

# Vanchiappan Aravindan

## List of Publications by Citations

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

237 papers	12,050 citations	63 h-index	100 g-index
247 ext. papers	13,514 ext. citations	8.5 avg, IF	7.03 L-index

#	Paper	IF	Citations
237	Insertion-type electrodes for nonaqueous Li-ion capacitors. <i>Chemical Reviews</i> , <b>2014</b> , 114, 11619-35	68.1	533
236	Research Progress on Negative Electrodes for Practical Li-Ion Batteries: Beyond Carbonaceous Anodes. <i>Advanced Energy Materials</i> , <b>2015</b> , 5, 1402225	21.8	361
235	LiMnPO <sub>4</sub> A next generation cathode material for lithium-ion batteries. <i>Journal of Materials Chemistry A</i> , <b>2013</b> , 1, 3518	13	342
234	3D micro-porous conducting carbon beehive by single step polymer carbonization for high performance supercapacitors: the magic of in situ porogen formation. <i>Energy and Environmental Science</i> , <b>2014</b> , 7, 728-735	35.4	304
233	Lithium-ion conducting electrolyte salts for lithium batteries. <i>Chemistry - A European Journal</i> , <b>2011</b> , 17, 14326-46	4.8	268
232	Recent Advancements in All-Vanadium Redox Flow Batteries. <i>Advanced Materials Interfaces</i> , <b>2016</b> , 3, 1500309	4.6	253
231	Synthesis of CuO nanostructures from Cu-based metal organic framework (MOF-199) for application as anode for Li-ion batteries. <i>Nano Energy</i> , <b>2013</b> , 2, 1158-1163	17.1	217
230	Carbon coated nano-LiTi <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> electrodes for non-aqueous hybrid supercapacitors. <i>Physical Chemistry Chemical Physics</i> , <b>2012</b> , 14, 5808-14	3.6	213
229	Activated carbons derived from coconut shells as high energy density cathode material for Li-ion capacitors. <i>Scientific Reports</i> , <b>2013</b> , 3, 3002	4.9	195
228	Hybrid supercapacitor with nano-TiP <sub>2</sub> O <sub>7</sub> as intercalation electrode. <i>Journal of Power Sources</i> , <b>2011</b> , 196, 8850-8854	8.9	185
227	High Aspect Ratio Electrospun CuO Nanofibers as Anode Material for Lithium-Ion Batteries with Superior Cycleability. <i>Journal of Physical Chemistry C</i> , <b>2012</b> , 116, 18087-18092	3.8	175
226	Electrospun TiO <sub>2</sub> /Graphene Composite Nanofibers as a Highly Durable Insertion Anode for Lithium Ion Batteries. <i>Journal of Physical Chemistry C</i> , <b>2012</b> , 116, 14780-14788	3.8	171
225	Electrospun NiO nanofibers as high performance anode material for Li-ion batteries. <i>Journal of Power Sources</i> , <b>2013</b> , 227, 284-290	8.9	164
224	High power lithium-ion hybrid electrochemical capacitors using spinel LiCrTiO <sub>4</sub> as insertion electrode. <i>Journal of Materials Chemistry</i> , <b>2012</b> , 22, 16026		152
223	Flexible Solid-State Asymmetric Supercapacitors Based on Nitrogen-Doped Graphene Encapsulated Ternary Metal-Nitrides with Ultralong Cycle Life. <i>Advanced Functional Materials</i> , <b>2018</b> , 28, 1804663	15.6	148
222	MOF-derived crumpled-sheet-assembled perforated carbon cuboids as highly effective cathode active materials for ultra-high energy density Li-ion hybrid electrochemical capacitors (Li-HECs). <i>Nanoscale</i> , <b>2014</b> , 6, 4387-94	7.7	144
221	Hierarchical Ni <sub>3</sub> Mo <sub>2</sub> S and Ni <sub>3</sub> Fe <sub>2</sub> S Nanosheets with Ultrahigh Energy Density for Flexible All Solid-State Supercapacitors. <i>Advanced Functional Materials</i> , <b>2018</b> , 28, 1803287	15.6	141

220	Morphology, structure and electrochemical properties of single phase electrospun vanadium pentoxide nanofibers for lithium ion batteries. <i>Journal of Power Sources</i> , <b>2011</b> , 196, 6465-6472	8.9	140
219	Constructing high energy density non-aqueous Li-ion capacitors using monoclinic TiO <sub>2</sub> -B nanorods as insertion host. <i>Journal of Materials Chemistry A</i> , <b>2013</b> , 1, 6145	13	133
218	Unveiling TiNb <sub>2</sub> O <sub>7</sub> as an insertion anode for lithium ion capacitors with high energy and power density. <i>ChemSusChem</i> , <b>2014</b> , 7, 1858-63	8.3	131
217	Electrospun nanofibers: a prospective electro-active material for constructing high performance Li-ion batteries. <i>Chemical Communications</i> , <b>2015</b> , 51, 2225-34	5.8	123
216	High energy asymmetric supercapacitor with 1D@2D structured NiCo <sub>2</sub> O <sub>4</sub> @Co <sub>3</sub> O <sub>4</sub> and jackfruit derived high surface area porous carbon. <i>Journal of Power Sources</i> , <b>2016</b> , 306, 248-257	8.9	122
215	Research progress in Na-ion capacitors. <i>Journal of Materials Chemistry A</i> , <b>2016</b> , 4, 7538-7548	13	121
214	Superior lithium storage properties of Fe <sub>2</sub> O <sub>3</sub> nano-assembled spindles. <i>Nano Energy</i> , <b>2013</b> , 2, 890-896	17.1	117
213	Fabrication of High Energy-Density Hybrid Supercapacitors Using Electrospun V <sub>2</sub> O <sub>5</sub> Nanofibers with a Self-Supported Carbon Nanotube Network. <i>ChemPlusChem</i> , <b>2012</b> , 77, 570-575	2.8	115
212	Two-Dimensional Mesoporous Cobalt Sulfide Nanosheets as a Superior Anode for a Li-Ion Battery and a Bifunctional Electrocatalyst for the Li <sub>2</sub> O <sub>2</sub> System. <i>Chemistry of Materials</i> , <b>2015</b> , 27, 5726-5735	9.6	113
211	Exceptional performance of TiNb <sub>2</sub> O <sub>7</sub> anode in all one-dimensional architecture by electrospinning. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2014</b> , 6, 8660-6	9.5	113
210	Developments and Perspectives in 3d Transition-Metal-Based Electrocatalysts for Neutral and Near-Neutral Water Electrolysis. <i>Advanced Energy Materials</i> , <b>2020</b> , 10, 1902666	21.8	113
209	Influence of carbon towards improved lithium storage properties of Li <sub>2</sub> MnSiO <sub>4</sub> cathodes. <i>Journal of Materials Chemistry</i> , <b>2011</b> , 21, 2470		112
208	Carbon supported, Al doped-Li <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> as a high rate cathode material for lithium-ion batteries. <i>Journal of Materials Chemistry</i> , <b>2012</b> , 22, 6556		111
207	A novel asymmetric hybrid supercapacitor based on Li <sub>2</sub> FeSiO <sub>4</sub> and activated carbon electrodes. <i>Journal of Alloys and Compounds</i> , <b>2010</b> , 504, 224-227	5.7	110
206	TiO <sub>2</sub> polymorphs in blocking-chair Li-ion batteries. <i>Materials Today</i> , <b>2015</b> , 18, 345-351	21.8	109
205	Construction of high-energy-density supercapacitors from pine-cone-derived high-surface-area carbons. <i>ChemSusChem</i> , <b>2014</b> , 7, 1435-42	8.3	105
204	Novel polymer electrolyte based on cob-web electrospun multi component polymer blend of polyacrylonitrile/poly(methyl methacrylate)/polystyrene for lithium ion batteries Preparation and electrochemical characterization. <i>Journal of Power Sources</i> , <b>2012</b> , 202, 299-307	8.9	103
203	Electrochemical performance of carbon-coated lithium manganese silicate for asymmetric hybrid supercapacitors. <i>Journal of Power Sources</i> , <b>2010</b> , 195, 3761-3764	8.9	103

202	Burgeoning Prospects of Spent Lithium-Ion Batteries in Multifarious Applications. <i>Advanced Energy Materials</i> , <b>2018</b> , 8, 1802303	21.8	100
201	Nanostructured spinel $\text{LiNi}_0.5\text{Mn}_{1.5}\text{O}_4$ as new insertion anode for advanced Li-ion capacitors with high power capability. <i>Nano Energy</i> , <b>2015</b> , 12, 69-75	17.1	98
200	Best Practices for Mitigating Irreversible Capacity Loss of Negative Electrodes in Li-Ion Batteries. <i>Advanced Energy Materials</i> , <b>2017</b> , 7, 1602607	21.8	96
199	All ternary metal selenide nanostructures for high energy flexible charge storage devices. <i>Nano Energy</i> , <b>2019</b> , 65, 103999	17.1	94
198	Adipic acid assisted sol-gel synthesis of $\text{Li}_2\text{MnSiO}_4$ nanoparticles with improved lithium storage properties. <i>Journal of Materials Chemistry</i> , <b>2010</b> , 20, 7340		90
197	Atomic layer deposited (ALD) $\text{SnO}_2$ anodes with exceptional cycleability for Li-ion batteries. <i>Nano Energy</i> , <b>2013</b> , 2, 720-725	17.1	88
196	Boosting the Energy Density of Flexible Solid-State Supercapacitors via Both Ternary $\text{NiV}_2\text{Se}_4$ and $\text{NiFe}_2\text{Se}_4$ Nanosheet Arrays. <i>Chemistry of Materials</i> , <b>2019</b> , 31, 4490-4504	9.6	87
195	Nonaqueous lithium-ion capacitors with high energy densities using trigol-reduced graphene oxide nanosheets as cathode-active material. <i>ChemSusChem</i> , <b>2013</b> , 6, 2240-4	8.3	87
194	Fluorine-doped $\text{Fe}_2\text{O}_3$ as high energy density electroactive material for hybrid supercapacitor applications. <i>Chemistry - an Asian Journal</i> , <b>2014</b> , 9, 852-7	4.5	85
193	Synthesis of porous $\text{LiMn}_2\text{O}_4$ hollow nanofibers by electrospinning with extraordinary lithium storage properties. <i>Chemical Communications</i> , <b>2013</b> , 49, 6677-9	5.8	83
192	Cu-doped $\text{P}_2\text{-Na}_{0.5}\text{Ni}_{0.33}\text{Mn}_{0.67}\text{O}_2$ encapsulated with MgO as a novel high voltage cathode with enhanced Na-storage properties. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 8408-8415	13	82
191	$\text{TiO}_2$ -reduced graphene oxide nanocomposites by microwave-assisted forced hydrolysis as excellent insertion anode for Li-ion battery and capacitor. <i>Journal of Power Sources</i> , <b>2016</b> , 327, 171-177	8.9	81
190	Synthesis of $\text{TiO}_2$ hollow nanofibers by co-axial electrospinning and its superior lithium storage capability in full-cell assembly with olivine phosphate. <i>Nanoscale</i> , <b>2013</b> , 5, 5973-80	7.7	80
189	Bio-mass derived mesoporous carbon as superior electrode in all vanadium redox flow battery with multicouple reactions. <i>Journal of Power Sources</i> , <b>2015</b> , 274, 846-850	8.9	78
188	Oligomer-salt derived 3D, heavily nitrogen doped, porous carbon for Li-ion hybrid electrochemical capacitors application. <i>Carbon</i> , <b>2014</b> , 80, 462-471	10.4	77
187	Improved elevated temperature performance of Al-intercalated $\text{V}_2\text{O}_5$ electrospun nanofibers for lithium-ion batteries. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2012</b> , 4, 3270-7	9.5	73
186	Electrochemical performance of cobalt free, $\text{Li}_{1.2}(\text{Mn}_{0.32}\text{Ni}_{0.32}\text{Fe}_{0.16})\text{O}_2$ cathodes for lithium batteries. <i>Electrochimica Acta</i> , <b>2012</b> , 68, 246-253	6.7	71
185	Preparation of $\text{LiCoPO}_4$ and $\text{LiFePO}_4$ coated $\text{LiCoPO}_4$ materials with improved battery performance. <i>Journal of Alloys and Compounds</i> , <b>2010</b> , 497, 321-324	5.7	70

184	Biomass-Derived Electrode for Next Generation Lithium-Ion Capacitors. <i>ChemSusChem</i> , <b>2016</b> , 9, 849-54	8.3	69
183	Preparation and electrochemical characterization of LiFePO <sub>4</sub> nanoparticles with high rate capability by a sol-gel method. <i>Journal of Alloys and Compounds</i> , <b>2010</b> , 491, 668-672	5.7	67
182	High-Energy Density Asymmetric Supercapacitor Based on Electrospun Vanadium Pentoxide and Polyaniline Nanofibers in Aqueous Electrolyte. <i>Journal of the Electrochemical Society</i> , <b>2012</b> , 159, A1481-A1488	3.9	66
181	An Urgent Call to Spent LIB Recycling: Whys and Wherefores for Graphite Recovery. <i>Advanced Energy Materials</i> , <b>2020</b> , 10, 2002238	21.8	66
180	Improving the energy density of Li-ion capacitors using polymer-derived porous carbons as cathode. <i>Electrochimica Acta</i> , <b>2014</b> , 130, 766-770	6.7	65
179	A novel strategy to construct high performance lithium-ion cells using one dimensional electrospun nanofibers, electrodes and separators. <i>Nanoscale</i> , <b>2013</b> , 5, 10636-45	7.7	65
178	Unveiling organic/inorganic hybrids as a cathode material for high performance lithium-ion capacitors. <i>Journal of Materials Chemistry A</i> , <b>2013</b> , 1, 707-714	13	65
177	Li-ion vs. Na-ion capacitors: A performance evaluation with coconut shell derived mesoporous carbon and natural plant based hard carbon. <i>Chemical Engineering Journal</i> , <b>2017</b> , 316, 506-513	14.7	64
176	Carbon-coated Li <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> as insertion type electrode for lithium-ion hybrid electrochemical capacitors: An evaluation of anode and cathodic performance. <i>Journal of Power Sources</i> , <b>2015</b> , 281, 310-317	8.9	64
175	A chemically bonded NaTi <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> /rGO microsphere composite as a high-rate insertion anode for sodium-ion capacitors. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 17506-17516	13	64
174	Unveiling two-dimensional TiS <sub>2</sub> as an insertion host for the construction of high energy Li-ion capacitors. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 9177-9181	13	62
173	Synthesis and enhanced lithium storage properties of electrospun V <sub>2</sub> O <sub>5</sub> nanofibers in full-cell assembly with a spinel Li <sub>4</sub> Ti <sub>5</sub> O <sub>12</sub> anode. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2013</b> , 5, 3475-80	9.5	59
172	Recycling Strategies for Spent Li-Ion Battery Mixed Cathodes. <i>ACS Energy Letters</i> , <b>2018</b> , 3, 2101-2103	20.1	58
171	From waste paper basket to solid state and Li-HEC ultracapacitor electrodes: a value added journey for shredded office paper. <i>Small</i> , <b>2014</b> , 10, 4395-402	11	58
170	Highly mesoporous carbon from Teak wood sawdust as prospective electrode for the construction of high energy Li-ion capacitors. <i>Electrochimica Acta</i> , <b>2017</b> , 228, 131-138	6.7	56
169	Template-free synthesis of carbon hollow spheres and reduced graphene oxide from spent lithium-ion batteries towards efficient gas storage. <i>Journal of Materials Chemistry A</i> , <b>2019</b> , 7, 3244-3252	13	53
168	Silica-assisted bottom-up synthesis of graphene-like high surface area carbon for highly efficient ultracapacitor and Li-ion hybrid capacitor applications. <i>Journal of Materials Chemistry A</i> , <b>2016</b> , 4, 5578-5591	13	52
167	Sol-gel synthesis of aliovalent vanadium-doped LiNi <sub>0.5</sub> Mn <sub>1.5</sub> O <sub>4</sub> cathodes with excellent performance at high temperatures. <i>ChemSusChem</i> , <b>2014</b> , 7, 829-34	8.3	52

166	Effect of LiBOB Additive on the Electrochemical Performance of LiCoPO <sub>4</sub> . <i>Journal of the Electrochemical Society</i> , <b>2012</b> , 159, A1435-A1439	3.9	52
165	Formation of NiCo <sub>2</sub> O <sub>4</sub> rods over Co <sub>3</sub> O <sub>4</sub> nanosheets as efficient catalyst for LiD <sub>2</sub> batteries and water splitting. <i>Journal of Catalysis</i> , <b>2017</b> , 349, 175-182	7.3	50
164	Size controlled synthesis of Li <sub>2</sub> MnSiO <sub>4</sub> nanoparticles: effect of calcination temperature and carbon content for high performance lithium batteries. <i>Journal of Colloid and Interface Science</i> , <b>2011</b> , 355, 472-793	7.3	49
163	Exceptional performance of a high voltage spinel LiNi <sub>0.5</sub> Mn <sub>1.5</sub> O <sub>4</sub> cathode in all one dimensional architectures with an anatase TiO <sub>2</sub> anode by electrospinning. <i>Nanoscale</i> , <b>2014</b> , 6, 8926-34	7.7	47
162	Extraordinary long-term cycleability of TiO <sub>2</sub> -B nanorods as anodes in full-cell assembly with electrospun PVdF-HFP membranes. <i>Journal of Materials Chemistry A</i> , <b>2013</b> , 1, 308-316	13	47
161	LiFePO <sub>4</sub> modified Li <sub>1.02</sub> (Co <sub>0.9</sub> Fe <sub>0.1</sub> ) <sub>0.98</sub> PO <sub>4</sub> cathodes with improved lithium storage properties. <i>Journal of Materials Chemistry</i> , <b>2011</b> , 21, 6510		47
160	High-rate and elevated temperature performance of electrospun V <sub>2</sub> O <sub>5</sub> nanofibers carbon-coated by plasma enhanced chemical vapour deposition. <i>Nano Energy</i> , <b>2013</b> , 2, 57-64	17.1	46
159	All carbon based high energy lithium-ion capacitors from biomass: The role of crystallinity. <i>Journal of Power Sources</i> , <b>2019</b> , 414, 96-102	8.9	45
158	Marine algae inspired pre-treated SnO <sub>2</sub> nanorods bundle as negative electrode for Li-ion capacitor and battery: An approach beyond intercalation. <i>Chemical Engineering Journal</i> , <b>2017</b> , 324, 26-34	14.7	44
157	Synthesis of 2D/2D Structured Mesoporous Co <sub>3</sub> O <sub>4</sub> Nanosheet/N-Doped Reduced Graphene Oxide Composites as a Highly Stable Negative Electrode for Lithium Battery Applications. <i>Chemistry - an Asian Journal</i> , <b>2015</b> , 10, 1776-83	4.5	44
156	Highly reversible water splitting cell building from hierarchical 3D nickel manganese oxyphosphide nanosheets. <i>Nano Energy</i> , <b>2020</b> , 69, 104432	17.1	44
155	Microwave assisted green synthesis of MgO/carbon nanotube composites as electrode material for high power and energy density supercapacitors. <i>Journal of Materials Chemistry A</i> , <b>2013</b> , 1, 4105	13	43
154	A novel gel electrolyte with lithium difluoro(oxalato)borate salt and Sb <sub>2</sub> O <sub>3</sub> nanoparticles for lithium ion batteries. <i>Solid State Sciences</i> , <b>2007</b> , 9, 1069-1073	3.4	43
153	Biomass-Derived Carbon Materials as Prospective Electrodes for High-Energy Lithium- and Sodium-Ion Capacitors. <i>Chemistry - an Asian Journal</i> , <b>2019</b> , 14, 936-951	4.5	42
152	Electrochemical Lithium Insertion Behavior of Combustion Synthesized V <sub>2</sub> O <sub>5</sub> Cathodes for Lithium-Ion Batteries. <i>Journal of the Electrochemical Society</i> , <b>2012</b> , 159, A273-A280	3.9	42
151	Free-standing electrospun carbon nanofibres as high performance anode material for lithium-ion batteries. <i>Journal Physics D: Applied Physics</i> , <b>2012</b> , 45, 265302	3	42
150	LiCrTiO(4): a high-performance insertion anode for lithium-ion batteries. <i>ChemPhysChem</i> , <b>2012</b> , 13, 3263362	3.6	42
149	ZrO <sub>2</sub> nanofiller incorporated PVC/PVdF blend-based composite polymer electrolytes (CPE) complexed with LiBOB. <i>Journal of Membrane Science</i> , <b>2007</b> , 305, 146-151	9.6	42

148	Tube-like carbon for Li-ion capacitors derived from the environmentally undesirable plant: <i>Prosopis juliflora</i> . <i>Carbon</i> , <b>2016</b> , 98, 58-66	10.4	41
147	Electrochemical performance of NASICON type carbon coated $\text{LiTi}_2(\text{PO}_4)_3$ with a spinel $\text{LiMn}_2\text{O}_4$ cathode. <i>RSC Advances</i> , <b>2012</b> , 2, 7534	3.7	41
146	Chemical Lithiation Studies on Combustion Synthesized $\text{V}_2\text{O}_5$ Cathodes with Full Cell Application for Lithium Ion Batteries. <i>Journal of the Electrochemical Society</i> , <b>2013</b> , 160, A1016-A1024	3.9	41
145	High energy Li-ion capacitor and battery using graphitic carbon spheres as an insertion host from cooking oil. <i>Journal of Materials Chemistry A</i> , <b>2018</b> , 6, 3242-3248	13	40
144	Electrochemical Performance of $\text{MnO}_2$ Nanorods/Activated Carbon Hybrid Supercapacitor. <i>Nanoscience and Nanotechnology Letters</i> , <b>2012</b> , 4, 724-728	0.8	40
143	Ultrathin Polyimide Coating for a Spinel $\text{LiNi}_{0.5}\text{Mn}_{1.5}\text{O}_4$ Cathode and Its Superior Lithium Storage Properties under Elevated Temperature Conditions. <i>Journal of the Electrochemical Society</i> , <b>2013</b> , 160, A1003-A1008	3.9	39
142	Polyvinylidene fluoride/hexafluoropropylene (PVDF/HFP)-based composite polymer electrolyte containing $\text{LiPF}_3(\text{CF}_3\text{CF}_2)_3$ . <i>Journal of Non-Crystalline Solids</i> , <b>2008</b> , 354, 3451-3457	3.9	39
141	Does carbon coating really improves the electrochemical performance of electrospun $\text{SnO}_2$ anodes?. <i>Electrochimica Acta</i> , <b>2014</b> , 121, 109-115	6.7	38
140	High performance lithium-ion cells using one dimensional electrospun $\text{TiO}_2$ nanofibers with spinel cathode. <i>RSC Advances</i> , <b>2012</b> , 2, 7983	3.7	38
139	Macroporous carbon from human hair: A journey towards the fabrication of high energy Li-ion capacitors. <i>Electrochimica Acta</i> , <b>2015</b> , 182, 474-481	6.7	37
138	Carbon-coated $\text{LiTi}_2(\text{PO}_4)_3$ : an ideal insertion host for lithium-ion and sodium-ion batteries. <i>Chemistry - an Asian Journal</i> , <b>2014</b> , 9, 878-82	4.5	37
137	Synthesis and improved electrochemical properties of $\text{Li}_2\text{MnSiO}_4$ cathodes. <i>Journal Physics D: Applied Physics</i> , <b>2011</b> , 44, 152001	3	37
136	Building Next-Generation Li-ion Capacitors with High Energy: An Approach beyond Intercalation. <i>Journal of Physical Chemistry Letters</i> , <b>2018</b> , 9, 3946-3958	6.4	37
135	Carbon Coated NASICON Type $\text{Li}_3\text{V}_2\text{-xM}_x(\text{PO}_4)_3$ (M=Mn, Fe and Al) Materials with Enhanced Cyclability for Li-Ion Batteries. <i>Journal of the Electrochemical Society</i> , <b>2013</b> , 160, A87-A92	3.9	36
134	Polyvinylidene fluoride/hexafluoropropylene based nanocomposite polymer electrolytes (NCPE) complexed with $\text{LiPF}_3(\text{CF}_3\text{CF}_2)_3$ . <i>European Polymer Journal</i> , <b>2007</b> , 43, 5121-5127	5.2	36
133	Two Dimensional $\text{TiS}_2$ as a Promising Insertion Anode for Na-Ion Battery. <i>ChemistrySelect</i> , <b>2018</b> , 3, 524-528		34
132	High energy Li-ion capacitors with conversion type $\text{Mn}_3\text{O}_4$ particulates anchored to few layer graphene as the negative electrode. <i>Journal of Materials Chemistry A</i> , <b>2016</b> , 4, 15134-15139	13	34
131	Achieving high-energy dual carbon Li-ion capacitors with unique low- and high-temperature performance from spent Li-ion batteries. <i>Journal of Materials Chemistry A</i> , <b>2020</b> , 8, 4950-4959	13	33

130	Li(Mn <sub>1/3</sub> Ni <sub>1/3</sub> Fe <sub>1/3</sub> )O <sub>2</sub> /Polyaniline hybrids as cathode active material with ultra-fast charge/discharge capability for lithium batteries. <i>Journal of Power Sources</i> , <b>2013</b> , 232, 240-245	8.9	33
129	Lithium fluoroalkylphosphate based novel composite polymer electrolytes (NCPE) incorporated with nanosized SiO <sub>2</sub> filler. <i>Materials Chemistry and Physics</i> , <b>2009</b> , 115, 251-257	4.4	33
128	Investigations on Na <sup>+</sup> ion conducting polyvinylidene fluoride-co-hexafluoropropylene/poly ethylmethacrylate blend polymer electrolytes. <i>Current Applied Physics</i> , <b>2009</b> , 9, 1106-1111	2.6	33
127	Li <sup>+</sup> ion conduction in TiO <sub>2</sub> filled polyvinylidene fluoride-co-hexafluoropropylene based novel nanocomposite polymer electrolyte membranes with LiDFOB. <i>Current Applied Physics</i> , <b>2009</b> , 9, 1474-1479	2.6	33
126	Characterization of SiO <sub>2</sub> and Al <sub>2</sub> O <sub>3</sub> incorporated PVdF-HFP based composite polymer electrolytes with LiPF <sub>3</sub> (CF <sub>3</sub> CF <sub>2</sub> ) <sub>3</sub> . <i>Journal of Applied Polymer Science</i> , <b>2008</b> , 108, 1314-1322	2.9	33
125	Rusted iron wire waste into high performance anode (Fe <sub>2</sub> O <sub>3</sub> ) for Li-ion batteries: an efficient waste management approach. <i>Green Chemistry</i> , <b>2016</b> , 18, 1395-1404	10	32
124	Biomass-Derived Carbon: A Value-Added Journey Towards Constructing High-Energy Supercapacitors in an Asymmetric Fashion. <i>ChemSusChem</i> , <b>2019</b> , 12, 4353-4382	8.3	32
123	Morphology controlled lithium storage in Li <sub>3</sub> VO <sub>4</sub> anodes. <i>Journal of Materials Chemistry A</i> , <b>2018</b> , 6, 456-463	4.3	32
122	Co(OH) Nanosheets: A Superior Pseudocapacitive Electrode for High-Energy Supercapacitors. <i>Chemistry - an Asian Journal</i> , <b>2017</b> , 12, 2127-2133	4.5	30
121	Carbon-Coated Li <sub>3</sub> Nd <sub>3</sub> W <sub>2</sub> O <sub>12</sub> : A High Power and Low-Voltage Insertion Anode with Exceptional Cycleability for Li-Ion Batteries. <i>Advanced Energy Materials</i> , <b>2014</b> , 4, 1301715	21.8	30
120	Realizing the Performance of LiCoPO <sub>4</sub> Cathodes by Fe Substitution with Off-Stoichiometry. <i>Journal of the Electrochemical Society</i> , <b>2012</b> , 159, A1013-A1018	3.9	30
119	Manipulation of adipic acid application on the electrochemical properties of LiFePO <sub>4</sub> at high rate performance. <i>Journal of Alloys and Compounds</i> , <b>2011</b> , 509, 1279-1284	5.7	30
118	Ultralong Durability of Porous FeO Nanofibers in Practical Li-Ion Configuration with LiMnO Cathode. <i>Advanced Science</i> , <b>2015</b> , 2, 1500050	13.6	29
117	CoO Nanosheets as Battery-Type Electrode for High-Energy Li-Ion Capacitors: A Sustained Li-Storage Conversion Pathway. <i>ACS Nano</i> , <b>2020</b> , 14, 10648-10654	16.7	29
116	Superior charge-transfer kinetics of NASICON-type Li <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> cathodes by multivalent Al <sup>3+</sup> and Cl <sup>-</sup> substitutions. <i>Electrochimica Acta</i> , <b>2013</b> , 97, 210-215	6.7	28
115	LiMnBO <sub>3</sub> /C: A Potential Cathode Material for Lithium Batteries. <i>Bulletin of the Korean Chemical Society</i> , <b>2010</b> , 31, 1506-1508	1.2	28
114	Nanostructured intermetallic FeSn <sub>2</sub> -carbonaceous composites as highly stable anode for Na-ion batteries. <i>Journal of Power Sources</i> , <b>2017</b> , 343, 296-302	8.9	27
113	Fabrication of New 2.4 V Lithium-Ion Cell with Carbon-Coated LiTi <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> as the Cathode. <i>ChemElectroChem</i> , <b>2015</b> , 2, 231-235	4.3	27

112	Overlithiated Li <sub>1+x</sub> Ni <sub>0.5</sub> Mn <sub>1.5</sub> O <sub>4</sub> in all one dimensional architecture with conversion type Fe <sub>2</sub> O <sub>3</sub> : A new approach to eliminate irreversible capacity loss. <i>Electrochimica Acta</i> , <b>2016</b> , 215, 647-651	6.7	27
111	Electrospun TiO <sub>2</sub> Nanofibers as Insertion Anode for Li-Ion Battery Applications. <i>Journal of Physical Chemistry C</i> , <b>2014</b> , 118, 16776-16781	3.8	26
110	Superior Lithium Storage Properties of Carbon Coated Li <sub>2</sub> MnSiO <sub>4</sub> Cathodes. <i>Electrochemical and Solid-State Letters</i> , <b>2011</b> , 14, A33		25
109	Pre-lithiated Li <sub>x</sub> Mn <sub>2</sub> O <sub>4</sub> : A new approach to mitigate the irreversible capacity loss in negative electrodes for Li-ion battery. <i>Electrochimica Acta</i> , <b>2016</b> , 208, 225-230	6.7	25
108	From Electrodes to Electrodes: Building High-Performance Li-Ion Capacitors and Batteries from Spent Lithium-Ion Battery Carbonaceous Materials. <i>ChemElectroChem</i> , <b>2019</b> , 6, 1407-1412	4.3	25
107	Electrochemical performance of hematite nanoparticles derived from spherical maghemite and elongated goethite particles. <i>Journal of Power Sources</i> , <b>2015</b> , 276, 291-298	8.9	24
106	Elongated graphitic hollow nanofibers from vegetable oil as prospective insertion host for constructing advanced high energy Li-Ion capacitor and battery. <i>Carbon</i> , <b>2018</b> , 134, 9-14	10.4	24
105	Surface enriched graphene hollow spheres towards building ultra-high power sodium-ion capacitor with long durability. <i>Energy Storage Materials</i> , <b>2020</b> , 25, 702-713	19.4	24
104	High energy Li-ion capacitors using two-dimensional TiSe <sub>0.6</sub> S <sub>1.4</sub> as insertion host. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 19819-19825	13	23
103	Exceptional catalytic activity of hollow structured La <sub>0.6</sub> Sr <sub>0.4</sub> CoO <sub>3</sub> perovskite spheres in aqueous media and aprotic Li-ion batteries. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 18029-18037	13	23
102	Synthesis and enhanced electrochemical performance of Li <sub>2</sub> CoPO <sub>4</sub> F cathodes under high current cycling. <i>Physical Chemistry Chemical Physics</i> , <b>2012</b> , 14, 11904-9	3.6	23
101	A study on LiBOB-based nanocomposite gel polymer electrolytes (NCGPE) for Lithium-ion batteries. <i>Ionics</i> , <b>2007</b> , 13, 277-280	2.7	23
100	The important role of adipic acid on the synthesis of nanocrystalline lithium iron phosphate with high rate performance. <i>Journal of Alloys and Compounds</i> , <b>2010</b> , 495, 181-184	5.7	22
99	Lithium difluoro(oxalate)borate-based novel nanocomposite polymer electrolytes for lithium ion batteries. <i>Polymer International</i> , <b>2008</b> , 57, 932-938	3.3	22
98	Synthesis and characterization of novel LiFeBO <sub>3</sub> /C cathodes for lithium batteries. <i>Ionics</i> , <b>2012</b> , 18, 27-30	2.7	21
97	Self-Assembled Ultrathin Anatase TiO <sub>2</sub> Nanosheets with Reactive (001) Facets for Highly Enhanced Reversible Li Storage. <i>ChemElectroChem</i> , <b>2014</b> , 1, 539-543	4.3	21
96	Carbon coated LiTi <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> as new insertion anode for aqueous Na-ion batteries. <i>Journal of Alloys and Compounds</i> , <b>2014</b> , 603, 48-51	5.7	21
95	Polyvinylidene fluoride-based novel polymer electrolytes for magnesium-rechargeable batteries with Mg(CF <sub>3</sub> SO <sub>3</sub> ) <sub>2</sub> . <i>Journal of Applied Polymer Science</i> , <b>2009</b> , 112, 3024-3029	2.9	21

94	Excellent performance of Fe <sub>3</sub> O <sub>4</sub> -perforated graphene composite as promising anode in practical Li-ion configuration with LiMn <sub>2</sub> O <sub>4</sub> . <i>Energy Storage Materials</i> , <b>2015</b> , 1, 152-157	19.4	20
93	A comparative evaluation of differently synthesized high surface area carbons for Li-ion hybrid electrochemical supercapacitor application: Pore size distribution holds the key. <i>Applied Materials Today</i> , <b>2016</b> , 2, 1-6	6.6	20
92	Indanthrone derived disordered graphitic carbon as promising insertion anode for sodium ion battery with long cycle life. <i>Electrochimica Acta</i> , <b>2014</b> , 146, 218-223	6.7	19
91	Improved performance of polyvinylidene fluoride-hexafluoropropylene based nanocomposite polymer membranes containing lithium bis(oxalato)borate by phase inversion for lithium batteries. <i>Solid State Sciences</i> , <b>2011</b> , 13, 1047-1051	3.4	19
90	Improved Cycle Performance of Sulfur-Doped LiFePO <sub>4</sub> Material at High Temperatures. <i>Bulletin of the Korean Chemical Society</i> , <b>2009</b> , 30, 2223-2226	1.2	19
89	Exploring the usage of LiCrTiO <sub>4</sub> as cathode towards constructing 1.4V class Li-ion cells with graphite anode recovered from spent Li-ion battery. <i>Chemical Engineering Journal</i> , <b>2020</b> , 397, 125472	14.7	19
88	Focus on Spinel Li Ti O as Insertion Type Anode for High-Performance Na-Ion Batteries. <i>Small</i> , <b>2019</b> , 15, e1904484	11	18
87	Comparison among the performance of LiBOB, LiDFOB and LiFAP impregnated polyvinylidene fluoride-hexafluoropropylene nanocomposite membranes by phase inversion for lithium batteries. <i>Current Applied Physics</i> , <b>2013</b> , 13, 293-297	2.6	18
86	Influence of synthesis technique on the structural and electrochemical properties of cobalt-free layered type Li <sub>1+x</sub> (Mn <sub>0.4</sub> Ni <sub>0.4</sub> Fe <sub>0.2</sub> ) <sub>1-x</sub> O <sub>2</sub> (0. <i>Electrochimica Acta</i> , <b>2013</b> , 108, 749-756	6.7	18
85	Synthesis and characterization of LiBOB-based PVdF/PVC-TiO <sub>2</sub> composite polymer electrolytes. <i>Polymer Engineering and Science</i> , <b>2009</b> , 49, 2109-2115	2.3	18
84	Effects of TiO <sub>2</sub> and ZrO <sub>2</sub> nanofillers in LiBOB based PVdF/PVC composite polymer electrolytes (CPE). <i>Journal Physics D: Applied Physics</i> , <b>2007</b> , 40, 6754-6759	3	18
83	Synthesis of SnS <sub>2</sub> single crystals and its Li-storage performance with LiMn <sub>2</sub> O <sub>4</sub> cathode. <i>Applied Materials Today</i> , <b>2016</b> , 5, 68-72	6.6	17
82	Sandwich layered Li <sub>0.32</sub> Al <sub>0.68</sub> MnO <sub>2</sub> (OH) <sub>2</sub> from spent Li-ion battery to build high-performance supercapacitor: Waste to energy storage approach. <i>Journal of Alloys and Compounds</i> , <b>2020</b> , 827, 154336	5.7	16
81	Mesoscopic magnetic iron oxide spheres for high performance Li-ion battery anode: a new pulsed laser induced reactive micro-bubble synthesis process. <i>Journal of Materials Chemistry A</i> , <b>2013</b> , 1, 13932	13	16
80	Fabrication of High Energy Li-Ion Capacitors from Orange Peel Derived Porous Carbon. <i>ChemistrySelect</i> , <b>2017</b> , 2, 5051-5058	1.8	15
79	Stibium: A Promising Electrode toward Building High-Performance Na-Ion Full-Cells. <i>Chem</i> , <b>2019</b> , 5, 3096-3126	18.1	15
78	Electrochemical Activity of Hematite Phase in Full-Cell Li-ion Assemblies. <i>Advanced Energy Materials</i> , <b>2018</b> , 8, 1702841	21.8	15
77	Enhanced elevated temperature performance of LiFePO <sub>4</sub> modified spinel LiNi <sub>0.5</sub> Mn <sub>1.5</sub> O <sub>4</sub> cathode. <i>Journal of Alloys and Compounds</i> , <b>2014</b> , 612, 51-55	5.7	15

76	Practical Li-Ion Battery Assembly with One-Dimensional Active Materials. <i>Journal of Physical Chemistry Letters</i> , <b>2017</b> , 8, 4031-4037	6.4	15
75	Copper-substituted, lithium rich iron phosphate as cathode material for lithium secondary batteries. <i>Journal of Alloys and Compounds</i> , <b>2009</b> , 488, 380-385	5.7	15
74	Tailoring three dimensional MnO <sub>2</sub> /RuO <sub>2</sub> hybrid nanostructure as prospective bifunctional catalyst for LiO <sub>2</sub> batteries. <i>Electrochimica Acta</i> , <b>2016</b> , 212, 701-709	6.7	14
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72	Non-aqueous energy storage devices using graphene nanosheets synthesized by green route. <i>AIP Advances</i> , <b>2013</b> , 3, 042112	1.5	14
71	Atomic layer deposition of AlO on P2-NaMnCoO as interfacial layer for high power sodium-ion batteries. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 564, 467-477	9.3	14
70	High power Na-ion capacitor with TiS <sub>2</sub> as insertion host. <i>Scripta Materialia</i> , <b>2019</b> , 161, 54-57	5.6	14
69	Impact of carbonate-based electrolytes on the electrochemical activity of carbon-coated NaV(PO) <sub>3</sub> F cathode in full-cell assembly with hard carbon anode. <i>Journal of Colloid and Interface Science</i> , <b>2021</b> , 582, 51-59	9.3	14
68	Building next-generation supercapacitors with battery type Ni(OH) <sub>2</sub> . <i>Journal of Materials Chemistry A</i> , <b>2021</b> , 9, 15542-15585	13	14
67	Exploring the influence of iron substitution in lithium rich layered oxides Li <sub>2</sub> Ru <sub>1-x</sub> Fe <sub>x</sub> O <sub>3</sub> : triggering the anionic redox reaction. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 14387-14396	13	13
66	Supersaturated Water-in-salt Hybrid electrolyte towards building high voltage Na-ion capacitors with wide temperatures operation. <i>Journal of Power Sources</i> , <b>2020</b> , 472, 228558	8.9	13
65	Nanoparticulate AlO(OH) <sub>n</sub> filled polyvinylidene fluoride-co-hexafluoropropylene based microporous membranes for lithium ion batteries. <i>Journal of Renewable and Sustainable Energy</i> , <b>2009</b> , 1, 023108	2.5	13
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63	Restricted lithiation into a layered V <sub>2</sub> O <sub>5</sub> cathode towards building Blocking-chair type Li-ion batteries and beyond. <i>Journal of Materials Chemistry A</i> , <b>2020</b> , 8, 9483-9495	13	13
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61	LiFAP-based PVDF/PI microporous membranes by phase-inversion technique with Li/LiFePO <sub>4</sub> cell. <i>Applied Physics A: Materials Science and Processing</i> , <b>2009</b> , 97, 811-819	2.6	12
60	Highly Reversible Na-Intercalation into Graphite Recovered from Spent Li-Ion Batteries for High-Energy Na-Ion Capacitor. <i>ChemSusChem</i> , <b>2020</b> , 13, 5654-5663	8.3	12
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58	Developments and Perspectives on Robust Nano- and Microstructured Binder-Free Electrodes for Bifunctional Water Electrolysis and Beyond. <i>Advanced Energy Materials</i> , 2020, 10, 190409	21.8	12
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56	Regeneration of Polyolefin Separators from Spent Li-Ion Battery for Second Life. <i>Batteries and Supercaps</i> , 2020, 3, 581-586	5.6	11
55	Orderly meso-perforated spherical and apple-shaped 3D carbon microstructures for high-energy supercapacitors and high-capacity Li-ion battery anodes. <i>Journal of Materials Chemistry A</i> , 2018, 6, 6422-6434	12.3	11
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46	Red Mud and Li-Ion Batteries: A Magnetic Connection. <i>ChemSusChem</i> , 2016, 9, 2193-200	8.3	10
45	A novel approach to employ Li <sub>2</sub> MnSiO <sub>4</sub> as anode active material for lithium batteries. <i>Ionics</i> , 2011, 17, 3-6	2.7	10
44	Confined ZrO <sub>2</sub> encapsulation over high capacity integrated 0.5Li[Ni <sub>0.5</sub> Mn <sub>1.5</sub> O <sub>4</sub> ]/0.5[Li <sub>2</sub> MnO <sub>3</sub> /Li(Mn <sub>0.5</sub> Ni <sub>0.5</sub> O <sub>2</sub> )] cathode with enhanced electrochemical performance. <i>Electrochimica Acta</i> , 2016, 194, 454-460	6.7	10
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40	LiVPO <sub>4</sub> F: A New Cathode for High-Energy Lithium Ion Capacitors. <i>ChemistrySelect</i> , <b>2016</b> , 1, 3316-3322	1.8	8
39	Understanding the exceptional elevated temperature performance of high voltage LiNi <sub>0.5</sub> Mn <sub>1.5</sub> O <sub>4</sub> cathodes by LiFePO <sub>4</sub> modification. <i>Electrochimica Acta</i> , <b>2014</b> , 137, 404-410	6.7	8
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37	Synthesis and optimization of NASICON-type Li <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> by adipic acid-mediated solid-state approach. <i>Journal of Applied Electrochemistry</i> , <b>2013</b> , 43, 583-593	2.6	7
36	Characterization of poly(vinylidene fluoride-co-hexafluoropropylene) membranes containing nanoscopic AlO(OH) <sub>n</sub> filler with Li/LiFePO <sub>4</sub> cell. <i>Journal of Renewable and Sustainable Energy</i> , <b>2010</b> , 2, 033105	2.5	7
35	Recycling/Reuse of Current Collectors from Spent Lithium-Ion Batteries: Benefits and Issues. <i>Advanced Sustainable Systems</i> , 2100432	5.9	7
34	Interface charge density modulation of a lamellar-like spatially separated Ni <sub>9</sub> S <sub>8</sub> nanosheet/Nb <sub>2</sub> O <sub>5</sub> nanobelt heterostructure catalyst coupled with nitrogen and metal (M = Co, Fe, or Cu) atoms to accelerate acidic and alkaline hydrogen evolution reactions. <i>Chemical Engineering Journal</i> , <b>2022</b> , 431, 134073	14.7	7
33	Transformation of Spent Li-Ion Battery in to High Energy Supercapacitors in Asymmetric Configuration. <i>ChemElectroChem</i> , <b>2019</b> , 6, 5283-5292	4.3	6
32	Efficient bifunctional catalytic activity of nanoscopic Pd-decorated La <sub>0.6</sub> Sr <sub>0.4</sub> CoO <sub>3</sub> - perovskite toward LiO <sub>2</sub> battery, oxygen reduction, and oxygen evolution reactions. <i>Journal of Industrial and Engineering Chemistry</i> , <b>2019</b> , 80, 686-695	6.3	5
31	Influence of dilution effect on the electrochemical performance of integrated 0.5Li(Mn <sub>1.5</sub> Ni <sub>0.5</sub> )O <sub>4</sub> . 0.5(Li <sub>2</sub> MnO <sub>3</sub> ) <sub>2</sub> (Mn <sub>0.5</sub> Ni <sub>0.5</sub> )O <sub>2</sub> cathodes. <i>Ceramics International</i> , <b>2014</b> , 40, 13033-13039	5.1	5
30	Lithium ion transport in PVC/PEG 2000 blend polymer electrolytes complexed with LiX (X=ClO <sub>4</sub> <sup>-</sup> , BF <sub>4</sub> <sup>-</sup> , and CF <sub>3</sub> SO <sub>3</sub> <sup>-</sup> ). <i>Ionics</i> , <b>2010</b> , 16, 263-267	2.7	5
29	Solvent Co-intercalation: An Emerging Mechanism in Li-, Na-, and K-Ion Capacitors. <i>ACS Energy Letters</i> , 4228-4244	20.1	5
28	LiBO <sub>2</sub> -modified LiCoO <sub>2</sub> as an efficient cathode with garnet framework Li <sub>6.75</sub> La <sub>3</sub> Zr <sub>1.75</sub> Nb <sub>0.25</sub> O <sub>12</sub> electrolyte toward building all-solid-state lithium battery for high-temperature operation. <i>Electrochimica Acta</i> , <b>2020</b> , 359, 136955	6.7	5
27	3D Interconnected Porous Graphene Sheets Loaded with Cobalt Oxide Nanoparticles for Lithium-Ion Battery Anodes. <i>Energy Technology</i> , <b>2016</b> , 4, 816-822	3.5	5
26	Li-ion Capacitor via Solvent-Co-Intercalation Process from Spent Li-ion Batteries. <i>Batteries and Supercaps</i> , <b>2021</b> , 4, 671-679	5.6	5
25	Dual-carbon Na-ion capacitors: progress and future prospects. <i>Journal of Materials Chemistry A</i> , <b>2021</b> , 9, 9431-9450	13	5
24	Ex situ XAS investigation of effect of binders on electrochemical performance of Li <sub>2</sub> Fe(SO <sub>4</sub> ) <sub>2</sub> cathode. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 19963-19971	13	4
23	Next-generation Li-ion capacitor with high energy and high power by limiting alloying-intercalation process using SnO <sub>2</sub> @Graphite composite as battery type electrode. <i>Composites Part B: Engineering</i> , <b>2022</b> , 230, 109487	10	4

22	Metal-Ion Capacitors with Anion Intercalation Process. <i>Advanced Energy and Sustainability Research</i> , <b>2021</b> , 2, 2000069	1.6	4
21	Fabrication of 4.7 V class Rocking-chair-type Li-ion cells with carbon-coated LiCoPO <sub>4</sub> as cathode and graphite anode. <i>Materials Letters</i> , <b>2021</b> , 291, 129609	3.3	4
20	Interfacial Engineering in a Cathode Composite Based on Garnet-Type Solid-State Li-Ion Battery with High Voltage Cycling. <i>ChemElectroChem</i> , <b>2021</b> , 8, 570-576	4.3	4
19	Electrochemical Route to Alleviate Irreversible Capacity Loss from Conversion Type Fe <sub>2</sub> O <sub>3</sub> Anodes by LiVPO <sub>4</sub> F Prelithiation. <i>ACS Applied Energy Materials</i> , <b>2018</b> ,	6.1	4
18	Structural, Thermal, and Electrochemical Studies of Novel Li <sub>2</sub> CoxMn <sub>1-x</sub> (SO <sub>4</sub> ) <sub>2</sub> Bimetallic Sulfates. <i>Journal of Physical Chemistry C</i> , <b>2017</b> , 121, 24971-24978	3.8	3
17	Unusual Li-Storage Behaviour of Two-Dimensional ReS <sub>2</sub> Single Crystals. <i>Batteries and Supercaps</i> , <b>2018</b> , 1, 69-74	5.6	3
16	Experimental investigations of SiO <sub>2</sub> based ferrite magnetic tunnel junction. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , <b>2013</b> , 178, 937-941	3.1	3
15	Polyvinylidene fluoride (PVdF) based novel polymer electrolytes complexed with Mg(ClO <sub>4</sub> ) <sub>2</sub> . <i>EPJ Applied Physics</i> , <b>2009</b> , 45, 11101	1.1	3
14	Na-Ion Battery with Graphite Anode and Na <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> Cathode via Solvent-Co-Intercalation Process. <i>Advanced Materials Technologies</i> , <b>2003</b> 99	6.8	3
13	Palladium- and gold-nanoparticle-modified porous carbon as a high-power anode for lithium-ion batteries. <i>ChemPhysChem</i> , <b>2013</b> , 14, 3887-90	3.2	2
12	Recent Advancements in LiCoPO <sub>4</sub> Cathodes Using Electrolyte Additives. <i>Current Opinion in Electrochemistry</i> , <b>2021</b> , 100868	7.2	2
11	Modulating Anion Redox Activity of Li <sub>1.2</sub> Mn <sub>0.54</sub> Ni <sub>0.13</sub> Co <sub>0.13</sub> O <sub>2</sub> through Strong SrO Bonds toward Achieving Stable Li-Ion Half-/Full-Cell Performance. <i>ACS Applied Energy Materials</i> ,	6.1	2
10	High energy Na-Ion capacitor employing graphitic carbon fibers from waste rubber with diglyme-based electrolyte. <i>Chemical Engineering Journal</i> , <b>2021</b> , 426, 130892	14.7	2
9	Stabilizing the high voltage LiCoPO <sub>4</sub> cathode via Fe-doping in the gram-scale synthesis. <i>Electrochimica Acta</i> , <b>2022</b> , 140367	6.7	2
8	Fabrication of Na-Ion Full-Cells using Carbon-Coated Na <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>3</sub> Cathode with Conversion Type CuO Nanoparticles from Spent Li-Ion Batteries.. <i>Small Methods</i> , <b>2022</b> , e2200257	12.8	2
7	Bulk metal-derived metal oxide nanoparticles on oxidized carbon surface. <i>Journal of Alloys and Compounds</i> , <b>2018</b> , 752, 198-205	5.7	1
6	Binary NaCl/NiF and NaCl/NiF Flux-Mediated Growth of Mixed-Valence (V <sup>3+/4+</sup> ) NASICON-Type Na <sub>3</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>2</sub> F <sub>2.5</sub> O <sub>0.5</sub> and Na <sub>2.4</sub> Li <sub>0.6</sub> V <sub>2</sub> (PO <sub>4</sub> ) <sub>2</sub> F <sub>2.5</sub> O <sub>0.5</sub> for Highly Reversible Na- and Li-Ion Storage. <i>ACS Applied Energy Materials</i> , <b>2021</b> , 4, 1387-1397	6.1	1
5	Exploring two dimensional Co <sub>0.33</sub> In <sub>2.67</sub> S <sub>2.29</sub> Se <sub>1.71</sub> as alloy type negative electrode for Li-ion battery with olivine LiFePO <sub>4</sub> cathode. <i>Materials Today Energy</i> , <b>2018</b> , 9, 19-26	7	1

4	Graphene from Spent Lithium-Ion Batteries. <i>Batteries and Supercaps</i> ,	5.6	1
3	Pencil Scripted Ultrathin Graphene Nanostructure as Binder-Free Battery-Type Electrode for Li-Ion Micro-Capacitors with Excellent Performance. <i>Energy Technology</i> ,2200205	3.5	1
2	Choice of Binder on Conversion Type CuO Nanoparticles toward Building High Energy Li-Ion Capacitors: An Approach Beyond Intercalation. <i>Advanced Materials Technologies</i> ,2200423	6.8	1
1	High-performance Li-ion capacitor via anion-intercalation process <b>2022</b> , 1, 20210005		