopy. Nano Letters, 2020, 20, 418-425.	4.5	102
26	Reversible Electrochemical Interface of Mg Metal and Conventional Electrolyte Enabled by Intermediate Adsorption. ACS Energy Letters, 2020, 5, 200-206.	8.8	44
27	Unravelling high-temperature stability of lithium-ion battery with lithium-rich oxide cathode in localized high-concentration electrolyte. Journal of Power Sources Advances, 2020, 5, 100024.	2.6	23
28	Controlling Ion Coordination Structure and Diffusion Kinetics for Optimized Electrode-Electrolyte Interphases and High-Performance Si Anodes. Chemistry of Materials, 2020, 32, 8956-8964.	3.2	24
29	Lithium Metal Anodes with Nonaqueous Electrolytes. Chemical Reviews, 2020, 120, 13312-13348.	23.0	393
30	Lithium Dendrite Suppression with a Silica Nanoparticle-Dispersed Colloidal Electrolyte. ACS Applied Materials & Interfaces, 2020, 12, 37188-37196.	4.0	27
31	Glassy Li metal anode for high-performance rechargeable Li batteries. Nature Materials, 2020, 19, 1339-1345.	13.3	162
32	Highly Reversible Sodium Ion Batteries Enabled by Stable Electrolyte-Electrode Interphases. ACS Energy Letters, 2020, 5, 3212-3220.	8.8	97
33	Reversible planar gliding and microcracking in a single-crystalline Ni-rich cathode. Science, 2020, 370, 1313-1317.	6.0	472
34	Role of inner solvation sheath within saltâ€“solvent complexes in tailoring electrode/electrolyte interphases for lithium metal batteries. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 28603-28613.	3.3	191
35	Designing Advanced In Situ Electrode/Electrolyte Interphases for Wide Temperature Operation of 4.5 V Li||LiCoO₂ Batteries. Advanced Materials, 2020, 32, e2004898.	11.1	123
36	Tuning the Anodeâ€“Electrolyte Interface Chemistry for Garnetâ€Based Solidâ€State Li Metal Batteries. Advanced Materials, 2020, 32, e2000030.	11.1	156

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37	Optimized Electrolyte with High Electrochemical Stability and Oxygen Solubility for Lithiumâ€“Oxygen and Lithiumâ€“Air Batteries. ACS Energy Letters, 2020, 5, 2182-2190.	8.8	45
38	Sweeping potential regulated structural and chemical evolution of solid-electrolyte interphase on Cu and Li as revealed by cryo-TEM. Nano Energy, 2020, 76, 105040.	8.2	16
39	Hierarchical porous silicon structures with extraordinary mechanical strength as high-performance lithium-ion battery anodes. Nature Communications, 2020, 11, 1474.	5.8	298
40	Optimized Al Doping Improves Both Interphase Stability and Bulk Structural Integrity of Ni-Rich NMC Cathode Materials. ACS Applied Energy Materials, 2020, 3, 3369-3377.	2.5	66
41	The Role of Secondary Particle Structures in Surface Phase Transitions of Ni-Rich Cathodes. Chemistry of Materials, 2020, 32, 2884-2892.	3.2	60
42	Current Density Regulated Atomic to Nanoscale Process on Li Deposition and Solid Electrolyte Interphase Revealed by Cryogenic Transmission Electron Microscopy. ACS Nano, 2020, 14, 8766-8775.	7.3	54
43	Progress and perspectives on pre-lithiation technologies for lithium ion capacitors. Energy and Environmental Science, 2020, 13, 2341-2362.	15.6	142
44	Localized High Concentration Electrolytes for High Voltage Lithiumâ€“Metal Batteries: Correlation between the Electrolyte Composition and Its Reductive/Oxidative Stability. Chemistry of Materials, 2020, 32, 5973-5984.	3.2	97
45	Unlocking the passivation nature of the cathodeâ€“air interfacial reactions in lithium ion batteries. Nature Communications, 2020, 11, 3204.	5.8	55
46	Understanding and applying coulombic efficiency in lithium metal batteries. Nature Energy, 2020, 5, 561-568.	19.8	526
47	A lithium-sulfur battery with a solution-mediated pathway operating under lean electrolyte conditions. Nano Energy, 2020, 76, 105041.	8.2	25
48	Improving Lithium Metal Composite Anodes with Seeding and Pillaring Effects of Silicon Nanoparticles. ACS Nano, 2020, 14, 4601-4608.	7.3	61
49	Excellent Cycling Stability of Sodium Anode Enabled by a Stable Solid Electrolyte Interphase Formed in Etherâ€Based Electrolytes. Advanced Functional Materials, 2020, 30, 2001151.	7.8	60
50	Highâ€Power Lithium Metal Batteries Enabled by Highâ€Concentration Acetonitrileâ€Based Electrolytes with Vinylene Carbonate Additive. Advanced Functional Materials, 2020, 30, 2001285.	7.8	121
51	Advanced Electrolytes for Fastâ€Charging Highâ€Voltage Lithiumâ€Ion Batteries in Wideâ€Temperature Range. Advanced Energy Materials, 2020, 10, 2000368.	10.2	159
52	Anode-less. Nature Energy, 2019, 4, 637-638.	19.8	56
53	Highâ€Performance Silicon Anodes Enabled By Nonflammable Localized Highâ€Concentration Electrolytes. Advanced Energy Materials, 2019, 9, 1900784.	10.2	175
54	Enabling High-Voltage Lithium-Metal Batteries under Practical Conditions. Joule, 2019, 3, 1662-1676.	11.7	598

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55	Enhanced Stability of Li Metal Anodes by Synergetic Control of Nucleation and the Solid Electrolyte Interphase. Advanced Energy Materials, 2019, 9, 1901764.	10.2	108
56	Polymerâ€inâ€âˆœQuasiâ€Ionic Liquidâ€•Electrolytes for Highâ€Voltage Lithium Metal Batteries. Advanced Energy Materials, 2019, 9, 1902108.	10.2	65
57	Origin of lithium whisker formation and growth under stress. Nature Nanotechnology, 2019, 14, 1042-1047.	15.6	211
58	Monolithic solidâ€“electrolyte interphases formed in fluorinated orthoformate-based electrolytes minimize Li depletion and pulverization. Nature Energy, 2019, 4, 796-805.	19.8	621
59	Nonflammable Electrolytes for Lithium Ion Batteries Enabled by Ultraconformal Passivation Interphases. ACS Energy Letters, 2019, 4, 2529-2534.	8.8	112
60	Constructing Robust Electrode/Electrolyte Interphases to Enable Wide Temperature Applications of Lithium-Ion Batteries. ACS Applied Materials & Interfaces, 2019, 11, 21496-21505.	4.0	44
61	High-energy lithium metal pouch cells with limited anode swelling and long stable cycles. Nature Energy, 2019, 4, 551-559.	19.8	492
62	Injection of oxygen vacancies in the bulk lattice of layered cathodes. Nature Nanotechnology, 2019, 14, 602-608.	15.6	321
63	Self-smoothing anode for achieving high-energy lithium metal batteries under realistic conditions. Nature Nanotechnology, 2019, 14, 594-601.	15.6	451
64	High-Concentration Ether Electrolytes for Stable High-Voltage Lithium Metal Batteries. ACS Energy Letters, 2019, 4, 896-902.	8.8	302
65	Highly Stable Oxygen Electrodes Enabled by Catalyst Redistribution through an In Situ Electrochemical Method. Advanced Energy Materials, 2019, 9, 1803598.	10.2	6
66	Pathways for practical high-energy long-cycling lithium metal batteries. Nature Energy, 2019, 4, 180-186.	19.8	2,101
67	Critical Parameters for Evaluating Coin Cells and Pouch Cells of Rechargeable Li-Metal Batteries. Joule, 2019, 3, 1094-1105.	11.7	358
68	A highly stable host for lithium metal anode enabled by Li9Al4-Li3N-AlN structure. Nano Energy, 2019, 59, 110-119.	8.2	39
69	Localized high concentration electrolyte behavior near a lithiumâ€“metal anode surface. Journal of Materials Chemistry A, 2019, 7, 25047-25055.	5.2	81
70	Highly efficient Ru/B4C multifunctional oxygen electrode for rechargeable Li O2 batteries. Journal of Power Sources, 2019, 413, 11-19.	4.0	28
71	Addressing Passivation in Lithiumâ€“Sulfur Battery Under Lean Electrolyte Condition. Advanced Functional Materials, 2018, 28, 1707234.	7.8	143
72	Stability of polymeric separators in lithium metal batteries in a low voltage environment. Journal of Materials Chemistry A, 2018, 6, 5006-5015.	5.2	31

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73	Advancing Lithium Metal Batteries. Joule, 2018, 2, 833-845.	11.7	1,052
74	Dendriteâ€Free and Performanceâ€Enhanced Lithium Metal Batteries through Optimizing Solvent Compositions and Adding Combinational Additives. Advanced Energy Materials, 2018, 8, 1703022.	10.2	123
75	Effects of Imideâ€“Orthoborate Dual-Salt Mixtures in Organic Carbonate Electrolytes on the Stability of Lithium Metal Batteries. ACS Applied Materials & Interfaces, 2018, 10, 2469-2479.	4.0	110
76	Enhanced Cyclability of Lithiumâ€“Oxygen Batteries with Electrodes Protected by Surface Films Induced via In Situ Electrochemical Process. Advanced Energy Materials, 2018, 8, 1702340.	10.2	38
77	Direct Observation of the Growth of Lithium Dendrites on Graphite Anodes by Operando ECâ€AFM. Small Methods, 2018, 2, 1700298.	4.6	133
78	Hierarchically Porous Carbon Materials for CO₂ Capture: The Role of Pore Structure. Industrial & Engineering Chemistry Research, 2018, 57, 1262-1268.	1.8	83
79	Enhanced Stability of Lithium Metal Anode by using a 3D Porous Nickel Substrate. ChemElectroChem, 2018, 5, 761-769.	1.7	58
80	Mechanism of Formation of Li₇P₃S₁₁ Solid Electrolytes through Liquid Phase Synthesis. Chemistry of Materials, 2018, 30, 990-997.	3.2	118
81	Extremely Stable Sodium Metal Batteries Enabled by Localized High-Concentration Electrolytes. ACS Energy Letters, 2018, 3, 315-321.	8.8	373
82	Simultaneous Stabilization of LiNi_{0.76}Mn_{0.14}Co_{0.10}O₂ Cathode and Lithium Metal Anode by Lithium Bis(oxalato)borate as Additive. ChemSusChem, 2018, 11, 2211-2220.	3.6	89
83	Effect of calcination temperature on the electrochemical properties of nickel-rich LiNi0.76Mn0.14Co0.10O2 cathodes for lithium-ion batteries. Nano Energy, 2018, 49, 538-548.	8.2	213
84	High Voltage Operation of Niâ€Rich NMC Cathodes Enabled by Stable Electrode/Electrolyte Interphases. Advanced Energy Materials, 2018, 8, 1800297.	10.2	298
85	Lifecycle comparison of selected Li-ion battery chemistries under grid and electric vehicle duty cycle combinations. Journal of Power Sources, 2018, 380, 185-193.	4.0	49
86	Highâ€Voltage Lithiumâ€Metal Batteries Enabled by Localized Highâ€Concentration Electrolytes. Advanced Materials, 2018, 30, e1706102.	11.1	761
87	Accurate Determination of Coulombic Efficiency for Lithium Metal Anodes and Lithium Metal Batteries. Advanced Energy Materials, 2018, 8, 1702097.	10.2	704
88	Behavior of Lithium Metal Anodes under Various Capacity Utilization and High Current Density in Lithium Metal Batteries. Joule, 2018, 2, 110-124.	11.7	280
89	Guided Lithium Metal Deposition and Improved Lithium Coulombic Efficiency through Synergistic Effects of LiAsF₆ and Cyclic Carbonate Additives. ACS Energy Letters, 2018, 3, 14-19.	8.8	161
90	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

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91	Solidâ€“Liquid Interfacial Reaction Trigged Propagation of Phase Transition from Surface into Bulk Lattice of Ni-Rich Layered Cathode. Chemistry of Materials, 2018, 30, 7016-7026.	3.2	80
92	Extending the limits of powder diffraction analysis: Diffraction parameter space, occupancy defects, and atomic form factors. Review of Scientific Instruments, 2018, 89, 093002.	0.6	18
93	Revealing Cycling Rate-Dependent Structure Evolution in Ni-Rich Layered Cathode Materials. ACS Energy Letters, 2018, 3, 2433-2440.	8.8	92
94	Lean Electrolyte Batteries: Addressing Passivation in Lithiumâ€“Sulfur Battery Under Lean Electrolyte Condition (Adv. Funct. Mater. 38/2018). Advanced Functional Materials, 2018, 28, 1870275.	7.8	5
95	The Effect of Solvent on the Capacity Retention in a Germanium Anode for Lithium Ion Batteries. Journal of Electrochemical Energy Conversion and Storage, 2018, 15, .	1.1	4
96	Electrode Edge Effects and the Failure Mechanism of Lithiumâ€Metal Batteries. ChemSusChem, 2018, 11, 3821-3828.	3.6	35
97	High-Efficiency Lithium Metal Batteries with Fire-Retardant Electrolytes. Joule, 2018, 2, 1548-1558.	11.7	436
98	A novel approach to synthesize micrometer-sized porous silicon as a high performance anode for lithium-ion batteries. Nano Energy, 2018, 50, 589-597.	8.2	191
99	Lithiumâ€Metal Batteries: Highâ€Voltage Lithiumâ€Metal Batteries Enabled by Localized Highâ€Concentration Electrolytes (Adv. Mater. 21/2018). Advanced Materials, 2018, 30, 1870144.	11.1	4
100	Non-flammable electrolytes with high salt-to-solvent ratios for Li-ion and Li-metal batteries. Nature Energy, 2018, 3, 674-681.	19.8	557
101	Stable cycling of high-voltage lithium metal batteries in ether electrolytes. Nature Energy, 2018, 3, 739-746.	19.8	767
102	Coupling of electrochemically triggered thermal and mechanical effects to aggravate failure in a layered cathode. Nature Communications, 2018, 9, 2437.	5.8	200
103	Tailoring grain boundary structures and chemistry of Ni-rich layered cathodes for enhanced cycle stability of lithium-ion batteries. Nature Energy, 2018, 3, 600-605.	19.8	613
104	A Localized High-Concentration Electrolyte with Optimized Solvents and Lithium Difluoro(oxalate)borate Additive for Stable Lithium Metal Batteries. ACS Energy Letters, 2018, 3, 2059-2067.	8.8	257
105	Tailored Reaction Route by Micropore Confinement for Liâ€“S Batteries Operating under Lean Electrolyte Conditions. Advanced Energy Materials, 2018, 8, 1800590.	10.2	55
106	Observation of Solid-Liquid Interfacial Reactions Controlled Bulk Phase Transition of Ni-rich Layered Cathode. Microscopy and Microanalysis, 2018, 24, 1522-1523.	0.2	1
107	Minimizing Polysulfide Shuttle Effect in Lithium-Ion Sulfur Batteries by Anode Surface Passivation. ACS Applied Materials & Interfaces, 2018, 10, 21965-21972.	4.0	18
108	Enabling High-Energy-Density Cathode for Lithiumâ€“Sulfur Batteries. ACS Applied Materials & Interfaces, 2018, 10, 23094-23102.	4.0	67

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109	Localized High-Concentration Sulfone Electrolytes for High-Efficiency Lithium-Metal Batteries. CheM, 2018, 4, 1877-1892.	5.8	628
110	B4C as a stable non-carbon-based oxygen electrode material for lithium-oxygen batteries. Nano Energy, 2017, 33, 195-204.	8.2	65
111	Intragranular cracking as a critical barrier for high-voltage usage of layer-structured cathode for lithium-ion batteries. Nature Communications, 2017, 8, 14101.	5.8	654
112	Stabilization of Li Metal Anode in DMSOâ€Based Electrolytes via Optimization of Saltâ€“Solvent Coordination for Liâ€“O₂ Batteries. Advanced Energy Materials, 2017, 7, 1602605.	10.2	99
113	Electrolyte additive enabled fast charging and stable cycling lithium metal batteries. Nature Energy, 2017, 2, .	19.8	1,048
114	Formation of Reversible Solid Electrolyte Interface on Graphite Surface from Concentrated Electrolytes. Nano Letters, 2017, 17, 1602-1609.	4.5	91
115	Complete Decomposition of Li₂CO₃ in Liâ€“O₂ Batteries Using Ir/B₄C as Noncarbon-Based Oxygen Electrode. Nano Letters, 2017, 17, 1417-1424.	4.5	104
116	Atomic Resolution Structural and Chemical Imaging Revealing the Sequential Migration of Ni, Co, and Mn upon the Battery Cycling of Layered Cathode. Nano Letters, 2017, 17, 3946-3951.	4.5	143
117	Design of porous Si/Câ€“graphite electrodes with long cycle stability and controlled swelling. Energy and Environmental Science, 2017, 10, 1427-1434.	15.6	140
118	Improving Lithiumâ€“Sulfur Battery Performance under Lean Electrolyte through Nanoscale Confinement in Soft Swellable Gels. Nano Letters, 2017, 17, 3061-3067.	4.5	122
119	Wide-Temperature Electrolytes for Lithium-Ion Batteries. ACS Applied Materials & Interfaces, 2017, 9, 18826-18835.	4.0	150
120	Revealing the reaction mechanisms of Liâ€“O2 batteries using environmental transmission electron microscopy. Nature Nanotechnology, 2017, 12, 535-539.	15.6	160
121	Multinuclear NMR Study of the Solid Electrolyte Interface Formed in Lithium Metal Batteries. ACS Applied Materials & Interfaces, 2017, 9, 14741-14748.	4.0	47
122	A reliable sealing method for microbatteries. Journal of Power Sources, 2017, 341, 443-447.	4.0	1
123	Liâ€•and Mnâ€Rich Cathode Materials: Challenges to Commercialization. Advanced Energy Materials, 2017, 7, 1601284.	10.2	383
124	Imaging Electrochemical Processes in Li Batteries by Operando STEM. Microscopy and Microanalysis, 2017, 23, 1970-1971.	0.2	1
125	New Insights on the Structure of Electrochemically Deposited Lithium Metal and Its Solid Electrolyte Interphases via Cryogenic TEM. Nano Letters, 2017, 17, 7606-7612.	4.5	308
126	Temperature Dependence of the Oxygen Reduction Mechanism in Nonaqueous Liâ€“O₂ Batteries. ACS Energy Letters, 2017, 2, 2525-2530.	8.8	30

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127	Suppressing Lithium Dendrite Growth by Metallic Coating on a Separator. Advanced Functional Materials, 2017, 27, 1704391.	7.8	141
128	Non-encapsulation approach for high-performance Liâ€“S batteries through controlled nucleation and growth. Nature Energy, 2017, 2, 813-820.	19.8	326
129	Effects of Anion Mobility on Electrochemical Behaviors of Lithiumâ€“Sulfur Batteries. Chemistry of Materials, 2017, 29, 9023-9029.	3.2	35
130	Hierarchically Porous Graphitic Carbon with Simultaneously High Surface Area and Colossal Pore Volume Engineered via Ice Templating. ACS Nano, 2017, 11, 11047-11055.	7.3	69
131	Long term stability of Li-S batteries using high concentration lithium nitrate electrolytes. Nano Energy, 2017, 40, 607-617.	8.2	160
132	Lithiumâ€Oxygen Batteries: Stabilization of Li Metal Anode in DMSOâ€Based Electrolytes via Optimization of Saltâ€“Solvent Coordination for Liâ€“O₂ Batteries (Adv. Energy Mater. 14/2017). Advanced Energy Materials, 2017, 7, .	10.2	11
133	Li⁺-Desolvation Dictating Lithium-Ion Batteryâ€™s Low-Temperature Performances. ACS Applied Materials & Interfaces, 2017, 9, 42761-42768.	4.0	200
134	Lithium Self-Discharge and Its Prevention: Direct Visualization through In Situ Electrochemical Scanning Transmission Electron Microscopy. ACS Nano, 2017, 11, 11194-11205.	7.3	53
135	Lithium Metal Anodes and Rechargeable Lithium Metal Batteries. Springer Series in Materials Science, 2017, , .	0.4	70
136	Characterization and Modeling of Lithium Dendrite Growth. Springer Series in Materials Science, 2017, , 5-43.	0.4	9
137	High Coulombic Efficiency of Lithium Plating/Stripping and Lithium Dendrite Prevention. Springer Series in Materials Science, 2017, , 45-152.	0.4	3
138	Application of Lithium Metal Anodes. Springer Series in Materials Science, 2017, , 153-188.	0.4	1
139	Enhanced Cycling Stability of Rechargeable Liâ€“O₂ Batteries Using Highâ€Concentration Electrolytes. Advanced Functional Materials, 2016, 26, 605-613.	7.8	104
140	Highly Stable Operation of Lithium Metal Batteries Enabled by the Formation of a Transient Highâ€Concentration Electrolyte Layer. Advanced Energy Materials, 2016, 6, 1502151.	10.2	236
141	Lithium Metal Batteries: Highly Stable Operation of Lithium Metal Batteries Enabled by the Formation of a Transient Highâ€Concentration Electrolyte Layer (Adv. Energy Mater. 8/2016). Advanced Energy Materials, 2016, 6, .	10.2	1
142	Electrochemically Formed Ultrafine Metal Oxide Nanocatalysts for High-Performance Lithiumâ€“Oxygen Batteries. Nano Letters, 2016, 16, 4932-4939.	4.5	62
143	Ni and Co Segregations on Selective Surface Facets and Rational Design of Layered Lithium Transitionâ€Metal Oxide Cathodes. Advanced Energy Materials, 2016, 6, 1502455.	10.2	100
144	Effect of the Anion Activity on the Stability of Li Metal Anodes in Lithiumâ€Sulfur Batteries. Advanced Functional Materials, 2016, 26, 3059-3066.	7.8	117

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145	Investigating Side Reactions and Coating Effects on High Voltage Layered Cathodes for Lithium Ion Batteries. Microscopy and Microanalysis, 2016, 22, 1312-1313.	0.2	0
146	Enhanced charging capability of lithium metal batteries based on lithium bis(trifluoromethanesulfonyl)imide-lithium bis(oxalato)borate dual-salt electrolytes. Journal of Power Sources, 2016, 318, 170-177.	4.0	186
147	Enabling room temperature sodium metal batteries. Nano Energy, 2016, 30, 825-830.	8.2	248
148	The roles of oxygen non-stoichiometry on the electrochemical properties of oxide-based cathode materials. Nano Today, 2016, 11, 678-694.	6.2	72
149	Hard carbon coated nano-Si/graphite composite as a high performance anode for Li-ion batteries. Journal of Power Sources, 2016, 329, 323-329.	4.0	73
150	Anodeâ€Free Rechargeable Lithium Metal Batteries. Advanced Functional Materials, 2016, 26, 7094-7102.	7.8	495
151	A Review of Solid Electrolyte Interphases on Lithium Metal Anode. Advanced Science, 2016, 3, 1500213.	5.6	1,306
152	Dendrites and Pits: Untangling the Complex Behavior of Lithium Metal Anodes through Operando Video Microscopy. ACS Central Science, 2016, 2, 790-801.	5.3	662
153	The Impact of Li Grain Size on Coulombic Efficiency in Li Batteries. Scientific Reports, 2016, 6, 34267.	1.6	67
154	Understanding the Effect of Additives in Li-ion and Li-Sulfur Batteries by Operando ec- (S)TEM. Microscopy and Microanalysis, 2016, 22, 22-23.	0.2	5
155	Tunable Oxygen Functional Groups as Electrocatalysts on Graphite Felt Surfaces for Allâ€Vanadium Flow Batteries. ChemSusChem, 2016, 9, 1455-1461.	3.6	66
156	Cathode Materials: Ni and Co Segregations on Selective Surface Facets and Rational Design of Layered Lithium Transition-Metal Oxide Cathodes (Adv. Energy Mater. 9/2016). Advanced Energy Materials, 2016, 6, .	10.2	2
157	Ultrathin Li₄Ti₅O₁₂ Nanosheets as Anode Materials for Lithium and Sodium Storage. ACS Applied Materials & Interfaces, 2016, 8, 16718-16726.	4.0	87
158	Pursuing two-dimensional nanomaterials for flexible lithium-ion batteries. Nano Today, 2016, 11, 82-97.	6.2	73
159	Effects of Propylene Carbonate Content in CsPF₆-Containing Electrolytes on the Enhanced Performances of Graphite Electrode for Lithium-Ion Batteries. ACS Applied Materials & Interfaces, 2016, 8, 5715-5722.	4.0	43
160	Natural abundance 17O, 6Li NMR and molecular modeling studies of the solvation structures of lithium bis(fluorosulfonyl)imide/1,2-dimethoxyethane liquid electrolytes. Journal of Power Sources, 2016, 307, 231-243.	4.0	58
161	A stable nanoporous silicon anode prepared by modified magnesiothermic reactions. Nano Energy, 2016, 20, 68-75.	8.2	65
162	Atomic to Nanoscale Investigation of Functionalities of an Al₂O₃ Coating Layer on a Cathode for Enhanced Battery Performance. Chemistry of Materials, 2016, 28, 857-863.	3.2	125

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