Laurens D A Siebbeles

List of Publications by Year in descending order

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261 papers

14,267 citations

19636 61 h-index 25770 108 g-index

275 all docs

275 docs citations

times ranked

275

14551 citing authors

#	Article	IF	CITATIONS
1	Photoluminescence and Conductivity of Self-Assembled π–π Stacks of Perylene Bisimide Dyes. Chemistry - A European Journal, 2007, 13, 436-449.	1.7	552
2	Charge Transport Properties in Discotic Liquid Crystals:  A Quantum-Chemical Insight into Structureâ^'Property Relationships. Journal of the American Chemical Society, 2004, 126, 3271-3279.	6.6	464
3	Charge transport in columnar stacked triphenylenes: Effects of conformational fluctuations on charge transfer integrals and site energies. Journal of Chemical Physics, 2003, 119, 9809-9817.	1.2	395
4	All-printed thin-film transistors from networks of liquid-exfoliated nanosheets. Science, 2017, 356, 69-73.	6.0	391
5	Long-range orientation and atomic attachment of nanocrystals in 2D honeycomb superlattices. Science, 2014, 344, 1377-1380.	6.0	343
6	Absolute Rates of Hole Transfer in DNA. Journal of the American Chemical Society, 2005, 127, 14894-14903.	6.6	325
7	Photogeneration and Ultrafast Dynamics of Excitons and Charges in P3HT/PCBM Blends. Journal of Physical Chemistry C, 2009, 113, 14500-14506.	1.5	304
8	High Electron Mobility in Room-Temperature Discotic Liquid-Crystalline Perylene Diimides. Advanced Materials, 2005, 17, 2580-2583.	11.1	300
9	Highly mobile electrons and holes on isolated chains of the semiconducting polymer poly(phenylene) Tj ETQq1 I	1 0.78431· 	4 rgBT/Overlo
10	In Spite of Recent Doubts Carrier Multiplication Does Occur in PbSe Nanocrystals. Nano Letters, 2008, 8, 1713-1718.	4.5	291
11	Mechanism of Charge Migration through DNA:Â Molecular Wire Behavior, Single-Step Tunneling or Hopping?. Journal of the American Chemical Society, 2000, 122, 10903-10909.	6.6	211
12	In situ study of the formation mechanism ofÂtwo-dimensional superlattices from PbSeÂnanocrystals.		
	Nature Materials, 2016, 15, 1248-1254.	13.3	199
13		0.9	199
13	Nature Materials, 2016, 15, 1248-1254. Mechanism of charge transport in self-organizing organic materials. International Reviews in		
	Nature Materials, 2016, 15, 1248-1254. Mechanism of charge transport in self-organizing organic materials. International Reviews in Physical Chemistry, 2008, 27, 87-138. Intramolecular Charge Transport along Isolated Chains of Conjugated Polymers:  Effect of Torsional	0.9	194
14	Nature Materials, 2016, 15, 1248-1254. Mechanism of charge transport in self-organizing organic materials. International Reviews in Physical Chemistry, 2008, 27, 87-138. Intramolecular Charge Transport along Isolated Chains of Conjugated Polymers:  Effect of Torsional Disorder and Polymerization Defects. Journal of Physical Chemistry B, 2002, 106, 7791-7795. Efficiency of Exciton and Charge Carrier Photogeneration in a Semiconducting Polymer. Physical	0.9	194
14 15	Nature Materials, 2016, 15, 1248-1254. Mechanism of charge transport in self-organizing organic materials. International Reviews in Physical Chemistry, 2008, 27, 87-138. Intramolecular Charge Transport along Isolated Chains of Conjugated Polymers:  Effect of Torsional Disorder and Polymerization Defects. Journal of Physical Chemistry B, 2002, 106, 7791-7795. Efficiency of Exciton and Charge Carrier Photogeneration in a Semiconducting Polymer. Physical Review Letters, 2004, 92, 196601. High Intrachain Hole Mobility on Molecular Wires of Ladder-Type Poly(p-Phenylenes). Physical Review	0.9 1.2 2.9	194 186 183

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19	Hole Conduction along Molecular Wires: σ-Bonded Silicon Versus π-Bond-Conjugated Carbon. Advanced Materials, 2002, 14, 228-231.	11.1	167
20	Unity quantum yield of photogenerated charges and band-like transport in quantum-dot solids. Nature Nanotechnology, 2011, 6, 733-739.	15.6	164
21	Functional organogels from highly efficient organogelator based on perylene bisimide semiconductor. Chemical Communications, 2006, , 3871-3873.	2.2	154
22	Effect of Structural Dynamics on Charge Transfer in DNA Hairpins. Journal of the American Chemical Society, 2008, 130, 5157-5166.	6.6	148
23	Electrodeless time-resolved microwave conductivity study of charge-carrier photogeneration in regioregular poly(3-hexylthiophene) thin films. Physical Review B, 2004, 70, .	1.1	147
24	Bimolecular Auger Recombination of Electron–Hole Pairs in Two-Dimensional CdSe and CdSe/CdZnS Core/Shell Nanoplatelets. Journal of Physical Chemistry Letters, 2013, 4, 3574-3578.	2.1	146
25	Helical Growth of Semiconducting Columnar Dye Assemblies Based on Chiral Perylene Bisimides. Organic Letters, 2007, 9, 1085-1088.	2.4	145
26	H-Bond-Stabilized Triphenylene-Based Columnar Discotic Liquid Crystals. Chemistry of Materials, 2006, 18, 968-974.	3.2	141
27	Temperatureâ€Resolved Local and Macroscopic Charge Carrier Transport in Thin P3HT Layers. Advanced Functional Materials, 2010, 20, 2286-2295.	7.8	131
28	High charge mobility in two-dimensional percolative networks of PbSe quantum dots connected by atomic bonds. Nature Communications, 2015, 6, 8195.	5.8	125
29	Nature and Decay Pathways of Photoexcited States in CdSe and CdSe/CdS Nanoplatelets. Nano Letters, 2014, 14, 7039-7045.	4.5	122
30	Radiative and Nonradiative Recombination in CulnS ₂ Nanocrystals and CulnS ₂ -Based Core/Shell Nanocrystals. Journal of Physical Chemistry Letters, 2016, 7, 3503-3509.	2.1	119
31	Charge Transfer in Donor-Bridge-Acceptor Systems: Static Disorder, Dynamic Fluctuations, and Complex Kinetics. Journal of Physical Chemistry C, 2008, 112, 10988-11000.	1.5	114
32	Epitaxially Connected PbSe Quantum-Dot Films: Controlled Neck Formation and Optoelectronic Properties. ACS Nano, 2014, 8, 11499-11511.	7.3	114
33	Photoconductivity of PbSe Quantum-Dot Solids: Dependence on Ligand Anchor Group and Length. ACS Nano, 2012, 6, 9606-9614.	7.3	113
34	Hole Mobility in DNA: Effects of Static and Dynamic Structural Fluctuations. ChemPhysChem, 2002, 3, 536.	1.0	112
35	Highly efficient carrier multiplication in PbS nanosheets. Nature Communications, 2014, 5, 3789.	5.8	109
36	Temperature-Independent Charge Carrier Photogeneration in P3HTâ^'PCBM Blends with Different Morphology. Journal of Physical Chemistry C, 2010, 114, 5182-5186.	1.5	105

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37	Efficient carrier multiplication in CsPbI3 perovskite nanocrystals. Nature Communications, 2018, 9, 4199.	5.8	101
38	Unraveling the Optoelectronic and Photochemical Behavior of Zn ₄ O-Based Metal Organic Frameworks. Journal of Physical Chemistry C, 2011, 115, 12487-12493.	1.5	98
39	Mapping the Sites for Selective Oxidation of Guanines in DNA. Journal of the American Chemical Society, 2003, 125, 13658-13659.	6.6	97
40	Excited state polarizabilities of conjugated molecules calculated using time dependent density functional theory. Journal of Chemical Physics, 2001, 115, 10014-10021.	1.2	94
41	Supramolecular Control of Charge Transport in Molecular Wires. Journal of the American Chemical Society, 2007, 129, 13370-13371.	6.6	94
42	Charge Transport in Self-Organized π-Stacks ofp-Phenylene Vinylene Oligomers. Journal of Physical Chemistry B, 2005, 109, 18267-18274.	1.2	90
43	Biosupramolecular Nanowires from Chlorophyll Dyes with Exceptional Charge†Transport Properties. Angewandte Chemie - International Edition, 2012, 51, 6378-6382.	7.2	88
44	Effect of the Particle Size on the Electron Injection Efficiency in Dye-Sensitized Nanocrystalline TiO2Films Studied by Time-Resolved Microwave Conductivity (TRMC) Measurements. Journal of Physical Chemistry C, 2007, 111, 10741-10746.	1.5	87
45	Density of Trap States and Auger-mediated Electron Trapping in CdTe Quantum-Dot Solids. Nano Letters, 2015, 15, 3056-3066.	4.5	84
46	Organic Linker Defines the Excitedâ€State Decay of Photocatalytic MILâ€125(Ti)â€Type Materials. ChemSusChem, 2016, 9, 388-395.	3.6	84
47	Mechanism of Charge Transport along Columnar Stacks of a Triphenylene Dimer. Journal of Physical Chemistry B, 1998, 102, 9625-9634.	1.2	77
48	Mechanism of Mobile Charge Carrier Generation in Blends of Conjugated Polymers and Fullerenes: Significance of Charge Delocalization and Excess Free Energy. Journal of Physical Chemistry C, 2012, 116, 9214-9220.	1.5	77
49	Origin of Reduced Bimolecular Recombination in Blends of Conjugated Polymers and Fullerenes. Advanced Functional Materials, 2013, 23, 4262-4268.	7.8	76
50	Delocalization and Mobility of Charge Carriers in Covalent Organic Frameworks. Journal of Physical Chemistry C, 2011, 115, 11768-11772.	1.5	73
51	High charge-carrier mobility enables exploitation of carrier multiplication in quantum-dot films. Nature Communications, 2013, 4, 2360.	5.8	73
52	Quasi Temperature Independent Electron Mobility in Hexagonal Columnar Mesophases of an H-Bonded Benzotristhiophene Derivative. Chemistry of Materials, 2010, 22, 1420-1428.	3.2	72
53	Spectroscopic Evidence for the Contribution of Holes to the Bleach of Cd-Chalcogenide Quantum Dots. Nano Letters, 2019, 19, 3002-3010.	4.5	72
54	Efficient Exciton Transport in Layers of Self-Assembled Porphyrin Derivatives. Journal of the American Chemical Society, 2008, 130, 2485-2492.	6.6	71

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55	Enhanced Hot-Carrier Cooling and Ultrafast Spectral Diffusion in Strongly Coupled PbSe Quantum-Dot Solids. Nano Letters, 2011, 11, 5471-5476.	4.5	71
56	Conformationally Gated Rate Processes in Biological Macromolecules. Journal of Physical Chemistry A, 2001, 105, 5666-5678.	1.1	69
57	Charge Mobilities in Conjugated Polymers Measured by Pulse Radiolysis Time-Resolved Microwave Conductivity: From Single Chains to Solids. Journal of Physical Chemistry Letters, 2011, 2, 2951-2958.	2.1	69
58	Dynamics of a Triphenylene Discotic Molecule, HAT6, in the Columnar and Isotropic Liquid Phases. Journal of the American Chemical Society, 2003, 125, 3860-3866.	6.6	67
59	The Disperse Charge-Carrier Kinetics in Regioregular Poly(3-hexylthiophene). Journal of Physical Chemistry B, 2004, 108, 17818-17824.	1.2	66
60	Theoretical and experimental studies of the opto-electronic properties of positively charged oligo(phenylene vinylene)s: Effects of chain length and alkoxy substitution. Journal of Chemical Physics, 2002, 117, 11366-11378.	1.2	65
61	Hydrogen-bond stabilized columnar discotic benzenetrisamides with pendant triphenylene groups. Journal of Materials Chemistry, 2008, 18, 5475.	6.7	64
62	Carrier multiplication in germanium nanocrystals. Light: Science and Applications, 2015, 4, e251-e251.	7.7	63
63	QM/MM Study of the Role of the Solvent in the Formation of the Charge Separated Excited State in 9,9â€~Bianthryl. Journal of the American Chemical Society, 2005, 127, 11019-11028.	6.6	62
64	Supercrystals of CdSe Quantum Dots with High Charge Mobility and Efficient Electron Transfer to TiO ₂ . ACS Nano, 2010, 4, 1723-1731.	7. 3	62
65	The Formation and Recombination Kinetics of Positively Charged Poly(phenylene vinylene) Chains in Pulse-Irradiated Dilute Solutions. Journal of Physical Chemistry A, 2003, 107, 5976-5986.	1.1	61
66	Anomalous Independence of Multiple Exciton Generation on Different Group IVâ^'VI Quantum Dot Architectures. Nano Letters, 2011, 11, 1623-1629.	4.5	61
67	Time-Resolved Stark Spectroscopy in CdSe Nanoplatelets: Exciton Binding Energy, Polarizability, and Field-Dependent Radiative Rates. Nano Letters, 2016, 16, 6576-6583.	4.5	60
68	Nature of the Second Optical Transition in PbSe Nanocrystals. Nano Letters, 2008, 8, 2112-2117.	4.5	59
69	Mechanism of Charge Transport along Zinc Porphyrin-Based Molecular Wires. Journal of the American Chemical Society, 2009, 131, 5522-5529.	6.6	59
70	Electrochemical Charging of CdSe Quantum Dot Films: Dependence on Void Size and Counterion Proximity. ACS Nano, 2013, 7, 2500-2508.	7. 3	59
71	Guanine Modifications Following Ionization of DNA Occurs Predominantly via Intra- and Not Interstrand Charge Migration:Â An Experimental and Theoretical Study. Journal of Physical Chemistry B, 2001, 105, 5283-5290.	1.2	57
72	Efficient Charge Transport along Phenyleneâ^'Vinylene Molecular Wires. Journal of Physical Chemistry B, 2006, 110, 14659-14666.	1.2	57

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73	Photosensitization of TiO ₂ and SnO ₂ by Artificial Self-Assembling Mimics of the Natural Chlorosomal Bacteriochlorophylls. Journal of Physical Chemistry C, 2007, 111, 11726-11733.	1.5	57
74	Exciton Diffusion and Interfacial Charge Separation inmeso-Tetraphenylporphyrin/TiO2Bilayers:Â Effect of Ethyl Substituents. Journal of Physical Chemistry B, 2005, 109, 20166-20173.	1.2	56
75	Photogeneration and Decay of Charge Carriers in Hybrid Bulk Heterojunctions of ZnO Nanoparticles and Conjugated Polymersâ€. Journal of Physical Chemistry B, 2006, 110, 10315-10321.	1.2	56
76	Highly Photoconductive CdSe Quantum-Dot Films: Influence of Capping Molecules and Film Preparation Procedure. Journal of Physical Chemistry C, 2010, 114, 3441-3447.	1.5	56
77	Generating Free Charges by Carrier Multiplication in Quantum Dots for Highly Efficient Photovoltaics. Accounts of Chemical Research, 2015, 48, 174-181.	7.6	56
78	Sequence-dependent charge transfer in donor-DNA-acceptor systems: A theoretical study. International Journal of Quantum Chemistry, 1999, 75, 1009-1016.	1.0	55
79	Enhanced charge-carrier mobility inβ-phase polyfluorene. Physical Review B, 2006, 74, .	1.1	55
80	Size-Dependent Electron Transfer from PbSe Quantum Dots to SnO2Monitored by Picosecond Terahertz Spectroscopy. Nano Letters, 2011, 11, 5234-5239.	4.5	53
81	Fast and Efficient Photodetection in Nanoscale Quantum-Dot Junctions. Nano Letters, 2012, 12, 5740-5743.	4.5	51
82	Disorder strongly enhances Auger recombination in conductive quantum-dot solids. Nature Communications, 2013, 4, 2329.	5.8	51
83	Columnar Mesophases with 3D Order from New Functional Nonconventional Starâ€Shaped Mesogens. Advanced Materials, 2008, 20, 4414-4418.	11.1	49
84	Activating Carrier Multiplication in PbSe Quantum Dot Solids by Infilling with Atomic Layer Deposition. Journal of Physical Chemistry Letters, 2013, 4, 1766-1770.	2.1	49
85	Hole Cooling Is Much Faster than Electron Cooling in PbSe Quantum Dots. ACS Nano, 2016, 10, 695-703.	7.3	49
86	Hot-electron transfer in quantum-dot heterojunction films. Nature Communications, 2018, 9, 2310.	5.8	48
87	Effects of molecular organization on exciton diffusion in thin films of bioinspired light-harvesting molecules. Journal of Materials Chemistry, 2009, 19, 6067.	6.7	47
88	Efficient Charge Transport in Semisynthetic Zinc Chlorin Dye Assemblies. Journal of the American Chemical Society, 2012, 134, 16147-16150.	6.6	47
89	Frequency dependent mobility of charge carriers along polymer chains with finite length. Physica Status Solidi (B): Basic Research, 2006, 243, 382-386.	0.7	45
90	Efficient Light-Harvesting Layers of Homeotropically Aligned Porphyrin Derivatives. Advanced Materials, 2006, 18, 2234-2239.	11.1	45

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91	Signature of exciton annihilation in the photoconductance of regioregular poly(3-hexylthiophene). Physical Review B, 2005, 71, .	1.1	44
92	Free carrier photogeneration in polythiophene versus poly(phenylene vinylene) studied with THz spectroscopy. Chemical Physics Letters, 2006, 432, 441-445.	1.2	44
93	What Limits Photoconductance in Anatase TiO ₂ Nanostructures? A Real and Imaginary Microwave Conductance Study. Journal of Physical Chemistry C, 2013, 117, 8032-8040.	1.5	43
94	Anisotropy of the charge-carrier mobility in polydiacetylene crystals. Journal of Chemical Physics, 1998, 109, 1885-1893.	1.2	42
95	Electrochemical Control over Photoinduced Electron Transfer and Trapping in CdSe-CdTe Quantum-Dot Solids. ACS Nano, 2014, 8, 7067-7077.	7.3	42
96	Free Charges Produced by Carrier Multiplication in Strongly Coupled PbSe Quantum Dot Films. Nano Letters, 2011, 11, 4485-4489.	4.5	41
97	Conjugated poly(azomethine)s via simple one-step polycondensation chemistry: synthesis, thermal and optoelectronic properties. Polymer Chemistry, 2013, 4, 4182.	1.9	41
98	Electronic Structure and Optical Properties of Charged Oligofluorenes Studied by VIS/NIR Spectroscopy and Time-Dependent Density Functional Theory. Journal of Physical Chemistry B, 2006, 110, 5984-5993.	1.2	40
99	Self-assembly and semiconductivity of an oligothiophene supergelator. Beilstein Journal of Organic Chemistry, 2010, 6, 1070-1078.	1.3	40
100	Mobility and Spatial Distribution of Photoexcited Electrons in CdSe/CdS Nanorods. Journal of Physical Chemistry C, 2013, 117, 3146-3151.	1.5	40
101	Transport Properties of a Two-Dimensional PbSe Square Superstructure in an Electrolyte-Gated Transistor. Nano Letters, 2017, 17, 5238-5243.	4.5	40
102	Highly Photoconductive InP Quantum Dots Films and Solar Cells. ACS Applied Energy Materials, 2018, 1, 6569-6576.	2.5	40
103	Predicting Solar Cell Performance from Terahertz and Microwave Spectroscopy. Advanced Energy Materials, 2022, 12, .	10.2	40
104	Charge Transport along Coiled Conjugated Polymer Chains. Journal of Physical Chemistry C, 2007, 111, 11104-11112.	1.5	39
105	Charge Carrier Cooling Bottleneck Opens Up Nonexcitonic Gain Mechanisms in Colloidal CdSe Quantum Wells. Journal of Physical Chemistry C, 2019, 123, 9640-9650.	1.5	39
106	Electronic Structure of Thienylene Vinylene Oligomers: Â Singlet Excited States, Triplet Excited States, Cations, and Dications. Journal of Physical Chemistry B, 2004, 108, 16139-16146.	1.2	38
107	Charge transfer versus molecular conductance: molecular orbital symmetry turns quantum interference rules upside down. Chemical Science, 2015, 6, 4196-4206.	3.7	38
108	A subpicosecond pump-probe laser study of ionization and geminate charge recombination kinetics in alkane liquids. Journal of Chemical Physics, 1997, 107, 9339-9347.	1.2	37

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109	The Mechanism of Long-Range Exciton Diffusion in a Nematically Organized Porphyrin Layer. Journal of the American Chemical Society, 2008, 130, 12496-12500.	6.6	37
110	Photoinduced Charge Carrier Generation in Blends of Poly(Thienothiophene) Derivatives and [6,6]-Phenyl-C61-butyric Acid Methyl Ester: Phase Segregation versus Intercalation. Journal of Physical Chemistry C, 2010, 114, 15116-15120.	1.5	37
111	Positive Charge Carriers on Isolated Chains of MEHâ^'PPV with Broken Conjugation:  Optical Absorption and Mobility. Journal of Physical Chemistry B, 2003, 107, 1554-1558.	1.2	36
112	A Fluorine-Substituted Hexakisdecyloxy- hexa-peri-hexabenzocoronene. Organic Letters, 2005, 7, 5019-5022.	2.4	36
113	Effect of GC Base Pairs on Charge Transfer through DNA Hairpins: The Importance of Electrostatic Interactions. Journal of the American Chemical Society, 2009, 131, 14204-14205.	6.6	36
114	Electrodeless Measurement of the In-Plane Anisotropy in the Photoconductivity of an Aligned Polyfluorene Film. Advanced Materials, 2001, 13, 1627-1630.	11.1	35
115	Energy loss by non-relativistic electrons and positrons in liquid water. Nuclear Instruments & Methods in Physics Research B, 2002, 194, 237-250.	0.6	35
116	Chemically Gated Quantum-Interference-Based Molecular Transistor. Journal of Physical Chemistry Letters, 2011, 2, 1753-1756.	2.1	35
117	Photoconductivity Enhancement in Multilayers of CdSe and CdTe Quantum Dots. ACS Nano, 2011, 5, 3552-3558.	7.3	35
118	Determination of Singlet Exciton Diffusion Length in Thin Evaporated C ₆₀ Films for Photovoltaics. Journal of Physical Chemistry Letters, 2012, 3, 2367-2373.	2.1	35
119	The Effect of Annealing on the Charge-Carrier Dynamics in a Polymer/Polymer Bulk Heterojunction for Photovoltaic Applications. Advanced Functional Materials, 2005, 15, 469-474.	7.8	34
120	Impact of the Computational Method on the Geometric and Electronic Properties of Oligo(phenylene) Tj ETQq0 (O 0 rgBT /0	Ovgrjock 10 T
121	Broadband Cooling Spectra of Hot Electrons and Holes in PbSe Quantum Dots. ACS Nano, 2017, 11, 6286-6294.	7.3	34
122	Simple and accurate wavefunctions for two-electron atoms in S, P and D states. Journal of Physics B: Atomic, Molecular and Optical Physics, 1993, 26, L321-L325.	0.6	33
123	Photogeneration and Mobility of Charge Carriers in Atomically Thin Colloidal InSe Nanosheets Probed by Ultrafast Terahertz Spectroscopy. Journal of Physical Chemistry Letters, 2016, 7, 4191-4196.	2.1	33
124	Electron and Hole Dynamics on Isolated Chains of a Solution-ProcessableÂPoly(thienylenevinylene) Derivative in Dilute Solution. Advanced Materials, 2005, 17, 718-723.	11.1	31
125	Broadband and Picosecond Intraband Absorption in Lead-Based Colloidal Quantum Dots. ACS Nano, 2012, 6, 6067-6074.	7.3	31
126	Branching ratios for the dissociative decay of tripletH2. Physical Review A, 1991, 44, 4171-4179.	1.0	30

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127	Organic Field-Effect Transistors Utilizing Solution-Deposited Oligothiophene-Based Swivel Cruciforms. Chemistry of Materials, 2007, 19, 1267-1276.	3.2	30
128	Absence of Postnanosecond Charge Carrier Relaxation in Poly(3-hexylthiophene)/Fullerene Blends. Journal of Physical Chemistry Letters, 2011, 2, 1368-1371.	2.1	30
129	In Situ Spectroelectrochemical Determination of Energy Levels and Energy Level Offsets in Quantum-Dot Heterojunctions. Journal of Physical Chemistry C, 2016, 120, 5164-5173.	1.5	30
130	High Electronic Conductance through Double-Helix DNA Molecules with Fullerene Anchoring Groups. Journal of Physical Chemistry A, 2017, 121, 1182-1188.	1.1	30
131	Energy landscape of self-assembled superlattices of PbSe nanocrystals. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 9054-9057.	3.3	29
132	A Phonon Scattering Bottleneck for Carrier Cooling in Lead Chalcogenide Nanocrystals. ACS Nano, 2015, 9, 778-788.	7.3	29
133	Deposition Mechanism of Aluminum Oxide on Quantum Dot Films at Atmospheric Pressure and Room Temperature. Journal of Physical Chemistry C, 2016, 120, 4266-4275.	1.5	29
134	Molecular hydrogenn=3 triplet gerade complex disentangled. Physical Review A, 1991, 44, 4162-4170.	1.0	28
135	Predicting polarizabilities and lifetimes of excitons on conjugated polymer chains. Chemical Physics Letters, 2001, 334, 303-308.	1.2	28
136	An experimental study on the molecular organization and exciton diffusion in a bilayer of a porphyrin and poly(3-hexylthiophene). Journal of Applied Physics, 2008, 104, 034505.	1.1	28
137	Computer Simulation of the Ion Escape from High-Energy Electron Tracks in Nonpolar Liquids. Journal of Physical Chemistry A, 1997, 101, 1619-1627.	1.1	27
138	Time and frequency dependent charge carrier mobility of one-dimensional chains with energetic disorder. Chemical Physics Letters, 1997, 269, 257-262.	1.2	27
139	Cooling and Auger Recombination of Charges in PbSe Nanorods: Crossover from Cubic to Bimolecular Decay. Nano Letters, 2013, 13, 4380-4386.	4.5	26
140	Triplet exciton diffusion and delayed interfacial charge separation in a Tio2/PdTPPC bilayer: Monte Carlo simulations. Solar Energy Materials and Solar Cells, 2005, 85, 189-203.	3.0	25
141	Charge Transfer Through Molecules with Multiple Pathways: Quantum Interference and Dephasing. Journal of Physical Chemistry C, 2010, 114, 7973-7979.	1.5	25
142	Origin of Low Sensitizing Efficiency of Quantum Dots in Organic Solar Cells. ACS Nano, 2012, 6, 8983-8988.	7.3	25
143	Polydiacetylenes., 2001,, 339-437.		24
144	Theoretical Study of the Optical Properties of Artificial Self-Assembled Zinc Chlorins. Journal of Physical Chemistry C, 2010, 114, 20834-20842.	1.5	24

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145	A simple method to calculate potential curves of two-electron molecules at intermediate nuclear distances. Journal of Physics B: Atomic, Molecular and Optical Physics, 1994, 27, 4443-4452.	0.6	23
146	Two-Dimensional Charge Delocalization in X-Shaped Phenylenevinylene Oligomers. Chemistry of Materials, 2006, 18, 2118-2129.	3.2	23
147	Opto-Electronic Properties of Fluorene-Based Derivatives as Precursors for Light-Emitting Diodes. Journal of Physical Chemistry C, 2007, 111, 5812-5820.	1.5	23
148	Atomic Layer Deposition of ZnO on InP Quantum Dot Films for Charge Separation, Stabilization, and Solar Cell Formation. Advanced Materials Interfaces, 2020, 7, 1901600.	1.9	23
149	Influence of Backbone Conformation on the Photoconductivity of Polydiacetylene Chains. Macromolecules, 2000, 33, 9289-9297.	2.2	22
150	Formation and Decay of Charge Carriers in Bulk Heterojunctions of MDMO-PPV or P3HT with New n-Type Conjugated Polymers. Journal of Physical Chemistry C, 2007, 111, 4452-4457.	1.5	22
151	Effect of Electrostatic Interactions and Dynamic Disorder on the Distance Dependence of Charge Transfer in Donorâ^'Bridgeâ^'Acceptor Systems. Journal of Physical Chemistry B, 2010, 114, 14564-14571.	1.2	22
152	Effect of Structural Dynamics and Base Pair Sequence on the Nature of Excited States in DNA Hairpins. Journal of Physical Chemistry B, 2012, 116, 11447-11458.	1.2	22
153	Optical Properties and Delocalization of Excess Negative Charges on Oligo(Phenylenevinylene)s:Â A Quantum Chemical Study. Journal of Physical Chemistry B, 2005, 109, 5644-5652.	1.2	21
154	Single molecule charge transport: from a quantum mechanical to a classical description. Physical Chemistry Chemical Physics, 2011, 13, 2096-2110.	1.3	21
155	Diffusion in one-dimensional disordered systems: analytical study verified by Monte Carlo simulations. Chemical Physics Letters, 1997, 265, 460-466.	1.2	20
156	Localized Surface Plasmon Resonances of Various Nickel Sulfide Nanostructures and Au–Ni3S2 Core–Shell Nanoparticles. Chemistry of Materials, 2017, 29, 7371-7377.	3.2	20
157	Charge Photogeneration and Transport in AgBiS ₂ Nanocrystal Films for Photovoltaics. Solar Rrl, 2019, 3, 1900075.	3.1	20
158	Probing Excitons in Ultrathin PbS Nanoplatelets with Enhanced Near-Infrared Emission. Journal of Physical Chemistry Letters, 2021, 12, 680-685.	2.1	20
159	Angular distribution of photofragments along a Fano profile. Physical Review A, 1991, 44, 1577-1583.	1.0	19
160	Resonances of the j3î "gstate in the differential photodissociation cross section of H2. Physical Review A, 1991, 44, 1584-1596.	1.0	19
161	Faraday research article. Interferences in molecular photofragmentation and their effect on vector properties. Journal of the Chemical Society, Faraday Transactions, 1992, 88, 2565.	1.7	19
162	Time and frequency dependent charge carrier mobility on one-dimensional chains with energetic disorder for polaron and Miller–Abrahams type hopping. Chemical Physics, 1998, 229, 257-263.	0.9	19

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