Kaiyuan Shi

List of Publications by Year
in descending order

51 papers	2,165 citations	331259 21 h-index	223531 46 g-index
53 all docs	53 docs citations	53 times ranked	2985 citing authors

#	Article	IF	Citations
1	A flow-rate-controlled double-nozzles approach for electrochemical additive manufacturing. Virtual and Physical Prototyping, 2022, 17, 52-68.	5.3	9
2	Recovering the electrochemical window by forming a localized solvation nanostructure in ionic liquids with trace water. Science China Chemistry, 2022, 65, 96-105.	4.2	2
3	A micron-size carbon-free K3V2O2(PO4)2F cathode with high-rate performance for potassium-ion batteries. Chemical Engineering Journal, 2022, 436, 135235.	6.6	12
4	Spontaneously spread polymer thin films on the miscible liquid substrates. Chemical Engineering Journal, 2022, 437, 135443.	6.6	5
5	Dual-Conductive Li alloy composite anode constructed by a synergetic Conversion-Alloying reaction with LiMgPO4. Chemical Engineering Journal, 2022, 439, 135705.	6.6	10
6	A dendrite suppression coating formulated via electrophoretic deposition using Bi-functional surfactants for Zn-ion batteries. Journal of Alloys and Compounds, 2022, 918, 165790.	2.8	5
7	A Pitayaâ€Like Coâ€800@KJ Nanocomposite as Separator Coating for Highâ€Performance Lithiumâ€"Sulfur Battery. Energy Technology, 2021, 9, 2001017.	1.8	3
8	One-step synthesis of nitrogenâˆ'fluorine dual-doped porous carbon for supercapacitors. Journal of Energy Storage, 2021, 38, 102509.	3.9	22
9	Size Effects in Sodium Ion Batteries. Advanced Functional Materials, 2021, 31, 2106047.	7.8	51
10	Recent progress of cathode materials for aqueous zinc-ion capacitors: Carbon-based materials and beyond. Carbon, 2021, 185, 126-151.	5.4	71
11	Hierarchically porous carbon with heteroatom doping for the application of Zn-ion capacitors. Carbon, 2021, 185, 1-8.	5.4	35
12	Low-Temperature Synthesis of Amorphous FePO₄@rGO Composites for Cost-Effective Sodium-Ion Batteries. ACS Applied Materials & Interfaces, 2021, 13, 57442-57450.	4.0	9
13	Degradation Mechanisms and Mitigation Strategies of Nickel-Rich NMC-Based Lithium-Ion Batteries. Electrochemical Energy Reviews, 2020, 3, 43-80.	13.1	393
14	Editorial: Three-Dimensional Carbon Architectures for Energy Conversion and Storage. Frontiers in Energy Research, 2020, 8, .	1.2	0
15	Extraction of Lithium from Single-Crystalline Lithium Manganese Oxide Nanotubes Using Ammonium Peroxodisulfate. IScience, 2020, 23, 101768.	1.9	10
16	Nitrogen-Doped nano-carbon onion rings for energy storage in Lithium-ion capacitors. Journal of Energy Storage, 2020, 31, 101609.	3.9	10
17	Effects of Silicone Oil Viscosity and Carbonyl Iron Particle Weight Fraction and Size on Yield Stress for Magnetorheological Grease Based on a New Preparation Technique. Materials, 2019, 12, 1778.	1.3	20
18	Electrophoretic deposition of LiFePO4 for Li-ion batteries. Materials Letters, 2019, 241, 10-13.	1.3	21

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19	Scalable Fabrication of Supercapacitors by Nozzle-Free Electrospinning. ACS Applied Energy Materials, 2018, 1, 296-300.	2.5	23
20	The microstructural characteristics and mechanical property of Al fiber-reinforced cordierite ceramics. Materials Letters, 2018, 215, 99-101.	1.3	3
21	Asymmetric supercapacitor based on MnO2 and Fe2O3 nanotube active materials and graphene current collectors. Nano Structures Nano Objects, 2018, 15, 98-106.	1.9	28
22	Asymmetric supercapacitor, based on composite MnO2-graphene and N-doped activated carbon coated carbon nanotube electrodes. Electrochimica Acta, 2017, 233, 142-150.	2.6	39
23	Silver nanoparticle assembly on carbon nanotubes triggered by reductive surfactant coating. Materials Letters, 2016, 178, 128-131.	1.3	7
24	Synthesis of metal and metal oxide nanoparticles, liquidâ€“liquid extraction and application in supercapacitors. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2016, 500, 195-202.	2.3	17
25	Efficient Lightweight Supercapacitor with Compression Stability. Advanced Functional Materials, 2016, 26, 6437-6445.	7.8	123
26	Enhanced capacitive performance of MnO 2 - multiwalled carbon nanotube electrodes, prepared using lauryl gallate dispersant. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2016, 509, 504-511.	2.3	8
27	Highly efficient macroporous adsorbents for toxic metal ions in water systems based on polyvinyl alcoholâ€“formaldehyde sponges. Journal of Materials Chemistry A, 2016, 4, 2537-2549.	5.2	53
28	Cellulose Nanocrystal Aerogels as Universal 3D Lightweight Substrates for Supercapacitor Materials. Advanced Materials, 2015, 27, 6104-6109.	11.1	297
29	Fabrication of <scp>T</scp>ironâ€doped polypyrrole/<scp>MWCNT</scp> composite electrodes with high mass loading and enhanced performance for supercapacitors. Journal of Applied Polymer Science, 2015, 132, .	1.3	10
30	Influence of chemical structure of dyes on capacitive dye removal from solutions. Electrochimica Acta, 2015, 174, 588-595.	2.6	34
31	Film deposition mechanisms and properties of optically active chelating polymer and composites. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2015, 487, 17-25.	2.3	10
32	Electrodeposition of Carbon Nanotubes Triggered by Cathodic and Anodic Reactions of Dispersants. Materials and Manufacturing Processes, 2015, 30, 771-777.	2.7	10
33	Asymmetric Supercapacitors Based on Activatedâ€Carbonâ€Coated Carbon Nanotubes. ChemElectroChem, 2015, 2, 396-403.	1.7	48
34	Azopolymer triggered electrophoretic deposition of MnO₂-carbon nanotube composites and polypyrrole coated carbon nanotubes for supercapacitors. Journal of Materials Chemistry A, 2015, 3, 16486-16494.	5.2	20
35	Electrophoretic deposition of a memory-type flame retardant material. Materials Letters, 2015, 153, 106-109.	1.3	5
36	Supercapacitor devices for energy storage and capacitive dye removal from aqueous solutions. RSC Advances, 2015, 5, 320-327.	1.7	25

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37	Anionic dopantâ€“dispersants for synthesis of polypyrrole coated carbon nanotubes and fabrication of supercapacitor electrodes with high active mass loading. Journal of Materials Chemistry A, 2014, 2, 14666.	5.2	40
38	Surface modification and cathodic electrophoretic deposition of ceramic materials and composites using celestine blue dye. RSC Advances, 2014, 4, 29652.	1.7	18
39	Polypyrrole coated carbon nanotubes for supercapacitor devices with enhanced electrochemical performance. Journal of Power Sources, 2014, 268, 233-239.	4.0	68
40	New colloidal route for electrostatic assembly of oxide nanoparticle â€“ carbon nanotube composites. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2014, 446, 15-22.	2.3	24
41	Activated Carbon-Coated Carbon Nanotubes for Energy Storage in Supercapacitors and Capacitive Water Purification. ACS Sustainable Chemistry and Engineering, 2014, 2, 1289-1298.	3.2	209
42	Electrophoretic nanotechnology of grapheneâ€“carbon nanotube and grapheneâ€“polypyrrole nanofiber composites for electrochemical supercapacitors. Journal of Colloid and Interface Science, 2013, 407, 474-481.	5.0	72
43	Fabrication of Polypyrrole-Coated Carbon Nanotubes Using Oxidantâ€“Surfactant Nanocrystals for Supercapacitor Electrodes with High Mass Loading and Enhanced Performance. ACS Applied Materials & Interfaces, 2013, 5, 13161-13170.	4.0	69
44	Polypyrrole nanofiberâ€“carbon nanotube electrodes for supercapacitors with high mass loading obtained using an organic dye as a co-dispersant. Journal of Materials Chemistry A, 2013, 1, 11614.	5.2	97
45	Characterization of Ni plaque based polypyrrole electrodes prepared by pulseelectropolymerization. Materials Letters, 2013, 96, 135-138.	1.3	7
46	Influence of current collector on capacitive behavior and cycling stability of Tiron doped polypyrrole electrodes. Journal of Power Sources, 2013, 240, 42-49.	4.0	69
47	On microstructure and fatigue characterisation of cast iron alloyed with PTA deposits. Surface Engineering, 2012, 28, 113-121.	1.1	6
48	Effect of tempering treatment on microstructure and fatigue life of TiCâ€“Cr overlay, produced by plasma transferred arc alloying. Journal of Materials Science, 2012, 47, 720-729.	1.7	4
49	Microstructure and fatigue properties of plasma transferred arc alloying TiC-W-Cr on gray cast iron. Surface and Coatings Technology, 2011, 206, 1211-1217.	2.2	27
50	Surface Treatment of 45 Steels by Plasma Beam Alloying and Plasma Surface Quenching. Advanced Materials Research, 0, 129-131, 1109-1113.	0.3	5
51	Three-Dimensional Carbon Architectures for Energy Conversion and Storage. Frontiers Research Topics, 0, , .	0.2	0