## Improving the stability and performance of perovskite post-device ligand treatment

Energy and Environmental Science 11, 2253-2262 DOI: 10.1039/c8ee00580j

**Citation Report** 

#	Article	IF	CITATIONS
1	Design and Performance Analysis of Multijunction Organic Solar Cell Exceeding 14% Efficiency. , 2018, , .		1
2	lodine Induced PbI 2 Porous Morphology Manipulation for Highâ€Performance Planar Perovskite Solar Cells. Solar Rrl, 2018, 2, 1800230.	3.1	15
3	Indium Zinc Oxide Electron Transport Layer for High-Performance Planar Perovskite Solar Cells. Journal of Physical Chemistry C, 2018, 122, 28491-28496.	1.5	10
4	Suppressed Decomposition of Perovskite Film on ZnO Via a Selfâ€Assembly Monolayer of Methoxysilane. Solar Rrl, 2018, 2, 1800240.	3.1	18
5	Superior Performance of Silver Bismuth Iodide Photovoltaics Fabricated via Dynamic Hotâ€Casting Method under Ambient Conditions. Advanced Energy Materials, 2018, 8, 1802051.	10.2	84
6	Room-temperature solution-processed amorphous NbO <sub>x</sub> as an electron transport layer in high-efficiency photovoltaics. Journal of Materials Chemistry A, 2018, 6, 17882-17888.	5.2	19
7	Recent advances toward practical use of halide perovskite nanocrystals. Journal of Materials Chemistry A, 2018, 6, 21729-21746.	5.2	84
8	Efficient Grain Boundary Suture by Low-Cost Tetra-ammonium Zinc Phthalocyanine for Stable Perovskite Solar Cells with Expanded Photoresponse. Journal of the American Chemical Society, 2018, 140, 11577-11580.	6.6	95
9	Aged Precursor Solution toward Low-Temperature Fabrication of Efficient Carbon-Based All-Inorganic Planar CsPbIBr <sub>2</sub> Perovskite Solar Cells. ACS Applied Energy Materials, 2018, 1, 4991-4997.	2.5	83
10	Postâ€Deposition Vapor Annealing Enables Fabrication of 1 cm 2 Leadâ€Free Perovskite Solar Cells. Solar Rrl, 2019, 3, 1900245.	3.1	23
11	Efficiency simulations on perovskite solar cells only using experimentally determined reflectance and transmittance data. Solar Energy Materials and Solar Cells, 2019, 201, 110039.	3.0	6
12	Role of Capped Oleyl Amine in the Moistureâ€Induced Structural Transformation of CsPbBr <sub>3</sub> Perovskite Nanocrystals. Physica Status Solidi - Rapid Research Letters, 2019, 13, 1900387.	1.2	31
13	(Co, Mn)-Doped NiSe <sub>2</sub> -diethylenetriamine (dien) nanosheets and (Co, Mn, Sn)-doped NiSe <sub>2</sub> nanowires for high performance supercapacitors: compositional/morphological evolution and (Co, Mn)-induced electron transfer. Nanoscale, 2019, 11, 16810-16827.	2.8	56
14	Enhanced Electrons Extraction of Lithium-Doped SnO\$_{2}\$ Nanoparticles for Efficient Planar Perovskite Solar Cells. IEEE Journal of Photovoltaics, 2019, 9, 1273-1279.	1.5	10
15	Highly Efficient Guanidiniumâ€Based Quasi 2D Perovskite Solar Cells via a Twoâ€6tep Postâ€Treatment Process. Small Methods, 2019, 3, 1900375.	4.6	59
16	Novel NiO Nanoforest Architecture for Efficient Inverted Mesoporous Perovskite Solar Cells. ACS Applied Materials & Interfaces, 2019, 11, 44308-44314.	4.0	27
17	Morphology control of the perovskite thin films via the surface modification of nickel oxide nanoparticles layer using a bidentate chelating ligand 2,2'-Bipyridine. Synthetic Metals, 2019, 258, 116197.	2.1	8
18	Tailoring Tripleâ€Anion Perovskite Material for Indoor Light Harvesting with Restrained Halide Segregation and Record High Efficiency Beyond 36%. Advanced Energy Materials, 2019, 9, 1901980.	10.2	122

#	Article	IF	CITATIONS
19	Optical Simulation and Investigation of the Effect of Hysteresis on the Perovskite Solar Cells. Nano, 2019, 14, 1950127.	0.5	15
20	Controlled crystal facet of MAPbI <sub>3</sub> perovskite for highly efficient and stable solar cell <i>via</i> nucleation modulation. Nanoscale, 2019, 11, 170-177.	2.8	42
21	Amine additive reactions induced by the soft Lewis acidity of Pb <sup>2+</sup> in halide perovskites. Part II: impacts of amido Pb impurities in methylammonium lead triiodide thin films. Journal of Materials Chemistry C, 2019, 7, 5244-5250.	2.7	30
22	An Air Knife–Assisted Recrystallization Method for Ambientâ€Process Planar Perovskite Solar Cells and Its Dim‣ight Harvesting. Small, 2019, 15, e1804465.	5.2	38
23	Recent Progress of Flexible Perovskite Solar Cells. Physica Status Solidi - Rapid Research Letters, 2019, 13, 1800566.	1.2	36
24	Crosslinked and dopant free hole transport materials for efficient and stable planar perovskite solar cells. Journal of Materials Chemistry A, 2019, 7, 5522-5529.	5.2	41
25	Conjugated Molecules "Bridge― Functional Ligand toward Highly Efficient and Longâ€Term Stable Perovskite Solar Cell. Advanced Functional Materials, 2019, 29, 1808119.	7.8	88
26	Bifunctional π-conjugated ligand assisted stable and efficient perovskite solar cell fabrication <i>via</i> interfacial stitching. Journal of Materials Chemistry A, 2019, 7, 16533-16540.	5.2	29
27	Reduced open-circuit voltage loss for highly efficient low-bandgap perovskite solar cells <i>via</i> suppression of silver diffusion. Journal of Materials Chemistry A, 2019, 7, 17324-17333.	5.2	37
28	Multifunctional Synthesis Approach of In:CuCrO <sub>2</sub> Nanoparticles for Hole Transport Layer in Highâ€Performance Perovskite Solar Cells. Advanced Functional Materials, 2019, 29, 1902600.	7.8	70
29	Coagulated SnO <sub>2</sub> Colloids for Highâ€Performance Planar Perovskite Solar Cells with Negligible Hysteresis and Improved Stability. Angewandte Chemie - International Edition, 2019, 58, 11497-11504.	7.2	159
30	Coagulated SnO <sub>2</sub> Colloids for Highâ€Performance Planar Perovskite Solar Cells with Negligible Hysteresis and Improved Stability. Angewandte Chemie, 2019, 131, 11621-11628.	1.6	52
31	Reversible Formation of Gold Halides in Singleâ€Crystal Hybridâ€Perovskite/Au Interface upon Biasing and Effect on Electronic Carrier Injection. Advanced Functional Materials, 2019, 29, 1900881.	7.8	40
32	The Second Spacer Cation Assisted Growth of a 2D Perovskite Film with Oriented Large Grain for Highly Efficient and Stable Solar Cells. Angewandte Chemie - International Edition, 2019, 58, 9409-9413.	7.2	118
33	The Second Spacer Cation Assisted Growth of a 2D Perovskite Film with Oriented Large Grain for Highly Efficient and Stable Solar Cells. Angewandte Chemie, 2019, 131, 9509-9513.	1.6	23
34	Radiation tolerance of perovskite solar cells under gamma ray. Organic Electronics, 2019, 71, 79-84.	1.4	40
35	Fabrication of Efficient and Stable Perovskite Solar Cells in Highâ€Humidity Environment through Traceâ€Doping of Largeâ€5ized Cations. ChemSusChem, 2019, 12, 2385-2392.	3.6	20
36	Solution-processed electron transport layer of n-doped fullerene for efficient and stable all carbon based perovskite solar cells. Journal of Materials Chemistry A, 2019, 7, 7710-7716.	5.2	29

#	Article	IF	CITATIONS
37	Interfacial defect passivation in CH3NH3PbI3 perovskite solar cells using modifying of hole transport layer. Journal of Materials Science: Materials in Electronics, 2019, 30, 6936-6946.	1.1	12
38	Perovskite Photovoltaics: The Significant Role of Ligands in Film Formation, Passivation, and Stability. Advanced Materials, 2019, 31, e1805702.	11.1	192
39	Fundamental Understanding of Photocurrent Hysteresis in Perovskite Solar Cells. Advanced Energy Materials, 2019, 9, 1803017.	10.2	224
40	Review of Novel Passivation Techniques for Efficient and Stable Perovskite Solar Cells. Solar Rrl, 2019, 3, 1800302.	3.1	139
41	Postâ€Deposition Vapor Annealing Enables Fabrication of 1 cm <sup>2</sup> Leadâ€Free Perovskite Solar Cells. Solar Rrl, 2019, 3, 1970114.	3.1	1
42	Carbon-based materials for stable, cheaper and large-scale processable perovskite solar cells. Energy and Environmental Science, 2019, 12, 3437-3472.	15.6	223
43	Microplasma-synthesized ultra-small NiO nanocrystals, a ubiquitous hole transport material. Nanoscale Advances, 2019, 1, 4915-4925.	2.2	15
44	Chemical sintering reduced grain boundary defects for stable planar perovskite solar cells. Nano Energy, 2019, 56, 741-750.	8.2	65
45	The Role of Lanthanum in a Nickel Oxideâ€Based Inverted Perovskite Solar Cell for Efficiency and Stability Improvement. ChemSusChem, 2019, 12, 518-526.	3.6	49
46	Tetraâ€ammonium Zinc Phthalocyanine to Construct a Graded 2D–3D Perovskite Interface for Efficient and Stable Solar Cells. Chinese Journal of Chemistry, 2019, 37, 30-34.	2.6	16
47	Machine Learning for Understanding Compatibility of Organic–Inorganic Hybrid Perovskites with Post-Treatment Amines. ACS Energy Letters, 2019, 4, 397-404.	8.8	78
48	Improving the performance of solution-processed small molecule OLEDs via micro-aggregation formed by an alcohol additive incorporation. Organic Electronics, 2019, 64, 252-258.	1.4	4
49	Additive Engineering for Efficient and Stable Perovskite Solar Cells. Advanced Energy Materials, 2020, 10, 1902579.	10.2	477
50	Core/Shell Nanocrystal Tailored Carrier Dynamics in Hysteresisless Perovskite Solar Cells with â^¼20% Efficiency and Long Operational Stability. Journal of Physical Chemistry Letters, 2020, 11, 591-600.	2.1	21
51	Interface modification of sputtered NiO <sub>x</sub> as the hole-transporting layer for efficient inverted planar perovskite solar cells. Journal of Materials Chemistry C, 2020, 8, 1972-1980.	2.7	66
52	Suppressing Vacancy Defects and Grain Boundaries via Ostwald Ripening for Highâ€Performance and Stable Perovskite Solar Cells. Advanced Materials, 2020, 32, e1904347.	11.1	172
53	Observing Defect Passivation of the Grain Boundary with 2â€Aminoterephthalic Acid for Efficient and Stable Perovskite Solar Cells. Angewandte Chemie, 2020, 132, 4190-4196.	1.6	29
54	Observing Defect Passivation of the Grain Boundary with 2â€Aminoterephthalic Acid for Efficient and Stable Perovskite Solar Cells. Angewandte Chemie - International Edition, 2020, 59, 4161-4167.	7.2	122

#	Article	IF	CITATIONS
55	The balance between efficiency, stability and environmental impacts in perovskite solar cells: a review. JPhys Energy, 2020, 2, 022001.	2.3	76
56	Incorporation of Nickel Ions to Enhance Integrity and Stability of Perovskite Crystal Lattice for High-Performance Planar Heterojunction Solar Cells. ACS Applied Materials & Interfaces, 2020, 12, 904-913.	4.0	13
57	Paradoxical Approach with a Hydrophilic Passivation Layer for Moisture-Stable, 23% Efficient Perovskite Solar Cells. ACS Energy Letters, 2020, 5, 3268-3275.	8.8	110
58	High efficiency and stability of perovskite solar cells from π-conjugated 5-(Fmoc-amino) valeric acid modification. Organic Electronics, 2020, 87, 105982.	1.4	8
59	Templated growth of FASnI <sub>3</sub> crystals for efficient tin perovskite solar cells. Energy and Environmental Science, 2020, 13, 2896-2902.	15.6	165
60	Resistive switching performance of fibrous crosspoint memories based on an organic–inorganic halide perovskite. Journal of Materials Chemistry C, 2020, 8, 12865-12875.	2.7	29
61	Cascade Typeâ€II 2D/3D Perovskite Heterojunctions for Enhanced Stability and Photovoltaic Efficiency. Solar Rrl, 2020, 4, 2000282.	3.1	18
62	Nitrobenzene as Additive to Improve Reproducibility and Degradation Resistance of Highly Efficient Methylammonium-Free Inverted Perovskite Solar Cells. Materials, 2020, 13, 3289.	1.3	10
63	Enhanced Passivation and Carrier Collection in Ink-Processed PbS Quantum Dot Solar Cells via a Supplementary Ligand Strategy. ACS Applied Materials & Interfaces, 2020, 12, 42217-42225.	4.0	27
64	A simple fabrication of high efficiency planar perovskite solar cells: controlled film growth with methylammonium iodide and green antisolvent sec-butyl alcohol. Journal of Materials Chemistry C, 2020, 8, 12560-12567.	2.7	15
65	Hydrophobic 2D Perovskiteâ€Modified Layer with Polyfunctional Groups for Enhanced Performance and High Moisture Stability of Perovskite Solar Cells. Solar Rrl, 2020, 4, 2000647.	3.1	16
66	Self-charging flexible solar capacitors based on integrated perovskite solar cells and quasi-solid-state supercapacitors fabricated at low temperature. Journal of Power Sources, 2020, 479, 229046.	4.0	25
67	Towards commercialization: the operational stability of perovskite solar cells. Chemical Society Reviews, 2020, 49, 8235-8286.	18.7	371
68	Role of formamidinium in the crystallization of FAxMA1-xPbI3-yCly perovskite via recrystallization-assisted bath-immersion sequential ambient deposition. Journal of Power Sources, 2020, 477, 228736.	4.0	3
69	Critical Role of Functional Groups in Defect Passivation and Energy Band Modulation in Efficient and Stable Inverted Perovskite Solar Cells Exceeding 21% Efficiency. ACS Applied Materials & Interfaces, 2020, 12, 57165-57173.	4.0	24
70	Bilateral Interface Engineering for Efficient and Stable Perovskite Solar Cells Using Phenylethylammonium Iodide. ACS Applied Materials & Interfaces, 2020, 12, 24827-24836.	4.0	27
71	Progress in Materials Development for the Rapid Efficiency Advancement of Perovskite Solar Cells. Small, 2020, 16, e1907531.	5.2	23
72	Perovskite Test: A High Throughput Method to Screen Ambient Encapsulation Conditions. Energy Technology, 2020, 8, 2000041.	1.8	4

#	Article	IF	CITATIONS
73	Recent advances and comprehensive insights on nickel oxide in emerging optoelectronic devices. Sustainable Energy and Fuels, 2020, 4, 4415-4458.	2.5	33
74	Realizing Stable Artificial Photon Energy Harvesting Based on Perovskite Solar Cells for Diverse Applications. Small, 2020, 16, e1906681.	5.2	29
75	Steering the electron transport properties of pyridine-functionalized fullerene derivatives in inverted perovskite solar cells: the nitrogen site matters. Journal of Materials Chemistry A, 2020, 8, 3872-3881.	5.2	25
76	Coupling halide perovskites with different materials: From doping to nanocomposites, beyond photovoltaics. Progress in Materials Science, 2020, 110, 100639.	16.0	38
77	Permanent Lattice Compression of Lead-Halide Perovskite for Persistently Enhanced Optoelectronic Properties. ACS Energy Letters, 2020, 5, 642-649.	8.8	52
78	Lead Acetate Assisted Interface Engineering for Highly Efficient and Stable Perovskite Solar Cells. ACS Applied Materials & Interfaces, 2020, 12, 7186-7197.	4.0	20
79	In Situ Observation of Vapor-Assisted 2D–3D Heterostructure Formation for Stable and Efficient Perovskite Solar Cells. Nano Letters, 2020, 20, 1296-1304.	4.5	65
80	1000 h Operational Lifetime Perovskite Solar Cells by Ambient Melting Encapsulation. Advanced Energy Materials, 2020, 10, 1902472.	10.2	98
81	Dimensionality-Controlled Surface Passivation for Enhancing Performance and Stability of Perovskite Solar Cells via Triethylenetetramine Vapor. ACS Applied Materials & Interfaces, 2020, 12, 6651-6661.	4.0	29
82	Metaâ€Stable Molecular Configuration Enables Thermally Stable and Solution Processable Organic Charge Transporting Materials. Advanced Functional Materials, 2020, 30, 2000729.	7.8	3
83	Recent progress in morphology optimization in perovskite solar cell. Journal of Materials Chemistry A, 2020, 8, 21356-21386.	5.2	159
84	The effect of ethylene-amine ligands enhancing performance and stability of perovskite solar cells. Journal of Power Sources, 2020, 463, 228210.	4.0	19
85	Highâ€Efficiency Perovskite Solar Cells Enabled by Anatase TiO <sub>2</sub> Nanopyramid Arrays with an Oriented Electric Field. Angewandte Chemie - International Edition, 2020, 59, 11969-11976.	7.2	76
86	Highâ€Efficiency Perovskite Solar Cells Enabled by Anatase TiO <sub>2</sub> Nanopyramid Arrays with an Oriented Electric Field. Angewandte Chemie, 2020, 132, 12067-12074.	1.6	15
87	Tetrazole modulated perovskite films for efficient solar cells with improved moisture stability. Chemical Engineering Journal, 2021, 420, 127579.	6.6	14
88	Highly Efficient and Stable Perovskite Solar Cells Enabled by Low ost Industrial Organic Pigment Coating. Angewandte Chemie, 2021, 133, 2515-2522.	1.6	11
89	Highly Efficient and Stable Perovskite Solar Cells Enabled by Lowâ€Cost Industrial Organic Pigment Coating. Angewandte Chemie - International Edition, 2021, 60, 2485-2492.	7.2	66
90	Highly efficient and stable perovskite solar cells produced by maximizing additive engineering. Sustainable Energy and Fuels, 2021, 5, 469-477.	2.5	8

#	Article	IF	CITATIONS
91	A synchronous defect passivation strategy for constructing high-performance and stable planar perovskite solar cells. Chemical Engineering Journal, 2021, 413, 127387.	6.6	40
92	An <i>in situ</i> bifacial passivation strategy for flexible perovskite solar module with mechanical robustness by roll-to-roll fabrication. Journal of Materials Chemistry A, 2021, 9, 5759-5768.	5.2	48
93	Highly efficient self-powered perovskite photodiode with an electron-blocking hole-transport NiOx layer. Scientific Reports, 2021, 11, 169.	1.6	31
94	NiCo <sub>2</sub> O <sub>4</sub> arrays with a tailored morphology as hole transport layers of perovskite solar cells. Dalton Transactions, 2021, 50, 5845-5852.	1.6	9
95	Scalable Fabrication of >90 cm <sup>2</sup> Perovskite Solar Modules with >1000 h Operational Stability Based on the Intermediate Phase Strategy. Advanced Energy Materials, 2021, 11, 2003712.	10.2	76
96	Lowâ€Dimensionalâ€Networked Perovskites with Aâ€Siteâ€Cation Engineering for Optoelectronic Devices. Small Methods, 2021, 5, e2001147.	4.6	27
97	Pushing commercialization of perovskite solar cells by improving their intrinsic stability. Energy and Environmental Science, 2021, 14, 3233-3255.	15.6	166
98	Chlorophyll Derivative-Sensitized TiO <sub>2</sub> Electron Transport Layer for Record Efficiency of Cs <sub>2</sub> AgBiBr <sub>6</sub> Double Perovskite Solar Cells. Journal of the American Chemical Society, 2021, 143, 2207-2211.	6.6	154
99	Stable tin perovskite solar cells enabled by widening the time window for crystallization. Science China Materials, 2021, 64, 1849-1857.	3.5	10
100	Multifunctional Chemical Bridge and Defect Passivation for Highly Efficient Inverted Perovskite Solar Cells. ACS Energy Letters, 0, , 1596-1606.	8.8	115
101	Assessment of Molecular Additives on the Lifetime of Carbon-Based Mesoporous Perovskite Solar Cells. Energies, 2021, 14, 1947.	1.6	4
102	Spacer Engineering Using Aromatic Formamidinium in 2D/3D Hybrid Perovskites for Highly Efficient Solar Cells. ACS Nano, 2021, 15, 7811-7820.	7.3	99
103	Functionalized Ionic Liquid-Crystal Additive for Perovskite Solar Cells with High Efficiency and Excellent Moisture Stability. ACS Applied Materials & Interfaces, 2021, 13, 17677-17689.	4.0	26
104	Achieving Resistance against Moisture and Oxygen for Perovskite Solar Cells with High Efficiency and Stability. Chemistry of Materials, 2021, 33, 4269-4303.	3.2	51
105	Effective carrier transport tuning of CuOx quantum dots hole interfacial layer for high-performance inverted perovskite solar cell. Applied Surface Science, 2021, 547, 149117.	3.1	19
106	Defect Passivation by a D–A–D Type Hole-Transporting Interfacial Layer for Efficient and Stable Perovskite Solar Cells. ACS Energy Letters, 2021, 6, 2030-2037.	8.8	50
107	Fluorinated Oligomer Wrapped Perovskite Crystals for Inverted MAPbI <sub>3</sub> Solar Cells with 21% Efficiency and Enhanced Stability. ACS Applied Materials & Interfaces, 2021, 13, 26093-26101.	4.0	18
108	Transition of the NiO <sub><i>x</i></sub> Buffer Layer from a p-Type Semiconductor to an Insulator for Operation of Perovskite Solar Cells. ACS Applied Energy Materials, 2021, 4, 5452-5465.	2.5	11

#	Article	IF	CITATIONS
109	Modulating low-dimensional domains of self-assembling quasi-2D perovskites for efficient and spectra-stable blue light-emitting diodes. Chemical Engineering Journal, 2021, 415, 129088.	6.6	26
110	Inorganic top electron transport layer for high performance inverted perovskite solar cells. EcoMat, 2021, 3, e12127.	6.8	26
111	Modulated Crystallization and Reduced <i>V</i> <sub>OC</sub> Deficit of Mixed Lead–Tin Perovskite Solar Cells with Antioxidant Caffeic Acid. ACS Energy Letters, 2021, 6, 2907-2916.	8.8	68
112	Chlorides, other Halides, and Pseudoâ€Halides as Additives for the Fabrication of Efficient and Stable Perovskite Solar Cells. ChemSusChem, 2021, 14, 3665-3692.	3.6	14
113	The Effect of Cs/FA Ratio on the Longâ€Term Stability of Mixed Cation Perovskite Solar Cells. Solar Rrl, 2021, 5, 2100660.	3.1	10
114	Reduced Recombination Losses in Evaporated Perovskite Solar Cells by Postfabrication Treatment. Solar Rrl, 2021, 5, 2100400.	3.1	5
115	Application of quantum dots in perovskite solar cells. Nanotechnology, 2021, 32, 482003.	1.3	6
116	Tailoring the mercaptan ligands for high performance inverted perovskite solar cells with efficiency exceeding 21%. Journal of Energy Chemistry, 2021, 60, 169-177.	7.1	17
117	Construct efficient CsPbI2Br solar cells by minimizing the open-circuit voltage loss through controlling the peripheral substituents of hole-transport materials. Chemical Engineering Journal, 2021, 425, 131675.	6.6	34
118	Lewis bases: promising additives for enhanced performance of perovskite solar cells. Materials Today Energy, 2021, 22, 100847.	2.5	24
119	A guide to use fluorinated aromatic bulky cations for stable and high-performance 2D/3D perovskite solar cells: The more fluorination the better?. Journal of Energy Chemistry, 2022, 64, 179-189.	7.1	28
120	Machine Learning Accelerated Insights of Perovskite Materials. Springer Series in Materials Science, 2021, , 197-223.	0.4	0
121	Effects of Crystal Morphology on the Hot-Carrier Dynamics in Mixed-Cation Hybrid Lead Halide Perovskites. Energies, 2021, 14, 708.	1.6	8
122	Machine learning in materials design: Algorithm and application*. Chinese Physics B, 2020, 29, 116103.	0.7	24
123	Quantifying Anionic Diffusion in 2D Halide Perovskite Lateral Heterostructures. Advanced Materials, 2021, 33, .	11.1	31
124	Custom Molecular Design of Ligands for Perovskite Photovoltaics. Accounts of Materials Research, 2021, 2, 1141-1155.	5.9	17
125	Surface treatment of Mixed-Halide CsPb(Brxl1-x)3 perovskite quantum dots for thermal stability enhancement. Materials Research Bulletin, 2022, 146, 111622.	2.7	4
126	Highly efficient electron transport based on double-layered PC61BM in inverted perovskite solar cells. Organic Electronics, 2022, 100, 106391.	1.4	4

#	Article	IF	CITATIONS
127	Development of encapsulation strategies towards the commercialization of perovskite solar cells. Energy and Environmental Science, 2022, 15, 13-55.	15.6	158
128	Crystal growth, defect passivation and strain release via In-situ Self-polymerization strategy enables efficient and stable perovskite solar cells. Chemical Engineering Journal, 2022, 430, 132869.	6.6	25
129	Observing the stability evolution of Î <sup>2</sup> -DMAxCs1-xPbl2Br through precursor incubation. Organic Electronics, 2020, 84, 105800.	1.4	2
130	Perovskite luminescent solar concentrators for photovoltaics. APL Photonics, 2021, 6, .	3.0	13
131	Auger Electron Spectroscopy Analysis of the Thermally Induced Degradation of MAPbI <sub>3</sub> Perovskite Films. ACS Omega, 2021, 6, 34606-34614.	1.6	5
132	Efficient Planar Perovskite Solar Cells with Carbon Quantum Dot-Modified spiro-MeOTAD as a Composite Hole Transport Layer. ACS Applied Materials & Interfaces, 2021, 13, 56265-56272.	4.0	13
133	Stabilization Techniques of Lead Halide Perovskite for Photovoltaic Applications. Solar Rrl, 2022, 6, .	3.1	8
134	Acetone complexes for high-performance perovskite photovoltaics with reduced nonradiative recombination. Materials Advances, 2022, 3, 2047-2055.	2.6	2
135	Spacer Engineering of Thiophene-Based Two-Dimensional/Three-Dimensional Hybrid Perovskites for Stable and Efficient Solar Cells. Journal of Physical Chemistry C, 2022, 126, 3351-3358.	1.5	9
136	Small amines bring big benefits to perovskite-based solar cells and light-emitting diodes. CheM, 2022, 8, 351-383.	5.8	35
137	Efficient MA-free perovskite solar cells with balanced carrier transport achieved using 4-trifluorophenylammonium iodide. Journal of Materials Chemistry A, 2022, 10, 9161-9170.	5.2	8
138	Lowâ€Temperatureâ€Processed Stable Perovskite Solar Cells and Modules: A Comprehensive Review. Advanced Energy Materials, 2022, 12, .	10.2	38
139	A facile strategy for high performance air-processed perovskite solar cells with dopant-free poly(3-hexylthiophene) hole transporter. Solar Energy, 2022, 237, 153-160.	2.9	2
140	Performance investigation of experimentally fabricated lead iodide perovskite solar cell via numerical analysis. Materials Research Bulletin, 2022, 151, 111802.	2.7	12
141	Enhanced Performance of Perovskite Solar Cells Based on Zn2+ Doped Nico2o4 Nws Hole Transport Layers. SSRN Electronic Journal, 0, , .	0.4	0
142	Application of Quantum Dot Interface Modification Layer in Perovskite Solar Cells: Progress and Perspectives. Nanomaterials, 2022, 12, 2102.	1.9	13
143	Synthesis methods of NiOx nanoparticles and its effect on hole conductivity and stability of n-i-p perovskite solar cells. Synthetic Metals, 2022, 289, 117115.	2.1	5
144	Recent Progress in Mixed Aâ€6ite Cation Halide Perovskite Thinâ€Films and Nanocrystals for Solar Cells and Lightâ€Emitting Diodes. Advanced Optical Materials, 2022, 10, .	3.6	47

#	Article	IF	CITATIONS
145	Perovskite-perovskite junctions for optoelectronics: Fundamentals, processing, and applications. Matter, 2022, 5, 2086-2118.	5.0	8
146	Ultravioletâ€Assisted Perovskite Crystallization for Highâ€Performance Solar Cells. Solar Rrl, 2022, 6, .	3.1	3
147	Multifunctional Cross-Linked Hole Transporting Interfacial Layer for Efficient and Stable Perovskite Solar Cells. ACS Applied Energy Materials, 2022, 5, 10742-10750.	2.5	4
148	Bismuth Complex Controlled Morphology Evolution and CuSCN-Induced Transport Improvement Enable Efficient Bil3 Solar Cells. Nanomaterials, 2022, 12, 3121.	1.9	1
149	Stabilizing black-phase FAPbI <sub>3</sub> in humid air with secondary ammoniums. Journal of Materials Chemistry A, 2022, 10, 21422-21429.	5.2	3
150	Perovskites for Photoabsorbers and Solar Cells and Comparison with 3D MAPbI3. Solar, 2022, 2, 385-400.	0.9	5
151	Chlorobenzene solvent annealing of perovskite thin films for improving efficiency and reproducibility of perovskite solar cells. Journal of Materials Science: Materials in Electronics, 2022, 33, 24208-24219.	1.1	1
152	Interfacial Engineering for Highâ€Performance PTAAâ€Based Inverted 3D Perovskite Solar Cells. Solar Rrl, 2022, 6, .	3.1	5
153	Organic-inorganic hybrid electron transport layer of PVP-doped SnO2 for high-efficiency stable perovskite solar cells. Solar Energy Materials and Solar Cells, 2022, 248, 112032.	3.0	6
154	Nondestructive Post-Treatment Enabled by <i>In Situ</i> Generated 2D Perovskites Derived from Multi-ammonium Molecule Vapor for High-Performance 2D/3D Bilayer Perovskite Solar Cells. ACS Applied Materials & Interfaces, 2022, 14, 51053-51065.	4.0	3
155	Two birds with one stone: Simultaneous realization of constructed 3D/2D heterojunction and p-doping of hole transport layer for highly efficient and stable perovskite solar cells. Chemical Engineering Journal, 2023, 453, 139721.	6.6	12
156	Hypervalent potassium xanthate modified SnO2 for highly efficient perovskite solar modules. Chemical Engineering Journal, 2023, 456, 140894.	6.6	7
157	Understanding the dopant of hole-transport polymers for efficient inverted perovskite solar cells with high electroluminescence. Journal of Materials Chemistry A, 2023, 11, 5199-5211.	5.2	5
158	Doping Strategies for Promising Organic–Inorganic Halide Perovskites. Small, 2023, 19, .	5.2	8
159	Dopantâ€free NiO <sub><i>x</i></sub> Nanocrystals: A Lowâ€cost and Stable Hole Transport Material for Commercializing Perovskite Optoelectronics. Angewandte Chemie - International Edition, 2023, 62, .	7.2	20
160	Reduced interfacial recombination losses and lead leakage in lead-based perovskite solar cells using 2D/3D perovskite engineering. Journal of Power Sources, 2023, 563, 232825.	4.0	4
161	Boosting efficiency and stability with KBr interface modification for NiOx-based inverted perovskite solar cells. Materials Science in Semiconductor Processing, 2023, 160, 107454.	1.9	4
162	Precise modulation strategies of 2D/3D perovskite heterojunctions in efficient and stable solar cells. Chemical Communications, 2023, 59, 4128-4141.	2.2	9

#	Article	IF	CITATIONS
163	lonic Liquid Passivation for Highâ€Performance Skyâ€Blue Quasiâ€2D Perovskite Lightâ€Emitting Diodes. Advanced Optical Materials, 2023, 11, .	3.6	2
164	Dopantâ€free NiO <sub><i>x</i></sub> Nanocrystals: A Lowâ€cost and Stable Hole Transport Material for Commercializing Perovskite Optoelectronics. Angewandte Chemie, 2023, 135, .	1.6	1
166	Tailoring passivators for highly efficient and stable perovskite solar cells. Nature Reviews Chemistry, 2023, 7, 632-652.	13.8	36