

Xianfeng Qiao

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/1741148/publications.pdf>

Version: 2024-02-01

99
papers

3,558
citations

147801

31
h-index

149698

56
g-index

99
all docs

99
docs citations

99
times ranked

4048
citing authors

#	ARTICLE	IF	CITATIONS
1	Efficient exciton regulation for high-performance hybrid white organic light-emitting diodes with superior efficiency/CRI/color stability based on blue aggregation-induced emission fluorophor. <i>Organic Electronics</i> , 2022, 101, 106425.	2.6	2
2	In Situ Quantifying the Physical Parameters Determining the Efficiency of OLEDs Relying on Triplet-Triplet Annihilation Up-Conversion. <i>Advanced Optical Materials</i> , 2022, 10, .	7.3	20
3	Solid experimental evidence for reverse intersystem crossing from high-lying triplet states: A case study on hot exciton mechanism in OLEDs. <i>Applied Physics Letters</i> , 2022, 120, 083501.	3.3	2
4	Visualizing the exciton formation channel in exciplex-based organic light-emitting diodes. <i>Organic Electronics</i> , 2022, 105, 106497.	2.6	2
5	A Promising Multifunctional Deep-Blue Fluorophor for High-Performance Monochromatic and Hybrid White OLEDs with Superior Efficiency/Color Stability and Low Efficiency Roll-Off. <i>Advanced Optical Materials</i> , 2022, 10, .	7.3	11
6	Novel deep-blue hot exciton material for high-efficiency nondoped organic light-emitting diodes. <i>Journal of Materials Chemistry C</i> , 2022, 10, 6596-6602.	5.5	11
7	Improved transient electroluminescence technique based on time-correlated single-photon counting technology to evaluate organic mobility. <i>Frontiers of Optoelectronics</i> , 2022, 15, 1.	3.7	2
8	Exciton Regulation for Organic Light-Emitting Diodes with Improved Efficiency and Roll-Off by Managing the Bipolar Spacer Layers Based on Interfacial Exciplexes. <i>ACS Applied Electronic Materials</i> , 2022, 4, 3088-3098.	4.3	5
9	Regulating excited state of sulfone-locked triphenylamine heteroaromatics for high-efficiency ultralong room-temperature phosphorescence. <i>Chemical Engineering Journal</i> , 2022, 449, 137834.	12.7	19
10	Investigation on the mechanism of charge generation in organic heterojunctions: Analysis of I-V and C-V characteristics. <i>Organic Electronics</i> , 2021, 88, 105979.	2.6	14
11	High efficiency and long lifetime fluorescent white organic light-emitting diodes by phosphor sensitization to strategically manage singlet and triplet excitons. <i>Journal of Materials Chemistry C</i> , 2021, 9, 3626-3634.	5.5	7
12	Unraveling the Important Role of High-Lying Triplet-Lowest Excited Singlet Transitions in Achieving Highly Efficient Deep-Blue AIE-Based OLEDs. <i>Advanced Materials</i> , 2021, 33, e2006953.	21.0	66
13	Effect of the relationship between the energy levels of host and guest on EL performance of phosphorescence organic light-emitting diodes. <i>Organic Electronics</i> , 2021, 93, 106128.	2.6	3
14	Efficiency Breakthrough of Fluorescence OLEDs by the Strategic Management of Hot Excitons at Highly Lying Excitation Triplet Energy Levels. <i>Advanced Functional Materials</i> , 2021, 31, 2106912.	14.9	75
15	Exceptionally efficient deep blue anthracene-based luminogens: design, synthesis, photophysical, and electroluminescent mechanisms. <i>Science Bulletin</i> , 2021, 66, 2090-2098.	9.0	15
16	Nonlinear optoelectronic processes in organic optoelectronic devices: Triplet-triplet annihilation and singlet fission. <i>Materials Science and Engineering Reports</i> , 2020, 139, 100519.	31.8	50
17	High efficiency and low efficiency roll-off all fluorescent white organic light-emitting diodes based on phosphor sensitization. <i>Journal of Materials Chemistry C</i> , 2020, 8, 1666-1672.	5.5	11
18	Mechanistic Study on High Efficiency Deep Blue AIE-Based Organic Light-Emitting Diodes by Magneto-Electroluminescence. <i>Advanced Functional Materials</i> , 2020, 30, 1908704.	14.9	51

#	ARTICLE	IF	CITATIONS
19	Magneto-Electroluminescence Studies on the Role of Intermolecular Spin-Orbital Coupling Processes for the Transition between Singlet and Triplet Excitons in Exciplex-Based Phosphorescent Organic Light-Emitting Diodes. <i>Advanced Optical Materials</i> , 2020, 8, 2000991.	7.3	4
20	Simultaneous high efficiency/CRI/spectral stability and low efficiency roll-off hybrid white organic light-emitting diodes via simple insertion of ultrathin red/green phosphorescent emitters in a blue exciplex. <i>Journal of Materials Chemistry C</i> , 2020, 8, 12450-12456.	5.5	12
21	High efficiency blue and color-stable hybrid warm white organic light-emitting diodes based on a thermally activated delayed fluorescent material as an assistant host. <i>Journal of Materials Chemistry C</i> , 2020, 8, 13777-13785.	5.5	15
22	Air-Processed Perovskite Films with Inner-Outside Passivation for High-Efficiency Solar Cells. <i>Solar Rrl</i> , 2020, 4, 2000410.	5.8	5
23	High efficiency, low efficiency roll-off and long lifetime fluorescent white organic light-emitting diodes based on strategic management of triplet excitons via triplet-triplet annihilation up-conversion and phosphor sensitization. <i>Journal of Materials Chemistry C</i> , 2020, 8, 8077-8084.	5.5	5
24	High efficiency and long lifetime fluorescent organic light-emitting diodes based on cascaded energy transfer processes to efficiently utilize triplet excitons via sensitizer. <i>Organic Electronics</i> , 2020, 84, 105824.	2.6	15
25	High efficiency doping-free warm-white organic light-emitting diodes with strategic-tuning of radiative excitons by combining interfacial exciplex with multi-ultrathin emissive layers. <i>Organic Electronics</i> , 2020, 85, 105876.	2.6	7
26	High efficiency and color quality undoped phosphorescent white organic light-emitting diodes based on simple ultrathin structure in exciplex. <i>Organic Electronics</i> , 2020, 85, 105821.	2.6	5
27	Novel strategy to improve the efficiency roll-off at high luminance and operational lifetime of hybrid white OLEDs via employing an assistant layer with triplet-triplet annihilation up-conversion characteristics. <i>Journal of Materials Chemistry C</i> , 2020, 8, 6577-6586.	5.5	10
28	Highly efficient charge generation and injection in HAT-CN/TAPC heterojunction for high efficiency tandem organic light-emitting diodes. <i>Organic Electronics</i> , 2020, 83, 105745.	2.6	23
29	High-performance white organic light-emitting diodes with doping-free device architecture based on the exciton adjusting interfacial exciplex. <i>Journal of Materials Chemistry C</i> , 2020, 8, 7019-7025.	5.5	11
30	Highly efficient fluorescence/phosphorescence hybrid white organic light-emitting devices based on a bipolar blue emitter to precisely control charges and excitons. <i>Journal of Materials Chemistry C</i> , 2020, 8, 7543-7551.	5.5	20
31	Superior Efficiency and Low-Efficiency Roll-Off White Organic Light-Emitting Diodes Based on Multiple Exciplexes as Hosts Matched to Phosphor Emitters. <i>ACS Applied Materials & Interfaces</i> , 2019, 11, 31078-31086.	8.0	19
32	High efficiency organic light-emitting diodes based on HAT-CN/TAPC heterojunction charge generation layer as charge injectors. <i>Semiconductor Science and Technology</i> , 2019, 34, 105010.	2.0	14
33	Efficient Deep-Blue Fluorescent OLEDs with a High Exciton Utilization Efficiency from a Fully Twisted Phenanthroimidazole-Anthracene Emitter. <i>ACS Applied Materials & Interfaces</i> , 2019, 11, 31139-31146.	8.0	78
34	EL Properties and Exciton Dynamics of High-Performance Doping-Free Hybrid WOLEDs Based on 4P-NPD/Bepp 2 Heterojunction as Blue Emitter. <i>Advanced Optical Materials</i> , 2019, 7, 1900703.	7.3	21
35	High-Performance White Organic Light-Emitting Diodes with High Efficiency, Low Efficiency Roll-Off, and Superior Color Stability/Color Rendering Index by Strategic Design of Exciplex Hosts. <i>Advanced Optical Materials</i> , 2019, 7, 1901291.	7.3	22
36	Triplet-triplet annihilation effects in rubrene/C60 OLEDs with electroluminescence turn-on breaking the thermodynamic limit. <i>Nature Communications</i> , 2019, 10, 4683.	12.8	12

#	ARTICLE	IF	CITATIONS
37	High efficiency blue/green/yellow/red fluorescent organic light-emitting diodes sensitized by phosphors: general design rules and electroluminescence performance analysis. <i>Journal of Materials Chemistry C</i> , 2019, 7, 11293-11302.	5.5	21
38	An inversion of magnetic field effects in electromer-based organic light-emitting diodes. <i>Journal of Materials Chemistry C</i> , 2019, 7, 1035-1041.	5.5	11
39	High efficiency color-tunable organic light-emitting diodes with ultra-thin emissive layers in blue phosphor doped exciplex. <i>Applied Physics Letters</i> , 2019, 114, .	3.3	15
40	Highly Efficient Blue Fluorescent OLEDs Based on Upper Level Triplet-Singlet Intersystem Crossing. <i>Advanced Materials</i> , 2019, 31, e1807388.	21.0	288
41	Nondoped blue fluorescent organic light-emitting diodes based on benzonitrile-anthracene derivative with 10.06% external quantum efficiency and low efficiency roll-off. <i>Journal of Materials Chemistry C</i> , 2019, 7, 1014-1021.	5.5	74
42	Strategic-tuning of radiative excitons for efficient and stable fluorescent white organic light-emitting diodes. <i>Nature Communications</i> , 2019, 10, 2380.	12.8	84
43	High efficiency warm white organic light-emitting diodes with precise confinement of charge carriers and excitons in the exciplex host system. <i>Journal of Materials Chemistry C</i> , 2019, 7, 7114-7120.	5.5	12
44	Harvesting Triplet Excitons in Lead-Halide Perovskites for Room-Temperature Phosphorescence. <i>Chemistry of Materials</i> , 2019, 31, 2597-2602.	6.7	57
45	Organic Solar Cells Based on High Hole Mobility Conjugated Polymer and Nonfullerene Acceptor with Comparable Bandgaps and Suitable Energy Level Offsets Showing Significant Suppression of Trade-Off. <i>Solar Rrl</i> , 2019, 3, 1900079.	5.8	25
46	High Efficiency and Low Roll-Off Hybrid WOLEDs by Using a Deep Blue Aggregation-Induced Emission Material Simultaneously as Blue Emitter and Phosphor Host. <i>Advanced Optical Materials</i> , 2019, 7, 1801539.	7.3	23
47	Upper Excited Triplet State-Mediated Intersystem Crossing for Anti-Kasha's Fluorescence: Potential Application in Deep-Ultraviolet Sensing. <i>Journal of Physical Chemistry C</i> , 2019, 123, 5761-5766.	3.1	21
48	Precise regulation of the emissive layer for ultra-high performance white organic light-emitting diodes in an exciplex forming co-host system. <i>Materials Chemistry Frontiers</i> , 2019, 3, 640-649.	5.9	17
49	Highly Efficient Deep Blue Aggregation-Induced Emission Organic Molecule: A Promising Multifunctional Electroluminescence Material for Blue/Green/Orange/Red/White OLEDs with Superior Efficiency and Low Roll-Off. <i>ACS Photonics</i> , 2019, 6, 767-778.	6.6	75
50	Improvement of the Electroluminescence Performance of Exciplex-Based OLEDs by Effective Utilization of Long-Range Coupled Electron-Hole Pairs. <i>Advanced Optical Materials</i> , 2019, 7, 1801648.	7.3	37
51	Design and performance study of high efficiency/low efficiency roll-off/high CRI hybrid WOLEDs based on aggregation-induced emission materials as fluorescent emitters. <i>Materials Chemistry Frontiers</i> , 2019, 3, 2652-2658.	5.9	17
52	Energy level modulation of donor-acceptor alternating random conjugated copolymers for achieving high-performance polymer solar cells. <i>Journal of Materials Chemistry C</i> , 2019, 7, 15335-15343.	5.5	7
53	Correlated magnetic field effects on carriers and excitons in single-carrier exciplex-based organic photodiodes. <i>Physical Chemistry Chemical Physics</i> , 2019, 21, 26413-26419.	2.8	2
54	High efficiency and low roll-off all fluorescence white organic light-emitting diodes by the formation of interface exciplex. <i>Organic Electronics</i> , 2019, 67, 72-78.	2.6	18

#	ARTICLE	IF	CITATIONS
55	Trap-Assisted Enhanced Bias Illumination Stability of Oxide Thin Film Transistor by Praseodymium Doping. ACS Applied Materials & Interfaces, 2019, 11, 5232-5239.	8.0	34
56	Magnetic field effects on the quenching of triplet excitons in exciplex-based organic light emitting diodes. Journal of Materials Chemistry C, 2018, 6, 5721-5726.	5.5	31
57	Highly efficient inverted organic light-emitting diodes with organic p-n junction as electron injection layer. Organic Electronics, 2018, 58, 185-190.	2.6	8
58	Realizing efficient red thermally activated delayed fluorescence organic light-emitting diodes using phenoxazine/phenothiazine-phenanthrene hybrids. Organic Electronics, 2018, 59, 32-38.	2.6	35
59	High efficiency hybrid white organic light-emitting diodes based on a simple and efficient exciton regulation emissive layer structure. RSC Advances, 2018, 8, 40883-40893.	3.6	2
60	Improvement of efficiency and its roll-off at high brightness in white organic light-emitting diodes by strategically managing triplet excitons in the emission layer. Journal of Materials Chemistry C, 2018, 6, 10793-10803.	5.5	27
61	Molecular engineering of two-dimensional hybrid perovskites with broadband emission for white light-emitting diodes. Journal of Materials Chemistry C, 2018, 6, 10301-10307.	5.5	38
62	Properties of Highly Efficient Charge Generation and Transport of Multialternating Organic Heterojunctions and Its Application in Organic Light-Emitting Diodes. Advanced Electronic Materials, 2018, 4, 1800177.	5.1	16
63	Efficient Room-Temperature Phosphorescence from Organic-Inorganic Hybrid Perovskites by Molecular Engineering. Advanced Materials, 2018, 30, e1707621.	21.0	126
64	Electrical pumped energy up-conversion: A non-linear electroluminescence process mediated by triplet-triplet annihilation. Organic Electronics, 2017, 46, 1-6.	2.6	28
65	C70/C70:pentacene/pentacene organic heterojunction as the connecting layer for high performance tandem organic light-emitting diodes: Mechanism investigation of electron injection and transport. Journal of Applied Physics, 2017, 121, 115502.	2.5	7
66	Highly efficient charge generation and electron injection of m-MTDATA/m-MTDATA:HAT-CN/HAT-CN organic heterojunction on ITO cathode for high efficiency inverted white organic light-emitting diodes. Journal of Applied Physics, 2017, 122, 125501.	2.5	9
67	Precise Exciton Allocation for Highly Efficient White Organic Light-Emitting Diodes with Low Efficiency Roll-Off Based on Blue Thermally Activated Delayed Fluorescent Exciplex Emission. Advanced Optical Materials, 2017, 5, 1700415.	7.3	95
68	C ₇₀ /Pentacene Organic Heterojunction as Charge Generator to Realize Highly Efficient Charge Carrier Injection in Organic Light-Emitting Diodes: Performance and Mechanism Analysis. Advanced Materials Interfaces, 2016, 3, 1600081.	3.7	9
69	Simple-Structured Phosphorescent Warm White Organic Light-Emitting Diodes with High Power Efficiency and Low Efficiency Roll-off. ACS Applied Materials & Interfaces, 2016, 8, 10093-10097.	8.0	62
70	Managing Excitons and Charges for High-Performance Fluorescent White Organic Light-Emitting Diodes. ACS Applied Materials & Interfaces, 2016, 8, 28780-28788.	8.0	57
71	Highly efficient inverted organic light-emitting diodes using composite organic heterojunctions as electrode-independent injectors. Journal of Materials Chemistry C, 2016, 4, 8731-8737.	5.5	12
72	Management of Singlet and Triplet Excitons: A Universal Approach to High-Efficiency All Fluorescent WOLEDs with Reduced Efficiency Roll-Off Using a Conventional Fluorescent Emitter. Advanced Optical Materials, 2016, 4, 1067-1074.	7.3	84

#	ARTICLE	IF	CITATIONS
73	High-Performance Hybrid White Organic Light-Emitting Diodes with Superior Efficiency/Color Rendering Index/Color Stability and Low Efficiency Roll-Off Based on a Blue Thermally Activated Delayed Fluorescent Emitter. <i>Advanced Functional Materials</i> , 2016, 26, 3306-3313.	14.9	154
74	Achieving Extreme Utilization of Excitons by an Efficient Sandwich-Type Emissive Layer Architecture for Reduced Efficiency Roll-Off and Improved Operational Stability in Organic Light-Emitting Diodes. <i>ACS Applied Materials & Interfaces</i> , 2016, 8, 3150-3159.	8.0	34
75	14.7% efficient mesoscopic perovskite solar cells using single walled carbon nanotubes/carbon composite counter electrodes. <i>Nanoscale</i> , 2016, 8, 6379-6385.	5.6	151
76	Revealing Underlying Processes Involved in Light Soaking Effects and Hysteresis Phenomena in Perovskite Solar Cells. <i>Advanced Energy Materials</i> , 2015, 5, 1500279.	19.5	271
77	Photovoltaic behaviour of lead methylammonium triiodide perovskite solar cells down to 80 K. <i>Journal of Materials Chemistry A</i> , 2015, 3, 11762-11767.	10.3	135
78	Effect of temperature on the efficiency of organometallic perovskite solar cells. <i>Journal of Energy Chemistry</i> , 2015, 24, 729-735.	12.9	54
79	Trap-induced photoconductivity in singlet fission pentacene diodes. <i>Applied Physics Letters</i> , 2014, 105, 033303.	3.3	4
80	Inter-triplet spin-spin interaction effects on inter-conversion between different spin states in intermediate triplet-triplet pairs towards singlet fission. <i>Organic Electronics</i> , 2014, 15, 2168-2172.	2.6	5
81	Boosting the Photocurrent Density of p-Type Solar Cells Based on Organometal Halide Perovskite-Sensitized Mesoporous NiO Photocathodes. <i>ACS Applied Materials & Interfaces</i> , 2014, 6, 12609-12617.	8.0	50
82	In-situ investigation of interfacial effects on charge accumulation and extraction in organic solar cells based on transient photocurrent studies. <i>Organic Electronics</i> , 2014, 15, 1624-1630.	2.6	7
83	Effect of the molecular weight of poly(3-hexylthiophene) on the performance of solid-state dye-sensitized solar cells. <i>RSC Advances</i> , 2013, 3, 14037.	3.6	8
84	Effects of bulk and interfacial charge accumulation on fill factor in organic solar cells. <i>Applied Physics Letters</i> , 2013, 102, .	3.3	36
85	Thermal annealing effect on internal electrical polarization in organic solar cells. <i>Organic Electronics</i> , 2013, 14, 2192-2197.	2.6	18
86	High efficiency blue phosphorescent organic light-emitting diodes with a multiple quantum well structure for reduced efficiency roll-off. <i>Optics Express</i> , 2012, 20, 24411.	3.4	21
87	Low sublimation temperature cesium pivalate complex as an efficient electron injection material for organic light-emitting diode devices. <i>Organic Electronics</i> , 2011, 12, 1957-1962.	2.6	18
88	High-Performance, Phosphorescent, Top-Emitting Organic Light-Emitting Diodes with π - π Homojunctions. <i>Advanced Functional Materials</i> , 2011, 21, 1681-1686.	14.9	35
89	Observation of hole hopping via dopant in MoOx-doped organic semiconductors: Mechanism analysis and application for high performance organic light-emitting devices. <i>Journal of Applied Physics</i> , 2010, 107, .	2.5	44
90	Trap-free space-charge-limited electron transport in amorphous tin(IV) phthalocyanine dichloride thin film. <i>Journal Physics D: Applied Physics</i> , 2010, 43, 215402.	2.8	11

#	ARTICLE	IF	CITATIONS
91	Controlling charge balance and exciton recombination by bipolar host in single-layer organic light-emitting diodes. <i>Journal of Applied Physics</i> , 2010, 108, .	2.5	69
92	Lead(IV) dioxide: an effective electron injection material to realize high-efficiency inverted top-emitting organic light-emitting diodes. <i>Semiconductor Science and Technology</i> , 2009, 24, 105027.	2.0	2
93	Tungsten oxide doped N,N'-di(naphthalen-1-yl)-N,N'-diphenyl-benzidine as hole injection layer for high performance organic light-emitting diodes. <i>Journal of Applied Physics</i> , 2009, 105, .	2.5	19
94	Origin of improvement in device performance via the modification role of cesium hydroxide doped tris(8-hydroxyquinoline) aluminum interfacial layer on ITO cathode in inverted bottom-emission organic light-emitting diodes. <i>Organic Electronics</i> , 2009, 10, 266-274.	2.6	26
95	A Dithienylbenzothiadiazole Pure Red Molecular Emitter with Electron Transport and Exciton Self-Confinement for Nondoped Organic Red Light-Emitting Diodes. <i>Advanced Materials</i> , 2008, 20, 4172-4175.	21.0	18
96	The role of molybdenum oxide as anode interfacial modification in the improvement of efficiency and stability in organic light-emitting diodes. <i>Organic Electronics</i> , 2008, 9, 985-993.	2.6	144
97	A soluble nonionic surfactant as electron injection material for high-efficiency inverted bottom-emission organic light emitting diodes. <i>Applied Physics Letters</i> , 2008, 93, 123310.	3.3	39
98	Cesium hydroxide doped tris(8-hydroxyquinoline) aluminum as an effective electron injection layer in inverted bottom-emission organic light emitting diodes. <i>Applied Physics Letters</i> , 2008, 92, .	3.3	35
99	Observation of Vibrational Phosphorescence Peaks at Room Temperature and Their Impacts on Triplet-Triplet Annihilation. <i>Advanced Optical Materials</i> , 0, , 2200074.	7.3	2