

Dongâ€¥u Kim

List of Publications by Year in descending order

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238
papers

16,875
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12330

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244
times ranked

16918
citing authors

#	ARTICLE	IF	CITATIONS
1	Efficient and Flexible ITO-Free Organic Solar Cells Using Highly Conductive Polymer Anodes. <i>Advanced Materials</i> , 2008, 20, 4061-4067.	21.0	827
2	Toward Large Scale Roll-to-Roll Production of Fully Printed Perovskite Solar Cells. <i>Advanced Materials</i> , 2015, 27, 1241-1247.	21.0	785
3	Polymer and Organic Nonvolatile Memory Devices. <i>Chemistry of Materials</i> , 2011, 23, 341-358.	6.7	506
4	Gradient force: The mechanism for surface relief grating formation in azobenzene functionalized polymers. <i>Applied Physics Letters</i> , 1998, 72, 2096-2098.	3.3	464
5	Plasmon enhanced performance of organic solar cells using electrodeposited Ag nanoparticles. <i>Applied Physics Letters</i> , 2008, 93, .	3.3	428
6	Solution-Processable Reduced Graphene Oxide as a Novel Alternative to PEDOT:PSS Hole Transport Layers for Highly Efficient and Stable Polymer Solar Cells. <i>Advanced Materials</i> , 2011, 23, 4923-4928.	21.0	363
7	Highly efficient and stable planar perovskite solar cells with reduced graphene oxide nanosheets as electrode interlayer. <i>Nano Energy</i> , 2015, 12, 96-104.	16.0	328
8	Organic Non-Volatile Memory Based on Pentacene Field-Effect Transistors Using a Polymeric Gate Electret. <i>Advanced Materials</i> , 2006, 18, 3179-3183.	21.0	294
9	Evolution of nanomorphology and anisotropic conductivity in solvent-modified PEDOT:PSS films for polymeric anodes of polymer solar cells. <i>Journal of Materials Chemistry</i> , 2009, 19, 9045.	6.7	282
10	Time-Dependent Morphology Evolution by Annealing Processes on Polymer:Fullerene Blend Solar Cells. <i>Advanced Functional Materials</i> , 2009, 19, 866-874.	14.9	281
11	Controllable Shifts in Threshold Voltage of Top-Gate Polymer Field-Effect Transistors for Applications in Organic Nano Floating Gate Memory. <i>Advanced Functional Materials</i> , 2010, 20, 224-230.	14.9	258
12	Polarity Effects of Polymer Gate Electrets on Non-Volatile Organic Field-Effect Transistor Memory. <i>Advanced Functional Materials</i> , 2008, 18, 3678-3685.	14.9	256
13	Three-Dimensional Bulk Heterojunction Morphology for Achieving High Internal Quantum Efficiency in Polymer Solar Cells. <i>Advanced Functional Materials</i> , 2009, 19, 2398-2406.	14.9	236
14	Efficient Polymer Solar Cells with Surface Relief Gratings Fabricated by Simple Soft Lithography. <i>Advanced Functional Materials</i> , 2008, 18, 3956-3963.	14.9	230
15	Fabrication of organic bulk heterojunction solar cells by a spray deposition method for low-cost power generation. <i>Applied Physics Letters</i> , 2007, 91, .	3.3	228
16	Control of the electrode work function and active layer morphology via surface modification of indium tin oxide for high efficiency organic photovoltaics. <i>Applied Physics Letters</i> , 2007, 91, .	3.3	225
17	Simple Bar-Coating Process for Large-Area, High-Performance Organic Field-Effect Transistors and Ambipolar Complementary Integrated Circuits. <i>Advanced Materials</i> , 2013, 25, 4302-4308.	21.0	210
18	Planar heterojunction perovskite solar cells with superior reproducibility. <i>Scientific Reports</i> , 2014, 4, 6953.	3.3	208

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19	Printed, Flexible, Organic Nano-Floating-Gate Memory: Effects of Metal Nanoparticles and Blocking Dielectrics on Memory Characteristics. <i>Advanced Functional Materials</i> , 2013, 23, 3503-3512.	14.9	200
20	3D Printer Based Slot-Die Coater as a Lab-to-Fab Translation Tool for Solution-Processed Solar Cells. <i>Advanced Energy Materials</i> , 2015, 5, 1401539.	19.5	196
21	Water-Soluble Polyfluorenes as an Interfacial Layer Leading to Cathode-Independent High Performance of Organic Solar Cells. <i>Advanced Functional Materials</i> , 2010, 20, 1977-1983.	14.9	195
22	Electrodeposited Pt for cost-efficient and flexible dye-sensitized solar cells. <i>Electrochimica Acta</i> , 2006, 51, 3814-3819.	5.2	189
23	Efficient Polymer Solar Cells Fabricated by Simple Brush Painting. <i>Advanced Materials</i> , 2007, 19, 4410-4415.	21.0	187
24	Highly sensitive thin-film organic phototransistors: Effect of wavelength of light source on device performance. <i>Journal of Applied Physics</i> , 2005, 98, 074505.	2.5	184
25	High-Performance Top-Gated Organic Field-Effect Transistor Memory using Electrets for Monolithic Printed Flexible NAND Flash Memory. <i>Advanced Functional Materials</i> , 2012, 22, 2915-2926.	14.9	184
26	Remarkable Enhancement of Hole Transport in Top-Gated N-Type Polymer Field-Effect Transistors by a High- κ Dielectric for Ambipolar Electronic Circuits. <i>Advanced Materials</i> , 2012, 24, 5433-5439.	21.0	176
27	Efficient work-function engineering of solution-processed MoS ₂ thin-films for novel hole and electron transport layers leading to high-performance polymer solar cells. <i>Journal of Materials Chemistry C</i> , 2013, 1, 3777.	5.5	173
28	Significant Vertical Phase Separation in Solvent-Vapor-Annealed Poly(3,4-ethylenedioxythiophene):Poly(styrene sulfonate) Composite Films Leading to Better Conductivity and Work Function for High-Performance Indium Tin Oxide-Free Optoelectronics. <i>ACS Applied Materials & Interfaces</i> , 2012, 4, 2551-2560.	8.0	162
29	High-Performance Organic Field-Effect Transistors with Directionally Aligned Conjugated Polymer Film Deposited from Pre-Aggregated Solution. <i>Chemistry of Materials</i> , 2015, 27, 8345-8353.	6.7	156
30	High-photosensitivity p-channel organic phototransistors based on a biphenyl end-capped fused bithiophene oligomer. <i>Applied Physics Letters</i> , 2005, 86, 043501.	3.3	153
31	High efficiency polymer solar cells via sequential inkjet-printing of PEDOT:PSS and P3HT:PCBM inks with additives. <i>Organic Electronics</i> , 2010, 11, 1516-1522.	2.6	150
32	Charge Injection Engineering of Ambipolar Field-Effect Transistors for High-Performance Organic Complementary Circuits. <i>ACS Applied Materials & Interfaces</i> , 2011, 3, 3205-3214.	8.0	150
33	Direct Observation of Ag Filamentary Paths in Organic Resistive Memory Devices. <i>Advanced Functional Materials</i> , 2011, 21, 3976-3981.	14.9	149
34	Enhanced Charge Injection in Pentacene Field-Effect Transistors with Graphene Electrodes. <i>Advanced Materials</i> , 2011, 23, 100-105.	21.0	124
35	Enhanced performance of inverted polymer solar cells with cathode interfacial tuning via water-soluble polyfluorenes. <i>Applied Physics Letters</i> , 2010, 97, .	3.3	123
36	Flexible organic solar cells composed of P3HT:PCBM using chemically doped graphene electrodes. <i>Nanotechnology</i> , 2012, 23, 344013.	2.6	119

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37	A New Poly(thienylenevinylene) Derivative with High Mobility and Oxidative Stability for Organic Thin-Film Transistors and Solar Cells. <i>Advanced Materials</i> , 2009, 21, 2808-2814.	21.0	118
38	Control of Ambipolar and Unipolar Transport in Organic Transistors by Selective Inkjet-Printed Chemical Doping for High Performance Complementary Circuits. <i>Advanced Functional Materials</i> , 2014, 24, 6252-6261.	14.9	116
39	Efficient organic solar cells with polyfluorene derivatives as a cathode interfacial layer. <i>Organic Electronics</i> , 2009, 10, 496-500.	2.6	115
40	Flexible Nanoporous WO ₃ Nonvolatile Memory Device. <i>ACS Nano</i> , 2016, 10, 7598-7603.	14.6	114
41	Electrophoretically deposited TiO ₂ photo-electrodes for use in flexible dye-sensitized solar cells. <i>Journal of Photochemistry and Photobiology A: Chemistry</i> , 2005, 173, 1-6.	3.9	106
42	Slot die coated planar perovskite solar cells via blowing and heating assisted one step deposition. <i>Solar Energy Materials and Solar Cells</i> , 2018, 179, 80-86.	6.2	104
43	High speeds complementary integrated circuits fabricated with all-printed polymeric semiconductors. <i>Journal of Polymer Science, Part B: Polymer Physics</i> , 2011, 49, 62-67.	2.1	102
44	Exfoliated and Partially Oxidized MoS ₂ Nanosheets by One-Pot Reaction for Efficient and Stable Organic Solar Cells. <i>Small</i> , 2014, 10, 2319-2324.	10.0	102
45	Fully spray-coated ITO-free organic solar cells for low-cost power generation. <i>Solar Energy Materials and Solar Cells</i> , 2010, 94, 1333-1337.	6.2	101
46	High-performance polymer solar cells with moderately reduced graphene oxide as an efficient hole transporting layer. <i>Solar Energy Materials and Solar Cells</i> , 2012, 105, 96-102.	6.2	101
47	One Transistor-One Resistor Devices for Polymer Non-Volatile Memory Applications. <i>Advanced Materials</i> , 2009, 21, 2497-2500.	21.0	100
48	Emulsion-Based Synthesis of Reversibly Swellable, Magnetic Nanoparticle-Embedded Polymer Microcapsules. <i>Chemistry of Materials</i> , 2006, 18, 3308-3313.	6.7	94
49	Humidity-Tolerant Roll-to-Roll Fabrication of Perovskite Solar Cells via Polymer-Assisted Hot Slot Die Deposition. <i>Advanced Functional Materials</i> , 2019, 29, 1809194.	14.9	93
50	Tuning of a graphene-electrode work function to enhance the efficiency of organic bulk heterojunction photovoltaic cells with an inverted structure. <i>Applied Physics Letters</i> , 2010, 97, .	3.3	92
51	Slot-Die Coated Perovskite Films Using Mixed Lead Precursors for Highly Reproducible and Large-Area Solar Cells. <i>ACS Applied Materials & Interfaces</i> , 2018, 10, 16133-16139.	8.0	92
52	Printing-friendly sequential deposition via intra-additive approach for roll-to-roll process of perovskite solar cells. <i>Nano Energy</i> , 2017, 41, 443-451.	16.0	91
53	Comparative Investigation of Transparent ITO/Ag/ITO and ITO/Cu/ITO Electrodes Grown by Dual-Target DC Sputtering for Organic Photovoltaics. <i>Journal of the Electrochemical Society</i> , 2009, 156, H588.	2.9	90
54	Domain-engineered BiFeO ₃ thin-film photoanodes for highly enhanced ferroelectric solar water splitting. <i>Nano Research</i> , 2018, 11, 642-655.	10.4	88

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55	Improved Performance in Dye-Sensitized Solar Cells Employing TiO ₂ Photoelectrodes Coated with Metal Hydroxides. <i>Journal of Physical Chemistry B</i> , 2006, 110, 3215-3219.	2.6	87
56	Large Enhancement of Carrier Transport in Solution-Processed Field-Effect Transistors by Fluorinated Dielectric Engineering. <i>Advanced Materials</i> , 2016, 28, 518-526.	21.0	87
57	Surface relief gratings on poly(3-hexylthiophene) and fullerene blends for efficient organic solar cells. <i>Applied Physics Letters</i> , 2007, 91, .	3.3	85
58	Photodynamic Properties of Azobenzene Molecular Films with Triphenylamines. <i>Chemistry of Materials</i> , 2003, 15, 4021-4027.	6.7	83
59	Water-Soluble Polyfluorenes as an Electron Injecting Layer in PLEDs for Extremely High Quantum Efficiency. <i>Advanced Materials</i> , 2008, 20, 1624-1629.	21.0	83
60	Conjugated Polymers Incorporating a Novel Planar Quinoid Building Block with Extended Delocalization and High Charge Carrier Mobility. <i>Advanced Materials</i> , 2018, 30, e1706557.	21.0	81
61	Novel Approach to the Fabrication of Macroporous Polymers and Their Use as a Template for Crystalline Titania Nanorings. <i>Nano Letters</i> , 2003, 3, 207-211.	9.1	77
62	Controlled Charge Transport by Polymer Blend Dielectrics in Top-Gate Organic Field-Effect Transistors for Low-Voltage-Operating Complementary Circuits. <i>ACS Applied Materials & Interfaces</i> , 2012, 4, 6176-6184.	8.0	77
63	Templated Synthesis of Porous Capsules with a Controllable Surface Morphology and their Application as Gas Sensors. <i>Advanced Functional Materials</i> , 2007, 17, 1743-1749.	14.9	75
64	Efficient photovoltaic device fashioned of highly aligned multilayers of electrospun TiO ₂ nanowire array with conjugated polymer. <i>Applied Physics Letters</i> , 2008, 92, 183107.	3.3	74
65	Quinoidal Molecules as a New Class of Ambipolar Semiconductor Originating from Amphoteric Redox Behavior. <i>Advanced Functional Materials</i> , 2015, 25, 1146-1156.	14.9	74
66	Synthesis of a New Cross-Linkable Perfluorocyclobutane-Based Hole-Transport Material. <i>Organic Letters</i> , 2006, 8, 4703-4706.	4.6	73
67	Photoinduced Supramolecular Chirality in Amorphous Azobenzene Polymer Films. <i>Journal of the American Chemical Society</i> , 2002, 124, 3504-3505.	13.7	72
68	Highly Soluble Poly(thienylenevinylene) Derivatives with Charge-Carrier Mobility Exceeding 1 cm ² V ⁻¹ s ⁻¹ . <i>Chemistry of Materials</i> , 2011, 23, 4663-4665.	6.7	72
69	Surface plasmon enhanced photoluminescence of conjugated polymers. <i>Applied Physics Letters</i> , 2007, 90, 161107.	3.3	70
70	Fabrication of TiO ₂ nanotubes by using electrodeposited ZnO nanorod template and their application to hybrid solar cells. <i>Electrochimica Acta</i> , 2008, 53, 2560-2566.	5.2	70
71	Synthesis of a Double Spiro-Polyindenofluorene with a Stable Blue Emission. <i>Organic Letters</i> , 2005, 7, 4229-4232.	4.6	69
72	Sulfonic acid-functionalized, reduced graphene oxide as an advanced interfacial material leading to donor polymer-independent high-performance polymer solar cells. <i>Journal of Materials Chemistry A</i> , 2014, 2, 292-298.	10.3	69

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73	Influence of the Ionic Functionalities of Polyfluorene Derivatives as a Cathode Interfacial Layer on Inverted Polymer Solar Cells. <i>ACS Applied Materials & Interfaces</i> , 2014, 6, 6227-6236.	8.0	69
74	Reversible switching characteristics of polyfluorene-derivative single layer film for nonvolatile memory devices. <i>Applied Physics Letters</i> , 2008, 92, .	3.3	66
75	Effect of light irradiation on the characteristics of organic field-effect transistors. <i>Journal of Applied Physics</i> , 2006, 100, 094501.	2.5	65
76	Novel cationic water-soluble polyfluorene derivatives with ion-transporting side groups for efficient electron injection in PLEDs. <i>Organic Electronics</i> , 2007, 8, 773-783.	2.6	65
77	Improved performance uniformity of inkjet printed n-channel organic field-effect transistors and complementary inverters. <i>Organic Electronics</i> , 2011, 12, 634-640.	2.6	65
78	Organic phototransistor based on pentacene as an efficient red light sensor. <i>Solid-State Electronics</i> , 2007, 51, 1052-1055.	1.4	64
79	Hybrid solar cells with ordered TiO ₂ nanostructures and MEH-PPV. <i>Journal of Photochemistry and Photobiology A: Chemistry</i> , 2007, 188, 364-370.	3.9	64
80	Successive solvent-treated PEDOT:PSS electrodes for flexible ITO-free organic photovoltaics. <i>Solar Energy Materials and Solar Cells</i> , 2013, 114, 104-109.	6.2	64
81	Stable charge storing in two-dimensional MoS ₂ nanoflake floating gates for multilevel organic flash memory. <i>Nanoscale</i> , 2014, 6, 12315-12323.	5.6	64
82	Low-voltage, high speed inkjet-printed flexible complementary polymer electronic circuits. <i>Organic Electronics</i> , 2013, 14, 1407-1418.	2.6	63
83	A novel spiro-functionalized polyfluorene derivative with solubilizing side chains. <i>Journal of Materials Chemistry</i> , 2004, 14, 1342.	6.7	60
84	High Performance and Stable N-Channel Organic Field-Effect Transistors by Patterned Solvent-Vapor Annealing. <i>ACS Applied Materials & Interfaces</i> , 2013, 5, 10745-10752.	8.0	60
85	Well-ordered TiO ₂ nanostructures fabricated using surface relief gratings on polymer films. <i>Journal of Materials Chemistry</i> , 2006, 16, 370-375.	6.7	58
86	Optimized Organometal Halide Perovskite Planar Hybrid Solar Cells via Control of Solvent Evaporation Rate. <i>Journal of Physical Chemistry C</i> , 2014, 118, 26513-26520.	3.1	58
87	Synthesis of Two Types of Nanoparticles in Polyelectrolyte Capsule Nanoreactors and Their Dual Functionality. <i>Journal of the American Chemical Society</i> , 2005, 127, 16136-16142.	13.7	56
88	Annealing-free fabrication of P3HT:PCBM solar cells via simple brush painting. <i>Solar Energy Materials and Solar Cells</i> , 2010, 94, 171-175.	6.2	56
89	Reduced graphene oxide-assisted crystallization of perovskite via solution-process for efficient and stable planar solar cells with module-scales. <i>Nano Energy</i> , 2016, 30, 667-676.	16.0	56
90	In-depth considerations for better polyelectrolytes as interfacial materials in polymer solar cells. <i>Nano Energy</i> , 2016, 21, 26-38.	16.0	56

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91	Transient reverse current phenomenon in a p-n heterojunction comprised of poly(3,4-ethylene-dioxythiophene):poly(styrene-sulfonate) and ZnO nanowall. <i>Applied Physics Letters</i> , 2008, 93, .	3.3	55
92	Optimal Ambipolar Charge Transport of Thienylenevinylene-Based Polymer Semiconductors by Changes in Conformation for High-Performance Organic Thin Film Transistors and Inverters. <i>Chemistry of Materials</i> , 2013, 25, 1572-1583.	6.7	55
93	Spin-on-Based Fabrication of Titania Nanowires Using a Sol [−] Gel Process. <i>Nano Letters</i> , 2002, 2, 1101-1104.	9.1	54
94	Brush painted V2O5 hole transport layer for efficient and air-stable polymer solar cells. <i>Solar Energy Materials and Solar Cells</i> , 2015, 132, 196-203.	6.2	54
95	Systematic Study of Widely Applicable N [−] Doping Strategy for High-Performance Solution-Processed Field-Effect Transistors. <i>Advanced Functional Materials</i> , 2016, 26, 7886-7894.	14.9	53
96	“Grafting” From Polymerization inside a Polyelectrolyte Hollow Capsule Microreactor. <i>Angewandte Chemie - International Edition</i> , 2005, 44, 1096-1101.	13.8	52
97	Enhancement of the light output of GaN-based ultraviolet light-emitting diodes by a one-dimensional nanopatterning process. <i>Applied Physics Letters</i> , 2006, 88, 103505.	3.3	52
98	Moderately reduced graphene oxide as transparent counter electrodes for dye-sensitized solar cells. <i>Electrochimica Acta</i> , 2012, 81, 301-307.	5.2	52
99	Progress in Scalable Coating and Roll-to-Roll Compatible Printing Processes of Perovskite Solar Cells toward Realization of Commercialization. <i>Advanced Optical Materials</i> , 2018, 6, 1701182.	7.3	52
100	Photoinduced surface relief gratings in high-Tg main-chain azoaromatic polymer films. <i>Journal of Polymer Science Part A</i> , 1998, 36, 283-289.	2.3	51
101	Surface-modulation-controlled three-dimensional colloidal crystals. <i>Applied Physics Letters</i> , 2002, 80, 225-227.	3.3	51
102	One-Step Printable Perovskite Films Fabricated under Ambient Conditions for Efficient and Reproducible Solar Cells. <i>ACS Applied Materials & Interfaces</i> , 2017, 9, 27832-27838.	8.0	51
103	Synthesis and Characterization of Spiro-Triphenylamine Configured Polyfluorene Derivatives with Improved Hole Injection. <i>Macromolecules</i> , 2006, 39, 6433-6439.	4.8	50
104	Synergistic High Charge-Storage Capacity for Multi-level Flexible Organic Flash Memory. <i>Scientific Reports</i> , 2015, 5, 12299.	3.3	50
105	Room-Temperature Indium-Free Ga:ZnO/Ag/Ga:ZnO Multilayer Electrode for Organic Solar Cell Applications. <i>Electrochemical and Solid-State Letters</i> , 2009, 12, H309.	2.2	49
106	New Donor-Donor Type Copolymers with Rigid and Coplanar Structures for High-Mobility Organic Field-Effect Transistors. <i>Chemistry of Materials</i> , 2014, 26, 6907-6910.	6.7	49
107	Resistive switching characteristics of polymer non-volatile memory devices in a scalable via-hole structure. <i>Nanotechnology</i> , 2009, 20, 025201.	2.6	47
108	Factors to be Considered in Bulk Heterojunction Polymer Solar Cells Fabricated by the Spray Process. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2010, 16, 1838-1846.	2.9	47

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109	Flexible Complementary Logic Gates Using Inkjet-Printed Polymer Field-Effect Transistors. IEEE Electron Device Letters, 2013, 34, 126-128.	3.9	44
110	Moderately reduced graphene oxide as hole transport layer in polymer solar cells via thermal assisted spray process. Applied Surface Science, 2014, 296, 140-146.	6.1	42
111	Kinetically Controlled Crystallization in Conjugated Polymer Films for High-Performance Organic Field-Effect Transistors. Advanced Functional Materials, 2019, 29, 1807786.	14.9	42
112	A hybridized electron-selective layer using Sb-doped SnO ₂ nanowires for efficient inverted polymer solar cells. Solar Energy Materials and Solar Cells, 2011, 95, 2874-2879.	6.2	41
113	Spray-printed organic field-effect transistors and complementary inverters. Journal of Materials Chemistry C, 2013, 1, 1500.	5.5	40
114	Ambipolar Small-Molecule:Polymer Blend Semiconductors for Solution-Processable Organic Field-Effect Transistors. ACS Applied Materials & Interfaces, 2017, 9, 2686-2692.	8.0	40
115	Organic Nano-Floating-Gate Memory with Polymer:[6,6]-Phenyl-C61Butyric Acid Methyl Ester Composite Films. Japanese Journal of Applied Physics, 2010, 49, 05EB01.	1.5	39
116	Precise Side-Chain Engineering of Thienylenevinylene-Benzotriazole-Based Conjugated Polymers with Coplanar Backbone for Organic Field Effect Transistors and CMOS-like Inverters. ACS Applied Materials & Interfaces, 2017, 9, 2758-2766.	8.0	39
117	The Effect of Fluorine Substitution on the Molecular Interactions and Performance in Polymer Solar Cells. ACS Applied Materials & Interfaces, 2017, 9, 24011-24019.	8.0	39
118	Control of Photodynamic Motions of Azobenzene-Derivative Polymers by Laser Excitation Wavelength. Macromolecular Chemistry and Physics, 2007, 208, 1753-1763.	2.2	37
119	Solution-Processed Barium Salts as Charge Injection Layers for High Performance N-Channel Organic Field-Effect Transistors. ACS Applied Materials & Interfaces, 2014, 6, 9614-9621.	8.0	37
120	Effect of Polymer Gate Dielectrics on Charge Transport in Carbon Nanotube Network Transistors: Low- <i>k</i> Insulator for Favorable Active Interface. ACS Applied Materials & Interfaces, 2016, 8, 32421-32431.	8.0	35
121	Exploration of fabrication methods for planar CH ₃ NH ₃ PbI ₃ perovskite solar cells. Nano Energy, 2016, 27, 175-184.	16.0	35
122	A Novel Thermally Reversible Soluble-Insoluble Conjugated Polymer with Semi-Fluorinated Alkyl Chains: Enhanced Transistor Performance by Fluorophobic Self-Organization and Orthogonal Hydrophobic Patterning. Advanced Materials, 2013, 25, 6416-6422.	21.0	34
123	A conjugated polymer with high planarity and extended π -electron delocalization via a quinoid structure prepared by short synthetic steps. Polymer Chemistry, 2017, 8, 361-365.	3.9	34
124	Characterization of a high-thermal-stability spiroanthracene-fluorene-based blue-light-emitting polymer optical gain medium. Journal of Applied Physics, 2005, 98, 083101.	2.5	33
125	Synthesis and characterization of low-band-gap poly(thienylenevinylene) derivatives for polymer solar cells. Journal of Materials Chemistry, 2011, 21, 11822.	6.7	33
126	A selection rule of solvent for highly aligned diketopyrrolopyrrole-based conjugated polymer film for high performance organic field-effect transistors. Organic Electronics, 2018, 55, 6-14.	2.6	33

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127	Synthesis of novel arylamine containing perfluorocyclobutane and its electrochromic properties. <i>Journal of Materials Chemistry</i> , 2009, 19, 2380.	6.7	32
128	Electron injection enhancement by a Cs-salt interlayer in ambipolar organic field-effect transistors and complementary circuits. <i>Journal of Materials Chemistry</i> , 2012, 22, 16979.	6.7	32
129	Diseleno[3,2-b:2',3'-d]selenophene-Containing High-Mobility Conjugated Polymer for Organic Field-Effect Transistors. <i>Advanced Science</i> , 2019, 6, 1900245.	11.2	32
130	Wide and Tunable Bandgap MAPbBr ₃ Cl Hybrid Perovskites with Enhanced Phase Stability: In Situ Investigation and Photovoltaic Devices. <i>Solar Rrl</i> , 2021, 5, 2000718.	5.8	32
131	Fabrication of a Mesoscale Wire: Sintering of a Polymer Colloid Arrayed Inside a One-Dimensional Groove Pattern. <i>Langmuir</i> , 2002, 18, 5321-5323.	3.5	31
132	Effect of gate bias sweep rate on the electronic properties of ZnO nanowire field-effect transistors under different environments. <i>Applied Physics Letters</i> , 2008, 92, .	3.3	31
133	Highly stable printed polymer field-effect transistors and inverters via polyselenophene conjugated polymers. <i>Journal of Materials Chemistry</i> , 2012, 22, 12774.	6.7	31
134	Solution-processible polymer solar cells fabricated on a papery substrate. <i>Physica Status Solidi - Rapid Research Letters</i> , 2012, 6, 13-15.	2.4	30
135	Differentially pumped spray deposition as a rapid screening tool for organic and perovskite solar cells. <i>Scientific Reports</i> , 2016, 6, 20357.	3.3	30
136	Blending of n-type Semiconducting Polymer and PC ₆₁ BM for an Efficient Electron-Selective Material to Boost the Performance of the Planar Perovskite Solar Cell. <i>ACS Applied Materials & Interfaces</i> , 2016, 8, 12822-12829.	8.0	30
137	Enhanced electrochromic absorption in Ag nanoparticle embedded conjugated polymer composite films. <i>Electrochemistry Communications</i> , 2007, 9, 1542-1546.	4.7	29
138	Polymer Dielectrics and Orthogonal Solvent Effects for High-Performance Inkjet-Printed Top-Gated P-Channel Polymer Field-Effect Transistors. <i>ETRI Journal</i> , 2011, 33, 887-896.	2.0	29
139	In situ study of the film formation mechanism of organic-inorganic hybrid perovskite solar cells: controlling the solvate phase using an additive system. <i>Journal of Materials Chemistry A</i> , 2020, 8, 7695-7703.	10.3	29
140	Electrical conduction through self-assembled monolayers in molecular junctions: Au/molecules/Au versus Au/molecule/PEDOT:PSS/Au. <i>Thin Solid Films</i> , 2009, 518, 824-828.	1.8	28
141	A morphology controller for high-efficiency bulk-heterojunction polymer solar cells. <i>Journal of Materials Chemistry</i> , 2010, 20, 10919.	6.7	28
142	Synthesis and Photovoltaic Properties of a Thienylenevinylene and Diketopyrrolopyrrole Copolymer with High Mobility. <i>Macromolecular Rapid Communications</i> , 2011, 32, 1551-1556.	3.9	28
143	Simultaneous Improvement of Hole and Electron Injection in Organic Field-effect Transistors by Conjugated Polymer-wrapped Carbon Nanotube Interlayers. <i>Scientific Reports</i> , 2015, 5, 10407.	3.3	28
144	3,4-Ethylenedioxythiophene-Based Isomer-Free Quinoidal Building Block and Conjugated Polymers for Organic Field-Effect Transistors. <i>Macromolecules</i> , 2020, 53, 1977-1987.	4.8	28

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145	All-optical THz wave switching based on CH ₃ NH ₃ PbI ₃ perovskites. <i>Scientific Reports</i> , 2016, 6, 37912.	3.3	27
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