Gert-Jan A H Wetzelaer

List of Publications by Citations

37 papers	1,688 citations	18 h-index	40 g-index
40 ext. papers	1,952 ext. citations	11.5 avg, IF	5.08 L-index

#	Paper	IF	Citations
37	Fullerene Bisadducts for Enhanced Open-Circuit Voltages and Efficiencies in Polymer Solar Cells. *Advanced Materials*, **2008**, 20, 2116-2119	24	546
36	25th anniversary article: charge transport and recombination in polymer light-emitting diodes. *Advanced Materials*, **2014**, 26, 512-31	24	158
35	Universal strategy for Ohmic hole injection into organic semiconductors with high ionization energies. *Nature Materials*, **2018**, 17, 329-334	27	119
34	Identifying the Nature of Charge Recombination in Organic Solar Cells from Charge-Transfer State Electroluminescence. *Advanced Energy Materials*, **2012**, 2, 1232-1237	21.8	85
33	A window to trap-free charge transport in organic semiconducting thin films. *Nature Materials*, **2019**, 18, 1182-1186	27	82
32	Efficient and stable single-layer organic light-emitting diodes based on thermally activated delayed fluorescence. *Nature Photonics*, **2019**, 13, 765-769	33.9	80
31	Simultaneous Open-Circuit Voltage Enhancement and Short-Circuit Current Loss in Polymer: Fullerene Solar Cells Correlated by Reduced Quantum Efficiency for Photoinduced Electron Transfer. *Advanced Energy Materials*, **2013**, 3, 85-94	21.8	72
30	Space-charge-limited electron and hole currents in hybrid organic-inorganic perovskites. *Nature Communications*, **2020**, 11, 4023	17.4	60
29	Asymmetric electron and hole transport in a high-mobility n-type conjugated polymer. *Physical Review B*, **2012**, 86,	3.3	58
28	Quantifying Bimolecular Recombination in Organic Solar Cells in Steady State. *Advanced Energy Materials*, **2013**, 3, 1130-1134	21.8	56
27	Unifying Energetic Disorder from Charge Transport and Band Bending in Organic Semiconductors. *Advanced Functional Materials*, **2019**, 29, 1901109	15.6	51
26	Hole trap formation in polymer light-emitting diodes under current stress. *Nature Materials*, **2018**, 17, 557-562	27	50
25	Determination of the trap-assisted recombination strength in polymer light emitting diodes. *Applied Physics Letters*, **2011**, 98, 093301	3.4	49
24	Electron Trapping in Conjugated Polymers. *Chemistry of Materials*, **2019**, 31, 6380-6386	9.6	42
23	Influence of the isomeric composition of the acceptor on the performance of organic bulk heterojunction P3HT:bis-PCBM solar cells. *Journal of Materials Chemistry*, **2012**, 22, 15412		25
22	N-type doping of poly(p-phenylene vinylene) with air-stable dopants. *Applied Physics Letters*, **2011**, 99, 173302	3.4	23
21	Absence of ferroelectricity in methylammonium lead iodide perovskite. *AIP Advances*, **2017**, 7, 095110	1.5	22

20	Rigorous Characterization and Predictive Modeling of Hole Transport in Amorphous Organic Semiconductors. *Advanced Electronic Materials*, **2018**, 4, 1800366	6.4	20
19	Improved Hole Injection into Perovskite Light-Emitting Diodes Using A Black Phosphorus Interlayer. *Advanced Electronic Materials*, **2019**, 5, 1800687	6.4	14
18	Device Model for Methylammonium Lead Iodide Perovskite With Experimentally Validated Ion Dynamics. *Advanced Electronic Materials*, **2020**, 6, 1900935	6.4	13
17	Interlayers for Improved Hole Injection in Organic Field-Effect Transistors. *Advanced Electronic Materials*, **2020**, 6, 1901352	6.4	10
16	Origin of the Efficiency Roll-Off in Single-Layer Organic Light-Emitting Diodes Based on Thermally Activated Delayed Fluorescence. *Advanced Optical Materials*, **2021**, 9, 2100249	8.1	9
15	Molecular library of OLED host materials–Evaluating the multiscale simulation workflow. *Chemical Physics Reviews*, **2021**, 2, 031304	4.4	7
14	Effect of n-type doping on the hole transport in poly(p-phenylene vinylene). *Journal of Polymer Science, Part B: Polymer Physics*, **2011**, 49, 1745-1749	2.6	6
13	Optical Outcoupling Efficiency of Organic Light-Emitting Diodes with a Broad Recombination Profile. *Advanced Optical Materials*, **2021**, 9, 2001812	8.1	6
12	Molecular Origin of Balanced Bipolar Transport in Neat Layers of the Emitter CzDBA. *Advanced Materials Technologies*, **2021**, 6, 2000120	6.8	6
11	Efficiency of Polymer Light-Emitting Diodes: A Perspective. *Advanced Materials*, **2021**, e2108887	24	3
10	Virtual Screening of TADF Emitters for Single-Layer OLEDs.. *Frontiers in Chemistry*, **2021**, 9, 800027	5	3
9	Optical Outcoupling Efficiency in Polymer Light-Emitting Diodes. *Advanced Electronic Materials*, **2021**, 7, 2100155	6.4	2
8	Universal Electroluminescence at Voltages below the Energy Gap in Organic Light-Emitting Diodes. *Advanced Optical Materials*,2101149	8.1	2
7	De Novo Simulation of Charge Transport through Organic Single-Carrier Devices. *Journal of Chemical Theory and Computation*, **2021**, 17, 6416-6422	6.4	2
6	Hole-transport comparison between solution-processed and vacuum-deposited organic semiconductors. *APL Materials*, **2019**, 7, 011105	5.7	1
5	Polymer light-emitting diodes with doped hole-transport layers. *Physica Status Solidi (A) Applications and Materials Science*, **2011**, 208, 2482-2487	1.6	1
4	Role of Singlet and Triplet Excitons on the Electrical Stability of Polymer Light-Emitting Diodes. *Advanced Electronic Materials*, **2020**, 6, 2000367	6.4	1
3	Quantifying Exciton Annihilation Effects in Thermally Activated Delayed Fluorescence Materials. *Advanced Optical Materials*, **2022**, 10, 2101784	8.1	1

2	Numerical Device Model for Organic Light-Emitting Diodes Based on Thermally Activated Delayed Fluorescence. *Advanced Electronic Materials*,2101261	6.4	0
1	Role of Linker Functionality in Polymers Exhibiting Main-Chain Thermally Activated Delayed Fluorescence.. *Advanced Science*, **2022**, e2200056	13.6	0