

# Trystan M Watson

## List of Publications by Year in descending order

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161  
papers

6,690  
citations

61857

43  
h-index

69108

77  
g-index

164  
all docs

164  
docs citations

164  
times ranked

8304  
citing authors

#	ARTICLE	IF	CITATIONS
1	Consensus statement for stability assessment and reporting for perovskite photovoltaics based on ISOS procedures. <i>Nature Energy</i> , 2020, 5, 35-49.	19.8	797
2	Quantifying Losses in Open-Circuit Voltage in Solution-Processable Solar Cells. <i>Physical Review Applied</i> , 2015, 4, .	1.5	500
3	A one-step low temperature processing route for organolead halide perovskite solar cells. <i>Chemical Communications</i> , 2013, 49, 7893.	2.2	212
4	Humidity resistant fabrication of CH <sub>3</sub> NH <sub>3</sub> PbI <sub>3</sub> perovskite solar cells and modules. <i>Nano Energy</i> , 2017, 39, 60-68.	8.2	197
5	Efficient, Semitransparent Neutral-Colored Solar Cells Based on Microstructured Formamidinium Lead Trihalide Perovskite. <i>Journal of Physical Chemistry Letters</i> , 2015, 6, 129-138.	2.1	173
6	A Transparent Conductive Adhesive Laminate Electrode for High-Efficiency Organic-Inorganic Lead Halide Perovskite Solar Cells. <i>Advanced Materials</i> , 2014, 26, 7499-7504.	11.1	169
7	An effective approach of vapour assisted morphological tailoring for reducing metal defect sites in lead-free, (CH <sub>3</sub> NH <sub>3</sub> ) <sub>3</sub> Bi <sub>2</sub> I <sub>9</sub> bismuth-based perovskite solar cells for improved performance and long-term stability. <i>Nano Energy</i> , 2018, 49, 614-624.	8.2	169
8	One-step deposition by slot-die coating of mixed lead halide perovskite for photovoltaic applications. <i>Solar Energy Materials and Solar Cells</i> , 2017, 159, 362-369.	3.0	156
9	An investigation into the leaching of micro and nano particles and chemical pollutants from disposable face masks - linked to the COVID-19 pandemic. <i>Water Research</i> , 2021, 196, 117033.	5.3	150
10	Highly efficient, flexible, indium-free perovskite solar cells employing metallic substrates. <i>Journal of Materials Chemistry A</i> , 2015, 3, 9141-9145.	5.2	133
11	Thin Film Tin Selenide (SnSe) Thermoelectric Generators Exhibiting Ultralow Thermal Conductivity. <i>Advanced Materials</i> , 2018, 30, e1801357.	11.1	126
12	Graphite-protected CsPbBr <sub>3</sub> perovskite photoanodes functionalised with water oxidation catalyst for oxygen evolution in water. <i>Nature Communications</i> , 2019, 10, 2097.	5.8	124
13	The role of fullerenes in the environmental stability of polymer:fullerene solar cells. <i>Energy and Environmental Science</i> , 2018, 11, 417-428.	15.6	117
14	Identifying Dominant Recombination Mechanisms in Perovskite Solar Cells by Measuring the Transient Ideality Factor. <i>Physical Review Applied</i> , 2019, 11, .	1.5	107
15	All Printable Perovskite Solar Modules with 198 cm <sup>2</sup> Active Area and Over 6% Efficiency. <i>Advanced Materials Technologies</i> , 2018, 3, 1800156.	3.0	104
16	Slot-die coating of perovskite solar cells: An overview. <i>Materials Today Communications</i> , 2020, 22, 100808.	0.9	100
17	Perovskite processing for photovoltaics: a spectro-thermal evaluation. <i>Journal of Materials Chemistry A</i> , 2014, 2, 19338-19346.	5.2	99
18	Observable Hysteresis at Low Temperature in Hysteresis Free Organic-Inorganic Lead Halide Perovskite Solar Cells. <i>Journal of Physical Chemistry Letters</i> , 2015, 6, 3190-3194.	2.1	99

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19	Photonic flash-annealing of lead halide perovskite solar cells in 1 ms. Journal of Materials Chemistry A, 2016, 4, 3471-3476.	5.2	95
20	Ultra-fast dye sensitisation and co-sensitisation for dye sensitized solar cells. Chemical Communications, 2010, 46, 7256.	2.2	91
21	Sources of Pb(0) artefacts during XPS analysis of lead halide perovskites. Materials Letters, 2019, 251, 98-101.	1.3	89
22	Detection of trace sub-micron (nano) plastics in water samples using pyrolysis-gas chromatography time of flight mass spectrometry (PY-GC/ToF).. Chemosphere, 2020, 249, 126179.	4.2	84
23	Transient Optoelectronic Analysis of the Impact of Material Energetics and Recombination Kinetics on the Open-Circuit Voltage of Hybrid Perovskite Solar Cells. Journal of Physical Chemistry C, 2017, 121, 13496-13506.	1.5	76
24	Beyond Impedance Spectroscopy of Perovskite Solar Cells: Insights from the Spectral Correlation of the Electrooptical Frequency Techniques. Journal of Physical Chemistry Letters, 2020, 11, 8654-8659.	2.1	76
25	3D Printed SnSe Thermoelectric Generators with High Figure of Merit. Advanced Energy Materials, 2019, 9, 1900201.	10.2	71
26	Evidence for surface defect passivation as the origin of the remarkable photostability of unencapsulated perovskite solar cells employing aminovaleric acid as a processing additive. Journal of Materials Chemistry A, 2019, 7, 3006-3011.	5.2	70
27	Rapid processing of perovskite solar cells in under 2.5 seconds. Journal of Materials Chemistry A, 2015, 3, 9123-9127.	5.2	67
28	High throughput fabrication of mesoporous carbon perovskite solar cells. Journal of Materials Chemistry A, 2017, 5, 18643-18650.	5.2	65
29	Ultrafast near-infrared sintering of a slot-die coated nano-silver conducting ink. Journal of Materials Chemistry, 2011, 21, 7562.	6.7	64
30	Outstanding Indoor Performance of Perovskite Photovoltaic Cells – Effect of Device Architectures and Interlayers. Solar Rrl, 2019, 3, 1800207.	3.1	63
31	One step facile synthesis of a novel anthanthrone dye-based, dopant-free hole transporting material for efficient and stable perovskite solar cells. Journal of Materials Chemistry C, 2018, 6, 3699-3708.	2.7	61
32	Influences of Non-fullerene Acceptor Fluorination on Three-Dimensional Morphology and Photovoltaic Properties of Organic Solar Cells. ACS Applied Materials & Interfaces, 2019, 11, 26194-26203.	4.0	57
33	Azetidinium lead iodide for perovskite solar cells. Journal of Materials Chemistry A, 2017, 5, 20658-20665.	5.2	53
34	Roll-to-roll slot-die coated P&#x2013;N perovskite solar cells using acetonitrile based single step perovskite solvent system. Sustainable Energy and Fuels, 2020, 4, 3340-3351.	2.5	53
35	Perovskite Photovoltaic Modules: Life Cycle Assessment of Pre-industrial Production Process. IScience, 2018, 9, 542-551.	1.9	51
36	Flexographic printing of graphene nanoplatelet ink to replace platinum as counter electrode catalyst in flexible dye sensitised solar cell. Materials Research Innovations, 2014, 18, 86-90.	1.0	50

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37	Correlating Three-dimensional Morphology With Function in PBDB-T:IT-M Non-Fullerene Organic Solar Cells. <i>Solar Rrl</i> , 2018, 2, 1800114.	3.1	49
38	Enhancing the stability of organolead halide perovskite films through polymer encapsulation. <i>RSC Advances</i> , 2017, 7, 32942-32951.	1.7	48
39	Research Update: Behind the high efficiency of hybrid perovskite solar cells. <i>APL Materials</i> , 2016, 4, .	2.2	47
40	Homogeneous and highly controlled deposition of low viscosity inks and application on fully printable perovskite solar cells. <i>Science and Technology of Advanced Materials</i> , 2018, 19, 1-9.	2.8	47
41	Large area quantum dot luminescent solar concentrators for use with dye-sensitized solar cells. <i>Journal of Materials Chemistry A</i> , 2018, 6, 2671-2680.	5.2	46
42	Screen printed carbon CsPbBr <sub>3</sub> solar cells with high open-circuit photovoltage. <i>Journal of Materials Chemistry A</i> , 2018, 6, 18677-18686.	5.2	46
43	Reduced graphene oxide wrapped hierarchical TiO <sub>2</sub> nanorod composites for improved charge collection efficiency and carrier lifetime in dye sensitized solar cells. <i>Applied Surface Science</i> , 2018, 428, 439-447.	3.1	45
44	Sustainable solvent selection for the manufacture of methylammonium lead triiodide (MAPbI <sub>3</sub> ) perovskite solar cells. <i>Green Chemistry</i> , 2021, 23, 2471-2486.	4.6	45
45	Ultrafast near infrared sintering of TiO <sub>2</sub> layers on metal substrates for dye-sensitized solar cells. <i>Progress in Photovoltaics: Research and Applications</i> , 2011, 19, 482-486.	4.4	44
46	Perovskite solar cells in N-I-P structure with four slot-die-coated layers. <i>Royal Society Open Science</i> , 2018, 5, 172158.	1.1	44
47	Activated carbon from <i>Nauclea diderrichii</i> agricultural waste—a promising adsorbent for ibuprofen, methylene blue and CO <sub>2</sub> . <i>Advanced Powder Technology</i> , 2021, 32, 866-874.	2.0	42
48	Outdoor performance monitoring of perovskite solar cell mini-modules: Diurnal performance, observance of reversible degradation and variation with climatic performance. <i>Solar Energy</i> , 2018, 170, 549-556.	2.9	40
49	Radiation Hardness of Perovskite Solar Cells Based on Aluminum-Doped Zinc Oxide Electrode Under Proton Irradiation. <i>Solar Rrl</i> , 2019, 3, 1900219.	3.1	39
50	Rapid, continuous in situ monitoring of dye sensitisation in dye-sensitized solar cells. <i>Journal of Materials Chemistry</i> , 2011, 21, 4321.	6.7	37
51	Ultra-fast sintered TiO <sub>2</sub> films in dye-sensitized solar cells: phase variation, electron transport and recombination. <i>Journal of Materials Chemistry A</i> , 2013, 1, 2225-2230.	5.2	36
52	A simple method to evaluate the effectiveness of encapsulation materials for perovskite solar cells. <i>Solar Energy</i> , 2016, 139, 426-432.	2.9	36
53	Non-fullerene acceptor photostability and its impact on organic solar cell lifetime. <i>Cell Reports Physical Science</i> , 2021, 2, 100498.	2.8	35
54	The use of FTIR mapping to assess phase distribution in mixed and recycled WEEE plastics. <i>Polymer Testing</i> , 2010, 29, 459-470.	2.3	34

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55	Acetonitrile based single step slot-die compatible perovskite ink for flexible photovoltaics. RSC Advances, 2019, 9, 37415-37423.	1.7	34
56	A Perspective on the Commercial Viability of Perovskite Solar Cells. Solar Rrl, 2021, 5, 2100401.	3.1	33
57	Performance enhancement of solution processed perovskite solar cells incorporating functionalized silica nanoparticles. Journal of Materials Chemistry A, 2014, 2, 17077-17084.	5.2	32
58	Efficient and semi-transparent perovskite solar cells using a room-temperature processed MoO <sub>3</sub> /ITO/Ag/ITO electrode. Journal of Materials Chemistry C, 2019, 7, 10981-10987.	2.7	31
59	Investigating the Superoxide Formation and Stability in Mesoporous Carbon Perovskite Solar Cells with an Aminovaleric Acid Additive. Advanced Functional Materials, 2020, 30, 1909839.	7.8	30
60	Synergic effect of Bi, Sb and Te for the increased stability of bulk alloying anodes for sodium-ion batteries. Journal of Materials Chemistry A, 2017, 5, 23198-23208.	5.2	29
61	Origin of Exceptionally Slow Light Soaking Effect in Mesoporous Carbon Perovskite Solar Cells with AVA Additive. Journal of Physical Chemistry C, 2019, 123, 11414-11421.	1.5	29
62	Triple-Mesoscopic Carbon Perovskite Solar Cells: Materials, Processing and Applications. Energies, 2021, 14, 386.	1.6	28
63	Impact of Aggregation on the Photochemistry of Fullerene Films: Correlating Stability to Triplet Exciton Kinetics. ACS Applied Materials & Interfaces, 2017, 9, 22739-22747.	4.0	27
64	Using Soft Polymer Template Engineering of Mesoporous TiO <sub>2</sub> Scaffolds to Increase Perovskite Grain Size and Solar Cell Efficiency. ACS Applied Materials & Interfaces, 2020, 12, 18578-18589.	4.0	27
65	Flame Assisted Chemical Vapour Deposition of NiO hole transport layers for planar perovskite cells. Surface and Coatings Technology, 2020, 385, 125423.	2.2	27
66	From Sampling to Analysis: A Critical Review of Techniques Used in the Detection of Micro- and Nanoplastics in Aquatic Environments. ACS ES&T Water, 2021, 1, 748-764.	2.3	27
67	From spin coating to roll-to-roll: investigating the challenge of upscaling lead halide perovskite solar cells. IET Renewable Power Generation, 2017, 11, 546-549.	1.7	25
68	Effect of alkyl chain length on the properties of triphenylamine-based hole transport materials and their performance in perovskite solar cells. Physical Chemistry Chemical Physics, 2018, 20, 1252-1260.	1.3	25
69	Enhancing fully printable mesoscopic perovskite solar cell performance using integrated metallic grids to improve carbon electrode conductivity. Current Applied Physics, 2020, 20, 619-627.	1.1	25
70	The effect of oxygen partial pressure on the filiform corrosion of organic coated iron. Corrosion Science, 2014, 89, 46-58.	3.0	23
71	Probing the degradation and homogeneity of embedded perovskite semiconducting layers in photovoltaic devices by Raman spectroscopy. Physical Chemistry Chemical Physics, 2017, 19, 5246-5253.	1.3	23
72	Scribing Method for Carbon Perovskite Solar Modules. Energies, 2020, 13, 1589.	1.6	23

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73	Variations of Infiltration and Electronic Contact in Mesoscopic Perovskite Solar Cells Revealed by High-Resolution Multi-Mapping Techniques. <i>Advanced Functional Materials</i> , 2019, 29, 1900885.	7.8	22
74	Beyond the First Quadrant: Origin of the High Frequency Intensity-Modulated Photocurrent/Photovoltage Spectroscopy Response of Perovskite Solar Cells. <i>Solar Rrl</i> , 2021, 5, 2100159.	3.1	21
75	γ-Valerolactone: A Nontoxic Green Solvent for Highly Stable Printed Mesoporous Perovskite Solar Cells. <i>Energy Technology</i> , 2021, 9, 2100312.	1.8	21
76	In situ investigation of perovskite solar cells' efficiency and stability in a mimic stratospheric environment for high-altitude pseudo-satellites. <i>Journal of Materials Chemistry C</i> , 2020, 8, 1715-1721.	2.7	19
77	Recent developments in perovskite-based precursor inks for scalable architectures of perovskite solar cell technology. <i>Sustainable Energy and Fuels</i> , 2022, 6, 2879-2900.	2.5	19
78	Platinized counter-electrodes for dye-sensitized solar cells from waste thermocouples: A case study for resource efficiency, industrial symbiosis and circular economy. <i>Journal of Cleaner Production</i> , 2018, 202, 1167-1178.	4.6	18
79	An Interlaboratory Study on the Stability of All-Printable Hole Transport Material-Free Perovskite Solar Cells. <i>Energy Technology</i> , 2020, 8, 2000134.	1.8	18
80	Near Infrared Radiation as a Rapid Heating Technique for TiO <sub>2</sub> Films on Glass Mounted Dye-Sensitized Solar Cells. <i>International Journal of Photoenergy</i> , 2014, 2014, 1-8.	1.4	17
81	Engineering of a Mo/SiNx Diffusion Barrier to Reduce the Formation of MoS <sub>2</sub> in Cu <sub>2</sub> ZnSnS <sub>4</sub> Thin Film Solar Cells. <i>ACS Applied Energy Materials</i> , 2018, 1, 2749-2757.	2.5	17
82	Meniscus Guide Slot-Die Coating For Roll-to-Roll Perovskite Solar Cells. <i>MRS Advances</i> , 2019, 4, 1399-1407.	0.5	17
83	Spectral Response Measurements of Perovskite Solar Cells. <i>IEEE Journal of Photovoltaics</i> , 2019, 9, 220-226.	1.5	17
84	Raman mapping analysis for removal of surface secondary phases of CZTS films using chemical etching. <i>Applied Physics Letters</i> , 2016, 109, .	1.5	16
85	Green solvent engineering for enhanced performance and reproducibility in printed carbon-based mesoscopic perovskite solar cells and modules. <i>Materials Advances</i> , 2022, 3, 1125-1138.	2.6	16
86	UV Filtering of Dye-Sensitized Solar Cells: The Effects of Varying the UV Cut-Off upon Cell Performance and Incident Photon-to-Electron Conversion Efficiency. <i>International Journal of Photoenergy</i> , 2012, 2012, 1-9.	1.4	15
87	Earth abundant, non-toxic, 3D printed Cu <sub>2</sub> S with high thermoelectric figure of merit. <i>Journal of Materials Chemistry A</i> , 2019, 7, 25586-25592.	5.2	15
88	In-depth analysis of defects in TiO <sub>2</sub> compact electron transport layers and impact on performance and hysteresis of planar perovskite devices at low light. <i>Solar Energy Materials and Solar Cells</i> , 2020, 209, 110448.	3.0	15
89	Disposable FFP2 and Type IIR Medical-Grade Face Masks: An Exhaustive Analysis into the Leaching of Micro- and Nanoparticles and Chemical Pollutants Linked to the COVID-19 Pandemic. <i>ACS ES&amp;T Water</i> , 2022, 2, 527-538.	2.3	15
90	Sequential Slot-Die Deposition of Perovskite Solar Cells Using Dimethylsulfoxide Lead Iodide Ink. <i>Materials</i> , 2018, 11, 2106.	1.3	14

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91	Ultrafast near-infrared curing of PEDOT:PSS. <i>Organic Electronics</i> , 2014, 15, 1126-1130.	1.4	13
92	Flame assisted chemical vapour deposition NiO hole transport layers for mesoporous carbon perovskite cells. <i>Journal of Materials Chemistry C</i> , 2019, 7, 13235-13242.	2.7	13
93	Corrosion Monitoring of Flexible Metallic Substrates for Dye-Sensitized Solar Cells. <i>International Journal of Photoenergy</i> , 2013, 2013, 1-8.	1.4	12
94	Corrosion Resistance of Metallic Substrates for the Fabrication Dye-Sensitized Solar Cells. <i>ECS Transactions</i> , 2010, 33, 129-138.	0.3	11
95	Bi-phasic titanium dioxide nanoparticles doped with nitrogen and neodymium for enhanced photocatalysis. <i>Nanoscale</i> , 2015, 7, 17735-17744.	2.8	11
96	Simple 3,6-bis(diphenylaminy)carbazole molecular glasses as hole transporting materials for hybrid perovskite solar cells. <i>Journal of Materials Science: Materials in Electronics</i> , 2017, 28, 17551-17556.	1.1	11
97	Acid Treatment of Titania Pastes to Create Scattering Layers in Dye-Sensitized Solar Cells. <i>International Journal of Photoenergy</i> , 2012, 2012, 1-8.	1.4	10
98	Photocatalytic Oxidation of Triiodide in UVA-Exposed Dye-Sensitized Solar Cells. <i>International Journal of Photoenergy</i> , 2012, 2012, 1-8.	1.4	10
99	Development of Graphene Nano-Platelet Ink for High Voltage Flexible Dye Sensitized Solar Cells with Cobalt Complex Electrolytes. <i>Advanced Engineering Materials</i> , 2017, 19, 1600652.	1.6	10
100	On the Electro-Optics of Carbon Stack Perovskite Solar Cells. <i>Solar Rrl</i> , 2020, 4, 1900221.	3.1	10
101	A Perspective on the Commercial Viability of Perovskite Solar Cells. <i>Solar Rrl</i> , 2021, 5, 2170113.	3.1	10
102	Strategies towards Cost Reduction in the Manufacture of Printable Perovskite Solar Modules. <i>Energies</i> , 2022, 15, 641.	1.6	10
103	Spray PEDOT:PSS coated perovskite with a transparent conducting electrode for low cost scalable photovoltaic devices. <i>Materials Research Innovations</i> , 2015, 19, 482-487.	1.0	9
104	Facile self-assembly and stabilization of metal oxide nanoparticles. <i>Journal of Colloid and Interface Science</i> , 2015, 442, 110-119.	5.0	9
105	Study of the tribological properties and ageing of alkyphosphonic acid films on galvanized steel. <i>Tribology International</i> , 2018, 119, 337-344.	3.0	9
106	Photoelectrochemical concurrent hydrogen generation and heavy metal recovery from polluted acidic mine water. <i>Sustainable Energy and Fuels</i> , 2021, 5, 3084-3091.	2.5	9
107	Painted steel mounted dye sensitised solar cells: titanium metallisation using magnetron sputtering. <i>Ironmaking and Steelmaking</i> , 2011, 38, 168-172.	1.1	8
108	Compositions, colours and efficiencies of organic-inorganic lead iodide/bromide perovskites for solar cells. <i>Materials Research Innovations</i> , 2014, 18, 482-485.	1.0	8



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109	In situ monitoring and optimization of room temperature ultra-fast sensitization for dye-sensitized solar cells. <i>Chemical Communications</i> , 2014, 50, 12512-12514.	2.2	8
110	A Scanning Kelvin Probe Investigation of the Interaction of PEDOT:PSS Films with Metal Surfaces and Potential Corrosion Protection Properties. <i>Journal of the Electrochemical Society</i> , 2015, 162, H799-H805.	1.3	8
111	Solution processing of TiO <sub>2</sub> compact layers for 3rd generation photovoltaics. <i>Ceramics International</i> , 2016, 42, 11989-11997.	2.3	8
112	Studies of inherent lubricity coatings for low surface roughness galvanised steel for automotive applications. <i>Lubrication Science</i> , 2017, 29, 317-333.	0.9	8
113	Limited information of impedance spectroscopy about electronic diffusion transport: The case of perovskite solar cells. <i>APL Materials</i> , 2022, 10, .	2.2	8
114	A Comparison of Different Textured and Non-Textured Anti-Reflective Coatings for Planar Monolithic Silicon-Perovskite Tandem Solar Cells. <i>ACS Applied Energy Materials</i> , 2022, 5, 5974-5982.	2.5	8
115	Rapid radiative platinisation for dye-sensitized solar cell counter electrodes. <i>Progress in Photovoltaics: Research and Applications</i> , 2014, 22, 1267-1272.	4.4	7
116	Digital imaging to simultaneously study device lifetimes of multiple dye-sensitized solar cells. <i>Sustainable Energy and Fuels</i> , 2017, 1, 362-370.	2.5	7
117	Predicting Low Toxicity and Scalable Solvent Systems for High-Speed Roll-to-Roll Perovskite Manufacturing. <i>Solar Rrl</i> , 2022, 6, 2100567.	3.1	7
118	Impedance Characteristics of Transparent GNP-Pt Ink Catalysts for Flexible Dye Sensitized Solar Cells. <i>Journal of the Electrochemical Society</i> , 2015, 162, H564-H569.	1.3	6
119	Will the Internet of Things Be Perovskite Powered? Energy Yield Measurement and Real-World Performance of Perovskite Solar Cells in Ambient Light Conditions. <i>IoT</i> , 2022, 3, 109-121.	2.3	6
120	Effect of TiO <sub>2</sub> Photoanode Porosity on Dye Diffusion Kinetics and Performance of Standard Dye-Sensitized Solar Cells. <i>Journal of Nanomaterials</i> , 2016, 2016, 1-10.	1.5	5
121	Use of gas cluster ion source depth profiling to study the oxidation of fullerene thin films by XPS. <i>Organic Electronics</i> , 2017, 49, 85-93.	1.4	5
122	On-Demand Electrical Switching of Antibody-Antigen Binding on Surfaces. <i>ACS Applied Bio Materials</i> , 2018, 1, 738-747.	2.3	5
123	Mass Manufactured Glass Substrates Incorporating Prefabricated Electron Transport Layers for Perovskite Solar Cells. <i>Advanced Materials Interfaces</i> , 2019, 6, 1801773.	1.9	5
124	Star-shaped triarylamine-based hole-transport materials in perovskite solar cells. <i>Sustainable Energy and Fuels</i> , 2020, 4, 779-787.	2.5	5
125	Exploring the Infiltration Features of Perovskite within Mesoporous Carbon Stack Solar Cells Using Broad Beam Ion Milling. <i>Materials</i> , 2021, 14, 5852.	1.3	5
126	Platinized Counter Electrodes for Dye Sensitized Solar Cells through the Redox Replacement of a Low Power Electrodeposited Lead Sacrificial Template. <i>ECS Transactions</i> , 2013, 53, 11-17.	0.3	4



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127	An Inorganic/Organic Hybrid Coating for Low Cost Metal Mounted Dye-Sensitized Solar Cells. ECS Transactions, 2013, 53, 29-37.	0.3	4
128	The effect of additional sulfur on solution-processed pure sulfide Cu <sub>2</sub> ZnSnS <sub>4</sub> solar cell absorber layers. MRS Advances, 2016, 1, 2815-2820.	0.5	4
129	Polymeric hole-transport materials with side-chain redox-active groups for perovskite solar cells with good reproducibility. Physical Chemistry Chemical Physics, 2018, 20, 25738-25745.	1.3	4
130	Successes and Challenges Associated with Solution Processing of Kesterite Cu <sub>2</sub> ZnSnS <sub>4</sub> Solar Cells on Titanium Substrates. ACS Applied Energy Materials, 2020, 3, 3876-3883.	2.5	4
131	Proton Radiation Hardness of Perovskite Solar Cells Utilizing a Mesoporous Carbon Electrode. Energy Technology, 2021, 9, 2100928.	1.8	4
132	Electrochemical Characterization of the UV-Photodegradation of Dye-Sensitized Solar Cells and Usage in the Assessment of UV-Protection Measures. ECS Transactions, 2011, 41, 93-102.	0.3	3
133	Optically transparent graphene nanoplatelet inks as low cost electrocatalysts for liquid dye sensitised solar cells. Materials Research Society Symposia Proceedings, 2014, 1667, 1.	0.1	3
134	Investigation into the effects of surface stripping ZnO nanosheets. Nanotechnology, 2018, 29, 165701.	1.3	3
135	Self-adhesive electrode applied to ZnO nanorod-based piezoelectric nanogenerators. Smart Materials and Structures, 2019, 28, 105040.	1.8	3
136	Proton Radiation Hardness of Organic Photovoltaics: An In-Depth Study. Solar Rrl, 0, , 2101037.	3.1	3
137	Enhanced infiltration and morphology of bismuth perovskite in Carbon-stack solar cells – A synergistic effect of electric fields in modified spray technique. Solar Energy, 2022, 241, 386-395.	2.9	3
138	Rearrangement of Epoxides to Allylic Alcohols in the Presence of Reusable Basic Resins. Catalysis Letters, 2009, 128, 101-105.	1.4	2
139	Addressing Bottlenecks in Dye-sensitized Solar Cell Manufacture Using Rapid Near-infrared Heat Treatments. Materials Research Society Symposia Proceedings, 2012, 1447, 78.	0.1	2
140	Monitoring the Corrosion Inhibition of Nitrogen-Containing Heterocyclic Compounds in Dye Sensitized Solar Cells. ECS Transactions, 2013, 53, 19-28.	0.3	2
141	Ultrafast TiO <sub>2</sub> Sintering of Metal Mounted Dye-Sensitized Solar Cells. ECS Transactions, 2010, 33, 151-158.	0.3	1
142	Near Infrared Heat Treatment to Flow Melt Tinplate. ECS Transactions, 2013, 50, 155-164.	0.3	1
143	Low Cost TCO Less Counter Electrodes for Dye-Sensitized Solar Cell Application. ECS Transactions, 2013, 53, 39-46.	0.3	1
144	Identifying recombination mechanisms through materials development in perovskite solar cells. , 2015, , .		1

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145	Enhanced Efficiency Dye Sensitized Solar Cells Through Acid Pre-treatment. Materials Research Society Symposia Proceedings, 2009, 1211, 1.	0.1	0
146	The Use of Near Infra Red as a Rapid Heat Treatment Process in the Manufacture of Metal-based Dye-sensitized Solar Cells. Materials Research Society Symposia Proceedings, 2009, 1211, 1.	0.1	0
147	Triiodide Photooxidation and Subsequent Regeneration in UVA Exposed Nano-Structured TiO2 Solar Cell Devices. Materials Research Society Symposia Proceedings, 2012, 1442, 7.	0.1	0
148	Electrochemical Analysis for the Realization of Low Temperature Processed ZnO Dye-Sensitized Solar Cells. ECS Transactions, 2013, 50, 11-21.	0.3	0
149	TiO2 Film Morphology, Electron Transport and Electron Lifetime in Ultra-fast Sintered Dye-sensitized Solar Cells. Materials Research Society Symposia Proceedings, 2013, 1493, 121-126.	0.1	0
150	A Scanning Kelvin Probe Investigation of the Interaction of PEDOT:PSS Films with Metal Surfaces and Potential Corrosion Protection Properties. ECS Transactions, 2015, 64, 11-22.	0.3	0
151	Temperature-light-dependent JV and TPV analysis of pure sulfide based Cu <sub>2</sub> ZnSnS <sub>4</sub> solar cells. , 2018, , .		0
152	In situ investigation of perovskite solar cells' efficiency and stability in a mimic stratospheric environment for high-altitude pseudo-satellites. , 0, , .		0
153	Origin of the High Frequency Intensity-Modulated Photocurrent/Photovoltage Spectroscopy Response of Perovskite Solar Cells. , 0, , .		0
154	Recombination and Ion Migration in Triple Mesoporous Perovskite Solar Cells. , 0, , .		0
155	Influence of Non-Fullerene Acceptors on the Photostability of Organic Photovoltaics in Inert Atmospheres. , 0, , .		0
156	Room-temperature Processed Transparent Conductive Oxides For Efficient And Semi-transparent Perovskite And Organic Solar Cells. , 0, , .		0
157	Enhancing Fully Printable Mesoscopic Perovskite Solar Cells Performance by Increasing Carbon Electrode Conductivity with the Use of Metallic Grids.. , 0, , .		0
158	Investigation of Perovskite Solar Cells Homogeneity and Defects by Complementary High-Resolution Mapping Techniques. , 0, , .		0
159	Spectral Correlation of Electrooptical Frequency Techniques in Perovskite Solar Cells Beyond Impedance Spectroscopy. , 0, , .		0
160	Predicting Low Toxicity and Scalable Solvent Systems for High-Speed Roll-to-Roll Perovskite Manufacturing. Solar Rrl, 2022, 6, .	3.1	0
161	Scalable Screen-Printed TiO2 Compact Layers for Fully Printable Carbon-Based Perovskite Solar Cells. Solar, 2022, 2, 293-304.	0.9	0