Qi Chen

List of Publications by Year in descending order

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264 papers	32,792 citations	12303 69 h-index	3903 177 g-index
270 all docs	270 docs citations	270 times ranked	23440 citing authors

#	Article	IF	Citations
1	Interface engineering of highly efficient perovskite solar cells. Science, 2014, 345, 542-546.	6.0	5,936
2	Planar Heterojunction Perovskite Solar Cells via Vapor-Assisted Solution Process. Journal of the American Chemical Society, 2014, 136, 622-625.	6.6	2,091
3	Improved air stability of perovskite solar cells via solution-processed metal oxide transport layers. Nature Nanotechnology, 2016, 11, 75-81.	15.6	1,890
4	Controllable Self-Induced Passivation of Hybrid Lead Iodide Perovskites toward High Performance Solar Cells. Nano Letters, 2014, 14, 4158-4163.	4.5	1,343
5	Low-Temperature Solution-Processed Perovskite Solar Cells with High Efficiency and Flexibility. ACS Nano, 2014, 8, 1674-1680.	7.3	1,320
6	Under the spotlight: The organicâ€“inorganic hybrid halide perovskite for optoelectronic applications. Nano Today, 2015, 10, 355-396.	6.2	891
7	Cation and anion immobilization through chemical bonding enhancement with fluorides for stable halide perovskite solar cells. Nature Energy, 2019, 4, 408-415.	19.8	831
8	A Eu ³⁺ -Eu ²⁺ ion redox shuttle imparts operational durability to Pb-I perovskite solar cells. Science, 2019, 363, 265-270.	6.0	793
9	Single Crystal Formamidinium Lead Iodide (FAPbI₃): Insight into the Structural, Optical, and Electrical Properties. Advanced Materials, 2016, 28, 2253-2258.	11.1	781
10	Highly Flexible Silver Nanowire Electrodes for Shapeâ€Memory Polymer Lightâ€Emitting Diodes. Advanced Materials, 2011, 23, 664-668.	11.1	622
11	High-efficiency robust perovskite solar cells on ultrathin flexible substrates. Nature Communications, 2016, 7, 10214.	5.8	534
12	Strain engineering in perovskite solar cells and its impacts on carrier dynamics. Nature Communications, 2019, 10, 815.	5.8	528
13	Multifunctional Fullerene Derivative for Interface Engineering in Perovskite Solar Cells. Journal of the American Chemical Society, 2015, 137, 15540-15547.	6.6	490
14	Guanidinium: A Route to Enhanced Carrier Lifetime and Open-Circuit Voltage in Hybrid Perovskite Solar Cells. Nano Letters, 2016, 16, 1009-1016.	4.5	479
15	Hole Selective NiO Contact for Efficient Perovskite Solar Cells with Carbon Electrode. Nano Letters, 2015, 15, 2402-2408.	4.5	412
16	Ultra-high open-circuit voltage of tin perovskite solar cells via an electron transporting layer design. Nature Communications, 2020, 11, 1245.	5.8	408
17	The optoelectronic role of chlorine in CH3NH3PbI3(Cl)-based perovskite solar cells. Nature Communications, 2015, 6, 7269.	5.8	404
18	Perovskite solar cells: film formation and properties. Journal of Materials Chemistry A, 2015, 3, 9032-9050.	5.2	392

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19	The identification and characterization of defect states in hybrid organicâ€“inorganic perovskite photovoltaics. Physical Chemistry Chemical Physics, 2015, 17, 112-116.	1.3	335
20	Exploration of Crystallization Kinetics in Quasi Two-Dimensional Perovskite and High Performance Solar Cells. Journal of the American Chemical Society, 2018, 140, 459-465.	6.6	327
21	Chemical Reduction of Intrinsic Defects in Thicker Heterojunction Planar Perovskite Solar Cells. Advanced Materials, 2017, 29, 1606774.	11.1	318
22	Defect Passivation of Organicâ€“Inorganic Hybrid Perovskites by Diammonium Iodide toward High-Performance Photovoltaic Devices. ACS Energy Letters, 2016, 1, 757-763.	8.8	317
23	Tailoring the Interfacial Chemical Interaction for High-Efficiency Perovskite Solar Cells. Nano Letters, 2017, 17, 269-275.	4.5	307
24	The Additive Coordination Effect on Hybrids Perovskite Crystallization and Highâ€Performance Solar Cell. Advanced Materials, 2016, 28, 9862-9868.	11.1	270
25	Highly stable QLEDs with improved hole injection via quantum dot structure tailoring. Nature Communications, 2018, 9, 2608.	5.8	268
26	Cost Analysis of Perovskite Tandem Photovoltaics. Joule, 2018, 2, 1559-1572.	11.7	266
27	Interfacial Residual Stress Relaxation in Perovskite Solar Cells with Improved Stability. Advanced Materials, 2019, 31, e1904408.	11.1	259
28	Perovskite Solar Cells Employing Dopantâ€Free Organic Hole Transport Materials with Tunable Energy Levels. Advanced Materials, 2016, 28, 440-446.	11.1	249
29	Liquid medium annealing for fabricating durable perovskite solar cells with improved reproducibility. Science, 2021, 373, 561-567.	6.0	227
30	Grainâ€Boundary â€œPatchesâ€•by In Situ Conversion to Enhance Perovskite Solar Cells Stability. Advanced Materials, 2018, 30, e1800544.	11.1	224
31	Reconfiguration of interfacial energy band structure for high-performance inverted structure perovskite solar cells. Nature Communications, 2019, 10, 4593.	5.8	214
32	A dopant-free organic hole transport material for efficient planar heterojunction perovskite solar cells. Journal of Materials Chemistry A, 2015, 3, 11940-11947.	5.2	213
33	Efficient Flexible Phosphorescent Polymer Lightâ€Emitting Diodes Based on Silver Nanowireâ€Polymer Composite Electrode. Advanced Materials, 2011, 23, 5563-5567.	11.1	189
34	Manipulation of facet orientation in hybrid perovskite polycrystalline films by cation cascade. Nature Communications, 2018, 9, 2793.	5.8	189
35	Nickel oxide nanoparticles for efficient hole transport in p-i-n and n-i-p perovskite solar cells. Journal of Materials Chemistry A, 2017, 5, 6597-6605.	5.2	188
36	Impacts of alkaline on the defects property and crystallization kinetics in perovskite solar cells. Nature Communications, 2019, 10, 1112.	5.8	185

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37	Interfacial Dipole in Organic and Perovskite Solar Cells. Journal of the American Chemical Society, 2020, 142, 18281-18292.	6.6	182
38	Development of encapsulation strategies towards the commercialization of perovskite solar cells. Energy and Environmental Science, 2022, 15, 13-55.	15.6	158
39	Multilayer Transparent Top Electrode for Solution Processed Perovskite/Cu(In,Ga)(Se,S)₂ Four Terminal Tandem Solar Cells. ACS Nano, 2015, 9, 7714-7721.	7.3	157
40	The intrinsic properties of FA_(1â^'x)MA_xPbI₃ perovskite single crystals. Journal of Materials Chemistry A, 2017, 5, 8537-8544.	5.2	152
41	Ag-Incorporated Organicâ€“Inorganic Perovskite Films and Planar Heterojunction Solar Cells. Nano Letters, 2017, 17, 3231-3237.	4.5	149
42	Perovskite/polymer monolithic hybrid tandem solar cells utilizing a low-temperature, full solution process. Materials Horizons, 2015, 2, 203-211.	6.4	148
43	Integrated Perovskite/Bulk-Heterojunction toward Efficient Solar Cells. Nano Letters, 2015, 15, 662-668.	4.5	145
44	Robust Fabrication of Hybrid Leadâ€Free Perovskite Pellets for Stable Xâ€ray Detectors with Low Detection Limit. Advanced Materials, 2020, 32, e2001981.	11.1	144
45	Moderate UV Exposure Enhances Learning and Memory by Promoting a Novel Glutamate Biosynthetic Pathway in the Brain. Cell, 2018, 173, 1716-1727.e17.	13.5	142
46	An in situ cross-linked 1D/3D perovskite heterostructure improves the stability of hybrid perovskite solar cells for over 3000 h operation. Energy and Environmental Science, 2020, 13, 4344-4352.	15.6	142
47	CsI Preâ€Intercalation in the Inorganic Framework for Efficient and Stable FA_{1â^'}_x Cs_xPbI₃(Cl) Perovskite Solar Cells. Small, 2017, 13, 1700484.	5.2	121
48	The Emergence of the Mixed Perovskites and Their Applications as Solar Cells. Advanced Energy Materials, 2017, 7, 1700491.	10.2	120
49	Effect of High Dipole Moment Cation on Layered 2D Organicâ€“Inorganic Halide Perovskite Solar Cells. Advanced Energy Materials, 2019, 9, 1803024.	10.2	117
50	Flexible silver grid/PEDOT:PSS hybrid electrodes for large area inverted polymer solar cells. Nano Energy, 2014, 10, 259-267.	8.2	111
51	Locally collective hydrogen bonding isolates lead octahedra for white emission improvement. Nature Communications, 2019, 10, 5190.	5.8	109
52	Congeneric Incorporation of CsPbBr₃ Nanocrystals in a Hybrid Perovskite Heterojunction for Photovoltaic Efficiency Enhancement. ACS Energy Letters, 2018, 3, 30-38.	8.8	106
53	Improving the TiO₂ electron transport layer in perovskite solar cells using acetylacetonate-based additives. Journal of Materials Chemistry A, 2015, 3, 9108-9115.	5.2	104
54	Synergistic Effects of Euâ€MOF on Perovskite Solar Cells with Improved Stability. Advanced Materials, 2021, 33, e2102947.	11.1	104

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55	Silane-Capped ZnO Nanoparticles for Use as the Electron Transport Layer in Inverted Organic Solar Cells. ACS Nano, 2018, 12, 5518-5529.	7.3	101
56	A Thermodynamically Favored Crystal Orientation in Mixed Formamidinium/Methylammonium Perovskite for Efficient Solar Cells. Advanced Materials, 2019, 31, e1900390.	11.1	101
57	Low-Temperature TiO_x Compact Layer for Planar Heterojunction Perovskite Solar Cells. ACS Applied Materials & Interfaces, 2016, 8, 11076-11083.	4.0	100
58	1000 h Operational Lifetime Perovskite Solar Cells by Ambient Melting Encapsulation. Advanced Energy Materials, 2020, 10, 1902472.	10.2	98
59	Solutionâ€Processed Small Molecules Using Different Electron Linkers for Highâ€Performance Solar Cells. Advanced Materials, 2013, 25, 4657-4662.	11.1	96
60	Synthesis of N,S-Doped Carbon Quantum Dots for Use in Organic Solar Cells as the ZnO Modifier To Eliminate the Light-Soaking Effect. ACS Applied Materials & Interfaces, 2019, 11, 2243-2253.	4.0	94
61	Working Mechanism for Flexible Perovskite Solar Cells with Simplified Architecture. Nano Letters, 2015, 15, 6514-6520.	4.5	91
62	The Spacer Cations Interplay for Efficient and Stable Layered 2D Perovskite Solar Cells. Advanced Energy Materials, 2020, 10, 1901566.	10.2	89
63	Promoting Energy Transfer via Manipulation of Crystallization Kinetics of Quasiâ€2D Perovskites for Efficient Green Lightâ€Emitting Diodes. Advanced Materials, 2021, 33, e2102246.	11.1	88
64	Elemental composition of organic aerosol: The gap between ambient and laboratory measurements. Geophysical Research Letters, 2015, 42, 4182-4189.	1.5	84
65	Recent advances toward practical use of halide perovskite nanocrystals. Journal of Materials Chemistry A, 2018, 6, 21729-21746.	5.2	84
66	Monolithic perovskite/Si tandem solar cells exceeding 22% efficiency via optimizing top cell absorber. Nano Energy, 2018, 53, 798-807.	8.2	83
67	The study of solvent additive effects in efficient polymer photovoltaics via impedance spectroscopy. Solar Energy Materials and Solar Cells, 2014, 130, 20-26.	3.0	75
68	Recent Advances in Improving Phase Stability of Perovskite Solar Cells. Small Methods, 2020, 4, 1900877.	4.6	74
69	Fluoroalkyl-substituted fullerene/perovskite heterojunction for efficient and ambient stable perovskite solar cells. Nano Energy, 2016, 30, 417-425.	8.2	71
70	Facile Singleâ€Precursor Synthesis and Surface Modification of Hafnium Oxide Nanoparticles for Nanocomposite Î³â€Ray Scintillators. Advanced Functional Materials, 2015, 25, 4607-4616.	7.8	70
71	Colloidal Indium-Doped Zinc Oxide Nanocrystals with Tunable Work Function: Rational Synthesis and Optoelectronic Applications. Chemistry of Materials, 2014, 26, 5169-5178.	3.2	68
72	Hollow Loofahâ€Like N, Oâ€Coâ€Doped Carbon Tube for Electrocatalysis of Oxygen Reduction. Advanced Functional Materials, 2019, 29, 1900015.	7.8	68

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73	Low-temperature-processed inorganic perovskite solar cells via solvent engineering with enhanced mass transport. Journal of Materials Chemistry A, 2018, 6, 23602-23609.	5.2	67
74	Unraveling film transformations and device performance of planar perovskite solar cells. Nano Energy, 2015, 12, 494-500.	8.2	65
75	Tungstenâ€Dopingâ€Induced Surface Reconstruction of Porous Ternary Ptâ€Based Alloy Electrocatalyst for Oxygen Reduction. Advanced Functional Materials, 2019, 29, 1807070.	7.8	65
76	Synthesis of bulk-size transparent gadolinium oxideâ€“polymer nanocomposites for gamma ray spectroscopy. Journal of Materials Chemistry C, 2013, 1, 1970.	2.7	64
77	To probe the performance of perovskite memory devices: defects property and hysteresis. Journal of Materials Chemistry C, 2017, 5, 5810-5817.	2.7	63
78	Boosting Organicâ€“Metal Oxide Heterojunction via Conjugated Small Molecules for Efficient and Stable Nonfullerene Polymer Solar Cells. Advanced Energy Materials, 2019, 9, 1900887.	10.2	62
79	Tungsten as â€œAdhesiveâ€•in Pt₂CuW_{0.25} Ternary Alloy for Highly Durable Oxygen Reduction Electrocatalysis. Advanced Functional Materials, 2020, 30, 1908230.	7.8	59
80	Synergistically Enhanced Oxygen Reduction Electrocatalysis by Subsurface Atoms in Ternary PdCuNi Alloy Catalysts. Advanced Functional Materials, 2018, 28, 1707219.	7.8	58
81	The Exploration of Carrier Behavior in the Inverted Mixed Perovskite Singleâ€Crystal Solar Cells. Advanced Materials Interfaces, 2018, 5, 1800224.	1.9	58
82	Efficiency above 12% for 1 cm² Flexible Organic Solar Cells with Ag/Cu Grid Transparent Conducting Electrode. Advanced Science, 2019, 6, 1901490.	5.6	58
83	Quantitative o perando visualization of the energy band depth profile in solar cells. Nature Communications, 2015, 6, 7745.	5.8	57
84	Passivation of surface states in the ZnO nanowire with thermally evaporated copper phthalocyanine for hybrid photodetectors. Nanoscale, 2013, 5, 4162.	2.8	55
85	Unraveling the Growth of Hierarchical Quasi-2D/3D Perovskite and Carrier Dynamics. Journal of Physical Chemistry Letters, 2018, 9, 1124-1132.	2.1	52
86	Luminescence Properties of Eu(III) Complex/Polyvinylpyrrolidone Electrospun Composite Nanofibers. Journal of Physical Chemistry C, 2010, 114, 3898-3903.	1.5	51
87	Contact Engineering: Electrode Materials for Highly Efficient and Stable Perovskite Solar Cells. Solar Rrl, 2017, 1, 1700082.	3.1	50
88	Stacking Effects on Electronâ€“Phonon Coupling in Layered Hybrid Perovskites via Microstrain Manipulation. ACS Nano, 2020, 14, 5806-5817.	7.3	50
89	Exciton Self-Trapping for White Emission in 100-Oriented Two-Dimensional Perovskites via Halogen Substitution. ACS Energy Letters, 2022, 7, 453-460.	8.8	50
90	Molecular Hinges Stabilize Formamidiniumâ€Based Perovskite Solar Cells with Compressive Strain. Advanced Functional Materials, 2022, 32, .	7.8	50

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91	Promoting Thermodynamic and Kinetic Stabilities of FA-based Perovskite by an in Situ Bilayer Structure. Nano Letters, 2020, 20, 3864-3871.	4.5	49
92	Si/PEDOT hybrid core/shell nanowire arrays as photoelectrodes for photoelectrochemical water-splitting. Nanoscale, 2013, 5, 5257.	2.8	48
93	Precise Composition Tailoring of Mixed-Cation Hybrid Perovskites for Efficient Solar Cells by Mixture Design Methods. ACS Nano, 2017, 11, 8804-8813.	7.3	48
94	Using Stretchable PPy@PVA Composites as a High-Sensitivity Strain Sensor To Monitor Minute Motion. ACS Applied Materials & Interfaces, 2020, 12, 45373-45382.	4.0	48
95	Ligand engineering on CdTe quantum dots in perovskite solar cells for suppressed hysteresis. Nano Energy, 2018, 46, 45-53.	8.2	46
96	New Bichromophoric Triplet Photosensitizer Designs and Their Application in Tripletâ€“Triplet Annihilation Upconversion. Advanced Optical Materials, 2018, 6, 1700981.	3.6	46
97	Metabolomic profiling of single enlarged lysosomes. Nature Methods, 2021, 18, 788-798.	9.0	46
98	One-step, low-temperature deposited perovskite solar cell utilizing small molecule additive. Journal of Photonics for Energy, 2015, 5, 057405.	0.8	45
99	Extremely low trap-state energy level perovskite solar cells passivated using NH2-POSS with improved efficiency and stability. Journal of Materials Chemistry A, 2018, 6, 6806-6814.	5.2	45
100	Strain Modulation for Lightâ€Stable nâ€“iâ€“p Perovskite/Silicon Tandem Solar Cells. Advanced Materials, 2022, 34, e2201315.	11.1	45
101	Highly efficient copper halide scintillators for high-performance and dynamic X-ray imaging. Nanoscale, 2021, 13, 19894-19902.	2.8	44
102	Understanding the Defect Properties of Quasi-2D Halide Perovskites for Photovoltaic Applications. Journal of Physical Chemistry Letters, 2020, 11, 3521-3528.	2.1	43
103	Naphtho[1,2-b:4,3-bâ€²]dithiophene-based hole transporting materials for high-performance perovskite solar cells: molecular engineering and opto-electronic properties. Journal of Materials Chemistry A, 2018, 6, 10057-10063.	5.2	41
104	Temporal and spatial pinhole constraints in small-molecule hole transport layers for stable and efficient perovskite photovoltaics. Journal of Materials Chemistry A, 2019, 7, 7338-7346.	5.2	41
105	Toward Greener Solution Processing of Perovskite Solar Cells. ACS Sustainable Chemistry and Engineering, 2020, 8, 13126-13138.	3.2	41
106	Efficient white polymer light-emitting diodes employing a silver nanowireâ€“polymer composite electrode. Physical Chemistry Chemical Physics, 2012, 14, 14249.	1.3	40
107	Energy Transfer Dynamics in Tripletâ€“Triplet Annihilation Upconversion Using a Bichromophoric Heavy-Atom-Free Sensitizer. Journal of Physical Chemistry A, 2018, 122, 6673-6682.	1.1	40
108	Vapor-assisted solution process for perovskite materials and solar cells. MRS Bulletin, 2015, 40, 667-673.	1.7	39

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109	Probing Phase Distribution in 2D Perovskites for Efficient Device Design. ACS Applied Materials & Interfaces, 2020, 12, 3127-3133.	4.0	39
110	Mixture interlayer for high performance organic-inorganic perovskite photodetectors. Applied Physics Letters, 2016, 109, .	1.5	38
111	Peryleneâ€diimideâ€based cathode interlayer materials for high performance organic solar cells. SusMat, 2022, 2, 243-263.	7.8	38
112	Solution-Processed 8-Hydroquinolatolithium as Effective Cathode Interlayer for High-Performance Polymer Solar Cells. ACS Applied Materials & Interfaces, 2016, 8, 9254-9261.	4.0	37
113	Improving the efficiency of silicon solar cells using in situ fabricated perovskite quantum dots as luminescence downshifting materials. Nanophotonics, 2020, 9, 93-100.	2.9	37
114	Circular RNA circSnx5 Controls Immunogenicity of Dendritic Cells through the miR-544/SOCS1 Axis and PU.1 Activity Regulation. Molecular Therapy, 2020, 28, 2503-2518.	3.7	36
115	Heterogeneously supported pseudo-single atom Pt as sustainable hydrosilylation catalyst. Nano Research, 2018, 11, 2544-2552.	5.8	34
116	Efficient X-ray Attenuation Lead-Free AgBi₂I₇ Halide Rudorffite Alternative for Sensitive and Stable X-ray Detection. Journal of Physical Chemistry Letters, 2020, 11, 7939-7945.	2.1	34
117	Imaging metal-like monoclinic phase stabilized by surface coordination effect in vanadium dioxide nanobeam. Nature Communications, 2017, 8, 15561.	5.8	33
118	Efficient and visual monitoring of cerium (III) ions by green-fluorescent carbon dots and paper-based sensing. Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy, 2019, 206, 240-245.	2.0	33
119	Introducing fluorene into organic hole transport materials to improve mobility and photovoltage for perovskite solar cells. Chemical Communications, 2019, 55, 13406-13409.	2.2	33
120	An Efficient and Stable Perovskite Solar Cell with Suppressed Defects by Employing Dithizone as a Lead Indicator. Angewandte Chemie - International Edition, 2020, 59, 21409-21413.	7.2	33
121	Surface Reconstruction and In Situ Formation of 2D Layer for Efficient and Stable 2D/3D Perovskite Solar Cells. Small Methods, 2021, 5, e2101000.	4.6	33
122	Interface engineering in solid state Li metal batteries by quasi-2D hybrid perovskites. Journal of Materials Chemistry A, 2018, 6, 20896-20903.	5.2	32
123	Functional Scanning Force Microscopy for Energy Nanodevices. Advanced Materials, 2018, 30, e1802490.	11.1	32
124	Rationally Induced Interfacial Dipole in Planar Heterojunction Perovskite Solar Cells for Reduced Jâ€“V Hysteresis. Advanced Energy Materials, 2018, 8, 1800568.	10.2	32
125	Surface Sulfuration of NiO Boosts the Performance of Inverted Perovskite Solar Cells. Solar Rrl, 2020, 4, 2000270.	3.1	31
126	Contactless Characterization of Electronic Properties of Nanomaterials Using Dielectric Force Microscopy. Journal of Physical Chemistry C, 2012, 116, 7158-7163.	1.5	30

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127	From Distortion to Disconnection: Linear Alkyl Diammonium Cations Tune Structure and Photoluminescence of Lead Bromide Perovskites. Advanced Optical Materials, 2020, 8, 1902051.	3.6	30
128	Microstructure Formation and Property of Chitosan-Poly(acrylic acid) Nanoparticles Prepared by Macromolecular Complex. Macromolecular Bioscience, 2005, 5, 993-1000.	2.1	29
129	Tuning indium tin oxide work function with solution-processed alkali carbonate interfacial layers for high-efficiency inverted organic photovoltaic cells. Nanotechnology, 2013, 24, 484011.	1.3	29
130	Facile single-component precursor for Cu2ZnSnS4 with enhanced phase and composition controllability. Energy and Environmental Science, 2014, 7, 998.	15.6	29
131	Universal and versatile morphology engineering via hot fluorous solvent soaking for organic bulk heterojunction. Nature Communications, 2020, 11, 5585.	5.8	29
132	Cation Diffusion Guides Hybrid Halide Perovskite Crystallization during the Gel Stage. Angewandte Chemie - International Edition, 2020, 59, 5979-5987.	7.2	29
133	Energyâ€Level Modulation in Diboronâ€Modified SnO₂ for Highâ€Efficiency Perovskite Solar Cells. Solar Rrl, 2020, 4, 1900217.	3.1	28
134	Structure dependence in hybrid Si nanowire/poly(3,4-ethylenedioxythiophene):poly(styrenesulfonate) solar cells: Understanding photovoltaic conversion in nanowire radial junctions. Applied Physics Letters, 2012, 100, 023112.	1.5	27
135	Propeller-Shaped, Triarylamine-Rich, and Dopant-Free Hole-Transporting Materials for Efficient nâ€“iâ€“p Perovskite Solar Cells. ACS Applied Materials & Interfaces, 2018, 10, 41592-41598.	4.0	27
136	Processing Halide Perovskite Materials with Semiconductor Technology. Advanced Materials Technologies, 2019, 4, 1800729.	3.0	27
137	The Role of Surface Termination in Halide Perovskites for Efficient Photocatalytic Synthesis. Angewandte Chemie - International Edition, 2020, 59, 12931-12937.	7.2	27
138	Insights into Largeâ€Scale Fabrication Methods in Perovskite Photovoltaics. Advanced Energy and Sustainability Research, 2021, 2, 2000046.	2.8	27
139	Heterogeneously integrated, superconducting silicon-photonic platform for measurement-device-independent quantum key distribution. Advanced Photonics, 2021, 3, .	6.2	27
140	External load-dependent degradation of P3HT:PC₆₁BM solar cells: behavior, mechanism, and method of suppression. Journal of Materials Chemistry A, 2017, 5, 10010-10020.	5.2	26
141	Thermal Management Enables More Efficient and Stable Perovskite Solar Cells. ACS Energy Letters, 2021, 6, 3029-3036.	8.8	26
142	Bright Long-Lived Luminescence of Silicon Nanocrystals Sensitized by Two-Photon Absorbing Antenna. CheM, 2017, 2, 550-560.	5.8	25
143	Reduction of intrinsic defects in hybrid perovskite films via precursor purification. Chemical Communications, 2017, 53, 10548-10551.	2.2	25
144	Bismuth ferrite: an abnormal perovskite with electrochemical extraction of ions from A site. Journal of Materials Chemistry A, 2019, 7, 12176-12190.	5.2	25

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145	Stabilizing RbPbBr₃ Perovskite Nanocrystals through Cs⁺ Substitution. Chemistry - A European Journal, 2019, 25, 2597-2603.	1.7	25
146	Iridescent graphene/cellulose nanocrystal film with water response and highly electrical conductivity. RSC Advances, 2016, 6, 93673-93679.	1.7	24
147	Energy band alignment in operando inverted structure P3HT:PCBM organic solar cells. Nano Energy, 2017, 40, 454-461.	8.2	23
148	Solvent Free Laminated Fabrication of Lead Halide Perovskites for Sensitive and Stable X-ray Detection. Journal of Physical Chemistry Letters, 2021, 12, 6961-6966.	2.1	23
149	Ambient stable large-area flexible organic solar cells using silver grid hybrid with vapor phase polymerized poly(3,4-Ethylenedioxythiophene) cathode. Solar Energy Materials and Solar Cells, 2015, 143, 354-359.	3.0	22
150	Partial ligand exchange as a critical approach to the synthesis of transparent ytterbium fluorideâ€“polymer nanocomposite monoliths for gamma ray scintillation. Journal of Materials Chemistry C, 2016, 4, 3654-3660.	2.7	22
151	Photon management for efficient hybrid perovskite solar cells via synergetic localized grating and enhanced fluorescence effect. Nano Energy, 2017, 40, 540-549.	8.2	22
152	Two Low-Cost and Efficient Hole-Transporting Materials for nâ€“iâ€“p Type Organicâ€“Inorganic Hybrid Perovskite Solar Cells. ACS Omega, 2018, 3, 10791-10797.	1.6	22
153	Effects of CsPbBr3 nanocrystals concentration on electronic structure and surface composition of perovskite films. Organic Electronics, 2019, 73, 327-331.	1.4	22
154	Recent Progress in Developing Monolithic Perovskite/Si Tandem Solar Cells. Frontiers in Chemistry, 2020, 8, 603375.	1.8	22
155	Cation Diffusion Guides Hybrid Halide Perovskite Crystallization during the Gel Stage. Angewandte Chemie, 2020, 132, 6035-6043.	1.6	22
156	New Features of Photochemical Decomposition of Hybrid Lead Halide Perovskites by Laser Irradiation. ACS Applied Materials & Interfaces, 2020, 12, 12755-12762.	4.0	21
157	Rh(III)-Catalyzed Chemodivergent Coupling of N-Phenoxyacetamides and Alkylidenecyclopropanes via Câ€“H Activation. Organic Letters, 2021, 23, 2927-2932.	2.4	21
158	Avoiding Structural Collapse to Reduce Lead Leakage in Perovskite Photovoltaics. Angewandte Chemie - International Edition, 2022, 61, .	7.2	21
159	Effect of multi-walled carbon nanotubes on the morphology evolution, conductivity and rheological behaviors of poly(methyl methacrylate)/poly(styrene-co-acrylonitrile) blends during isothermal annealing. RSC Advances, 2016, 6, 10099-10113.	1.7	20
160	Zinc Stannate Nanostructures for Energy Conversion^{â€}. Chinese Journal of Chemistry, 2021, 39, 367-380.	2.6	20
161	Optimized MoP with Pseudo-Single-Atom Tungsten for Efficient Hydrogen Electrocatalysis. Chemistry of Materials, 2021, 33, 3639-3649.	3.2	20
162	Mobile Media Promotes Orientation of 2D/3D Hybrid Lead Halide Perovskite for Efficient Solar Cells. ACS Nano, 2021, 15, 8350-8362.	7.3	20

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163	Improved photomultiplication in inverted-structure organic photodetectors via interfacial engineering. Applied Physics Letters, 2018, 113, .	1.5	19
164	Pyrrolidinium containing perovskites with thermal stability and water resistance for photovoltaics. Journal of Materials Chemistry C, 2019, 7, 11104-11108.	2.7	19
165	9,9-Dimethyl Dihydroacridine-Based Organic Photocatalyst for Atom Transfer Radical Polymerization from Modifying â€œUnstableâ€•Electron Donor. Macromolecules, 2020, 53, 7053-7062.	2.2	19
166	Anionsâ€Exchangeâ€Induced Efficient Carrier Transport at CsPbBr_xCl_{3â€x}/TiO₂ Interface for Photocatalytic Activation of C(sp³)â”H bond in Toluene Oxidation. ChemCatChem, 2021, 13, 2592-2598.	1.8	19
167	Rational Design and Facile Synthesis of Dualâ€State Emission Fluorophores: Expanding Functionality for the Sensitive Detection of Nitroaromatic Compounds. Chemistry - A European Journal, 2022, 28, .	1.7	19
168	Camel milk modulates the gut microbiota and has anti-inflammatory effects in a mouse model of colitis. Journal of Dairy Science, 2022, 105, 3782-3793.	1.4	19
169	Balancing Energy-Level Difference for Efficient n-i-p Perovskite Solar Cells with Cu Electrode. Energy Material Advances, 2022, 2022, .	4.7	19
170	Fluorescent Recognition of 1,2â€Diamines by a 1,1â€²â€Binaphthylâ€Based Trifluoromethyl Ketone. Chemistry - A European Journal, 2016, 22, 12061-12067.	1.7	18
171	Human Hyperekplexic Mutations in Glycine Receptors Disinhibit the Brainstem by Hijacking GABAA Receptors. IScience, 2019, 19, 634-646.	1.9	18
172	Circulating Exosomes Control CD4+ T Cell Immunometabolic Functions via the Transfer of miR-142 as a Novel Mediator in Myocarditis. Molecular Therapy, 2020, 28, 2605-2620.	3.7	18
173	Carrier transport composites with suppressed glass-transition for stable planar perovskite solar cells. Journal of Materials Chemistry A, 2020, 8, 14106-14113.	5.2	18
174	Light-induced beneficial ion accumulation for high-performance quasi-2D perovskite solar cells. Energy and Environmental Science, 2022, 15, 2499-2507.	15.6	18
175	Metabolic reprogramming orchestrates CD4+ T-cell immunological status and restores cardiac dysfunction in autoimmune induced-dilated cardiomyopathy mice. Journal of Molecular and Cellular Cardiology, 2019, 135, 134-148.	0.9	17
176	Superparamagnetic Reduced Graphene Oxide with Large Magnetoresistance: A Surface Modulation Strategy. Angewandte Chemie - International Edition, 2016, 55, 3176-3180.	7.2	16
177	<scp>Heterojunctionâ€Type</scp> Photocatalytic System Based on Inorganic Halide Perovskite <scp>CsPbBr₃</scp>^{â€}. Chinese Journal of Chemistry, 2020, 38, 1718-1722.	2.6	16
178	Simple inorganic base promoted polycyclic construction using mucohalic acid as a C₃ synthon: synthesis and AIE probe application of benzo[4,5]imidazo[1,2-a]pyridines. Organic Chemistry Frontiers, 2022, 9, 1127-1136.	2.3	16
179	Stability evolution of ultrafine Ag nanoparticles prepared by laser ablation in liquids. Journal of Colloid and Interface Science, 2021, 585, 444-451.	5.0	15
180	Conjugated polymers for radiation detection. Annual Reports on the Progress of Chemistry Section C, 2011, 107, 298.	4.4	14

#	Article	IF	Citations
181	Enhanced Hot-Carrier Luminescence in Multilayer Reduced Graphene Oxide Nanospheres. Scientific Reports, 2013, 3, 2315.	1.6	14
182	Greatly Enhanced Fluorescence by Increasing the Structural Rigidity of an Imine: Enantioselective Recognition of 1,2â€Cyclohexanediamine by a Chiral Aldehyde. Chemistry - A European Journal, 2016, 22, 5963-5968.	1.7	14
183	Synthetic Biology Toolkits and Metabolic Engineering Applied in Corynebacterium glutamicum for Biomanufacturing. ACS Synthetic Biology, 2021, 10, 3237-3250.	1.9	14
184	Extracellular vesicleâ€packaged mitochondrial disturbing miRNA exacerbates cardiac injury during acute myocardial infarction. Clinical and Translational Medicine, 2022, 12, e779.	1.7	14
185	High Proton Selectivity Sulfonated Polyimides Ion Exchange Membranes for Vanadium Flow Batteries. Polymers, 2018, 10, 1315.	2.0	13
186	Efficient Moistureâ€Resistant Perovskite Solar Cell With Nanostructure Featuring 3D Amine Motif. Solar Rrl, 2018, 2, 1800069.	3.1	13
187	3D nanomaterial silica aerogel via diffusion of chiral compound driven broadband reflection in chiral nematic liquid crystals. Liquid Crystals, 2019, 46, 952-962.	0.9	13
188	In Operando Visualization of Interfacial Band Bending in Photomultiplying Organic Photodetectors. Nano Letters, 2021, 21, 8474-8480.	4.5	13
189	Operando surface science methodology reveals surface effect in charge storage electrodes. National Science Review, 2021, 8, nwaa289.	4.6	13
190	Fast naked-eye detection of amines with viologen derivatives. Supramolecular Chemistry, 2013, 25, 344-348.	1.5	12
191	Lewis Acid Assisted Dielsâ€“Alder Reaction with Regio- and Stereoselectivity: Anti-1,4-Adducts with Rigid Scaffolds and Their Application in Explosives Sensing. Organic Letters, 2015, 17, 5016-5019.	2.4	12
192	Highly selective ratiometric fluorescent recognition of histidine by tetraphenyletheneâ€“terpyridineâ€“Zn(ii) complexes. RSC Advances, 2016, 6, 25319-25329.	1.7	12
193	Bulky ammonium iodide and in-situ formed 2D Ruddlesden-Popper layer enhances the stability and efficiency of perovskite solar cells. Journal of Colloid and Interface Science, 2022, 614, 247-255.	5.0	12
194	Understanding the effects of the energy band alignment at the donor/acceptor interface on the open circuit voltage of organic photovoltaic devices. Chemical Physics Letters, 2018, 711, 113-117.	1.2	11
195	The effect of trait anxiety on riskâ€taking: Functional coupling between right hippocampus and left insula. Psychophysiology, 2020, 57, e13629.	1.2	11
196	Amidinium additives for high-performance perovskite solar cells. Journal of Materials Chemistry A, 2022, 10, 3506-3512.	5.2	11
197	30% Enhancement of Efficiency in Layered 2D Perovskites Absorbers by Employing Homoâ€Tandem Structures. Solar Rrl, 2019, 3, 1900083.	3.1	10
198	Fabricating Surface-Functionalized CsPbBr3/Cs4PbBr6 Nanosheets for Visible-Light Photocatalytic Oxidation of Styrene. Frontiers in Chemistry, 2020, 8, 130.	1.8	10

#	Article	IF	Citations
199	Interface-enhanced thermoelectric output power in CrN/SrTiO3â˜ heterostructure. Journal of Energy Chemistry, 2022, 64, 16-22.	7.1	10
200	Superparamagnetic Reduced Graphene Oxide with Large Magnetoresistance: A Surface Modulation Strategy. Angewandte Chemie, 2016, 128, 3228-3232.	1.6	9
201	Microstructure variations induced by excess PbX₂or AX within perovskite thin films. Chemical Communications, 2017, 53, 12966-12969.	2.2	9
202	Enhanced Triplet Sensitizing Ability of an Iridium Complex by Intramolecular Energy-Transfer Mechanism. Journal of Physical Chemistry A, 2018, 122, 6963-6969.	1.1	9
203	Building a Cocrystal by Using Supramolecular Synthons for Pressureâ€Accelerated Heteromolecular Azideâ€“Alkyne Cycloaddition. Chemistry - A European Journal, 2019, 25, 7142-7148.	1.7	9
204	Optical and dielectric analysis of ZnO nanorods doped polymer dispersed liquid crystal and ethanol gas sensing investigation. Liquid Crystals, 2020, 47, 2247-2256.	0.9	9
205	Ultralow contents of AgNbO3 fibers induced high energy storage density in ferroelectric polymer nanocomposites. Applied Physics Letters, 2022, 120, .	1.5	9
206	Frequency up-converted lasing in polymeric composites with two-photon absorbing antenna. Optics Express, 2012, 20, 9135.	1.7	8
207	Applications of fluorene moiety containing polymers for improved scintillation light yield. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2017, 868, 59-65.	0.7	8
208	Effects of Iodine Doping on Carrier Behavior at the Interface of Perovskite Crystals: Efficiency and Stability. Crystals, 2018, 8, 185.	1.0	8
209	In-situ Interfacial Passivation for Stable Perovskite Solar Cells. Frontiers in Materials, 2019, 6, .	1.2	8
210	Protosappanin A protects against experimental autoimmune myocarditis, and induces metabolically reprogrammed tolerogenic DCs. Pharmacological Research, 2019, 146, 104269.	3.1	8
211	Neural basis responsible for episodic future thinking effects on procrastination: The interaction between the cognitive control pathway and emotional processing pathway. Cortex, 2021, 145, 250-263.	1.1	8
212	Curing kinetics and structural changes of a of di[(N-m-acetenylphenyl) phthalimide] ether/[(methyl) diphenylacetylene] silane copolymer. Journal of Applied Polymer Science, 2006, 100, 2126-2130.	1.3	7
213	Momentary lapses of attention in multisensory environment. Cortex, 2020, 131, 195-209.	1.1	7
214	Long-Lived Triplet Excited-State Bichromophoric Iridium Photocatalysts for Controlled Photo-Mediated Atom-Transfer Radical Polymerization. Macromolecules, 2021, 54, 6117-6126.	2.2	7
215	Polarized Molecule 4-(Aminomethyl) Benzonitrile Hydrochloride for Efficient and Stable Perovskite Solar Cells. ACS Applied Materials & Interfaces, 2022, 14, 33383-33391.	4.0	7
216	Thermal, morphological, and physicomechanical properties of (chlorinated polyethylene) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 62 Td (ru	1.8	6

#	Article	IF	Citations
217	Fabrication of chitosan/PEO nanofiber mats with mica by electrospinning. Journal of Polymer Engineering, 2017, 37, 461-470.	0.6	6
218	Crown ether-induced supramolecular passivation and two-dimensional crystal interlayer formation in perovskite photovoltaics. Cell Reports Physical Science, 2021, 2, 100450.	2.8	6
219	Abnormal brain functional network dynamics in <scp>obsessiveâ€“compulsive</scp> disorder patients and their unaffected <scp>firstâ€degree</scp> relatives. Human Brain Mapping, 2021, 42, 4387-4398.	1.9	6
220	Recent Progress in Designing Halide-Perovskite-Based System for the Photocatalytic Applications. Frontiers in Chemistry, 2020, 8, 613174.	1.8	6
221	Task demands modulate pre-stimulus alpha frequency and sensory template during bistable apparent motion perception. Cerebral Cortex, 2023, 33, 1679-1692.	1.6	6
222	Two-photon-pumped optical gain in dye-polymer composite materials. Applied Physics Letters, 2012, 100, 133305.	1.5	5
223	Rapid mechanochemical preparation of a sandwich-like charge transfer complex. CrystEngComm, 2013, 15, 4413.	1.3	5
224	Effect of Waste Paper Fiber on Properties of Cement-based Mortar and Relative Mechanism. Journal Wuhan University of Technology, Materials Science Edition, 2018, 33, 419-426.	0.4	5
225	White Matter Alterations of the Goal-Directed System in Patients With Obsessive-Compulsive Disorder and Their Unaffected First-Degree Relatives. Biological Psychiatry: Cognitive Neuroscience and Neuroimaging, 2020, 6, 992-1001.	1.1	5
226	The neural mechanism of spatial-positional association in working memory: A fMRI study. Brain and Cognition, 2021, 152, 105756.	0.8	5
227	A Facile Approach towards Fabrication of Electrospun Nanofibrous Mats based Multicompartment Wound Dressing Fabric. Macromolecular Research, 2018, 26, 1265-1272.	1.0	4
228	A new contrast-to-noise ratio for image quality characterization of a coded-aperture Î³ camera. Applied Radiation and Isotopes, 2021, 170, 109592.	0.7	4
229	N-alkylation briefly constructs tunable multifunctional sensor materials: Multianalyte detection and reversible adsorption. IScience, 2021, 24, 103126.	1.9	4
230	Enhanced domain wall conductivity in photosensitive ferroelectrics Sn2P2S6 with full-visible-spectrum absorption. Science China Materials, 2022, 65, 1049-1056.	3.5	4
231	Connectome-based predictive modeling of compulsion in obsessiveâ€“compulsive disorder. Cerebral Cortex, 2023, 33, 1412-1425.	1.6	4
232	Imbalance in functional and structural connectivity underlying goal-directed and habitual learning systems in obsessive-compulsive disorder. Cerebral Cortex, 2022, 32, 3690-3705.	1.6	4
233	Cost Analysis of Perovskite/Cu(In,Ga)Se₂ Tandem Photovoltaic with Module Replacement. ACS Energy Letters, 2022, 7, 1920-1925.	8.8	4
234	Probe the Effects of Surface Adsorbates on ZnO Nanowire Conductivity using Dielectric Force Microscopy. Chinese Journal of Chemical Physics, 2014, 27, 582-586.	0.6	3

#	Article	IF	Citations
235	A general approach for nanoparticle composite transport materials toward efficient perovskite solar cells. Chemical Communications, 2017, 53, 11028-11031.	2.2	3
236	Circuit-level ESD protection simulation using behavior models in 28nm CMOS. , 2017, , .		3
237	A Strategy toward New Lowâ€Dimensional Hybrid Halide Perovskites with Anionic Spacers. Small, 2019, 15, e1804152.	5.2	3
238	Formation of nanodiamond by pulsed discharge of carbon fiber wires. Applied Physics Letters, 2020, 117, .	1.5	3
239	Crystal Chemical Insights on Lead Iodide Perovskites Doping from Revised Effective Radii of Metal Ions. , 2021, 3, 1377-1384.		3
240	Tailoring molecular termination for thermally stable perovskite solar cells. Journal of Semiconductors, 2021, 42, 112201.	2.0	3
241	The accuracy improvement of sap flow prediction in Picea crassifolia Kom. based on the backâ€propagation neural network model. Hydrological Processes, 2022, 36, .	1.1	3
242	Modification of FA0.85MA0.15Pb(I0.85Br0.15)3 Films by NH2-POSS. Crystals, 2021, 11, 1544.	1.0	3
243	A NaHCO₃ Promoted Threeâ€component Cyclization: Easy Access to Benzodisulfide Heterocycles. Asian Journal of Organic Chemistry, 2022, 11, .	1.3	3
244	Quantitative Analysis of Pb with Laser-Induced Breakdown Spectroscopy in Human's Nail. , 2012, , .		2
245	Simultaneous performance and stability improvement of perovskite solar cells by a sequential twice anti-solvent deposition process. Organic Electronics, 2018, 59, 358-365.	1.4	2
246	The Role of Surface Termination in Halide Perovskites for Efficient Photocatalytic Synthesis. Angewandte Chemie, 2020, 132, 13031-13037.	1.6	2
247	Improving the Photomultiplication in Organic Photodetectors with Narrowband Response by Interfacial Engineering. Acta Chimica Sinica, 2021, 79, 1030.	0.5	2
248	Quantitative amplitude-modulation scanning Kelvin probe microscopy via the second eigenmode excitation. Ultramicroscopy, 2021, 230, 113399.	0.8	2
249	Direct observation of contact potential distributions of wafer-bonded p-GaAs/n-GaN and p-GaAs/n-Si by scanning Kelvin probe force microscopy. Japanese Journal of Applied Physics, 2020, 59, 115502.	0.8	2
250	Dielectric force microscopy: A new approach for observing charge behavior in nanomaterials. Scientia Sinica Chimica, 2013, 43, 1806.	0.2	2
251	High-Performance Perovskite Solar Cells by Doping Didodecyl Dimethyl Ammonium Bromide in the Hole Transport Layer. ACS Applied Energy Materials, 2021, 4, 13471-13481.	2.5	2
252	Interfacial Defect Passivation Effect of N-Methyl-N-(thien-2-ylmethyl)amine for Highly Effective Perovskite Solar Cells. ACS Applied Energy Materials, 2022, 5, 4270-4278.	2.5	2

#	Article	IF	Citations
253	Impaired body-centred sensorimotor transformations in congenitally deaf people. Brain Communications, 2022, 4, .	1.5	2
254	Numerical Modelling and Analysis of Infrared Testing in Delaminations of Pressurepipes Using ANSYS. , 2012, , .		1
255	Synthesis of transparent nanocomposite monoliths for gamma scintillation. , 2015, , .		1
256	An Efficient and Stable Perovskite Solar Cell with Suppressed Defects by Employing Dithizone as a Lead Indicator. Angewandte Chemie, 2020, 132, 21593-21597.	1.6	1
257	Compositional Engineering for Compact Perovskite Absorber Fabrication Toward Efficient Photovoltaics. IEEE Journal of Photovoltaics, 2020, 10, 765-770.	1.5	1
258	Interface charge accumulation dynamics in 3D and quasi-2D perovskite solar cells. Journal Physics D: Applied Physics, 2021, 54, 014004.	1.3	1
259	Charge Emissions from the Plasma Photogerated in Channels of SWNTs. , 2006, , .		0
260	Studies of computer simulation of water transport in plants. , 2010, , .		0
261	The enthalpies and kinetic of dissolution of diterpenoid derivativeâ€”paclitaxel in aqueous NaCl solutions at 309.5 K. Russian Journal of Physical Chemistry A, 2013, 87, 1276-1279.	0.1	0
262	Experimental Demonstration of Superconducting Series Nanowire Photon-Number-Resolving Detector at 660 nm Wavelength. IEEE Photonics Journal, 2019, 11, 1-8.	1.0	0
263	Metal-substituted organic-inorganic perovskite photovoltaic device performance and hysteresis behavior. Chinese Science Bulletin, 2019, 64, 1084-1093.	0.4	0
264	Bright future of polymerizing small-molecule acceptors in realizing high performance all-polymer solar cells. Frontiers of Chemical Science and Engineering, 0, , 1.	2.3	0