Xiaoyang Zhu

List of Publications by Year
in descending order

201	24,320	8181 76	7160 153
papers	citations	h-index	g-index

209	209	209	22993
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Lead halide perovskite nanowire lasers with low lasing thresholds and high quality factors. Nature Materials, 2015, 14, 636-642.	27.5	2,392
2	Two-dimensional itinerant ferromagnetism in atomically thin Fe3GeTe2. Nature Materials, 2018, 17, 778-782.	27.5	995
3	Trap States in Lead Iodide Perovskites. Journal of the American Chemical Society, 2015, 137, 2089-2096.	13.7	813
4	Hot-Electron Transfer from Semiconductor Nanocrystals. Science, 2010, 328, 1543-1547.	12.6	775
5	Screening in crystalline liquids protects energetic carriers in hybrid perovskites. Science, 2016, 353, 1409-1413.	12.6	655
6	Metal halide perovskite nanostructures for optoelectronic applications and the study of physical properties. Nature Reviews Materials, 2019, 4, 169-188.	48.7	598
7	Hot charge-transfer excitons set the time limit for charge separation at donor/acceptor interfaces in organic photovoltaics. Nature Materials, 2013, 12, 66-73.	27.5	590
8	Correlated electronic phases in twisted bilayer transition metal dichalcogenides. Nature Materials, 2020, 19, 861-866.	27.5	544
9	Molecular helices as electron acceptors in high-performance bulk heterojunction solar cells. Nature Communications, 2015, 6, 8242.	12.8	525
10	Large polarons in lead halide perovskites. Science Advances, 2017, 3, e1701217.	10.3	515
11	Broad Wavelength Tunable Robust Lasing from Single-Crystal Nanowires of Cesium Lead Halide Perovskites (CsPbX₃, X = Cl, Br, I). ACS Nano, 2016, 10, 7963-7972.	14.6	507
12	Using coherence to enhance function in chemical and biophysical systems. Nature, 2017, 543, 647-656.	27.8	477
13	Observing the Multiexciton State in Singlet Fission and Ensuing Ultrafast Multielectron Transfer. Science, 2011, 334, 1541-1545.	12.6	468
14	Charge Carriers in Hybrid Organicâ€“Inorganic Lead Halide Perovskites Might Be Protected as Large Polarons. Journal of Physical Chemistry Letters, 2015, 6, 4758-4761.	4.6	456
15	Mechanism for Broadband White-Light Emission from Two-Dimensional (110) Hybrid Perovskites. Journal of Physical Chemistry Letters, 2016, 7, 2258-2263.	4.6	428
16	Efficient Organic Solar Cells with Helical Perylene Diimide Electron Acceptors. Journal of the American Chemical Society, 2014, 136, 15215-15221.	13.7	414
17	Nanowire Lasers of Formamidinium Lead Halide Perovskites and Their Stabilized Alloys with Improved Stability. Nano Letters, 2016, 16, 1000-1008.	9.1	391
18	Extended carrier lifetimes and diffusion in hybrid perovskites revealed by Hall effect and photoconductivity measurements. Nature Communications, 2016, 7, 12253.	12.8	363

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19	Charge-Transfer Excitons at Organic Semiconductor Surfaces and Interfaces. Accounts of Chemical Research, 2009, 42, 1779-1787.	15.6	351
20	Quantitative Intramolecular Singlet Fission in Bipentacenes. Journal of the American Chemical Society, 2015, 137, 8965-8972.	13.7	324
21	Lead halide perovskites: Crystal-liquid duality, phonon glass electron crystals, and large polaron formation. Science Advances, 2017, 3, e1701469.	10.3	323
22	A design strategy for intramolecular singlet fission mediated by charge-transfer states inÂdonorâ€“acceptor organic materials. Nature Materials, 2015, 14, 426-433.	27.5	298
23	The energy barrier in singlet fission can be overcome through coherent coupling and entropic gain. Nature Chemistry, 2012, 4, 840-845.	13.6	294
24	Triplet Pair States in Singlet Fission. Chemical Reviews, 2019, 119, 4261-4292.	47.7	282
25	The Quantum Coherent Mechanism for Singlet Fission: Experiment and Theory. Accounts of Chemical Research, 2013, 46, 1321-1329.	15.6	262
26	Disassembling 2D van der Waals crystals into macroscopic monolayers and reassembling into artificial lattices. Science, 2020, 367, 903-906.	12.6	262
27	Charge Transfer Excitons at van der Waals Interfaces. Journal of the American Chemical Society, 2015, 137, 8313-8320.	13.7	252
28	Helical Ribbons for Molecular Electronics. Journal of the American Chemical Society, 2014, 136, 8122-8130.	13.7	243
29	Approaching the intrinsic photoluminescence linewidth in transition metal dichalcogenide monolayers. 2D Materials, 2017, 4, 031011.	4.4	242
30	Charge Transferâ€“Mediated Singlet Fission. Annual Review of Physical Chemistry, 2015, 66, 601-618.	10.8	241
31	Electronâ€“Phonon Scattering in Atomically Thin 2D Perovskites. ACS Nano, 2016, 10, 9992-9998.	14.6	215
32	Stabilization of the Metastable Lead Iodide Perovskite Phase via Surface Functionalization. Nano Letters, 2017, 17, 4405-4414.	9.1	204
33	Intrinsic Charge Trapping in Organic and Polymeric Semiconductors: A Physical Chemistry Perspective. Journal of Physical Chemistry Letters, 2010, 1, 628-635.	4.6	198
34	Excitonic Many-Body Interactions in Two-Dimensional Lead Iodide Perovskite Quantum Wells. Journal of Physical Chemistry C, 2015, 119, 14714-14721.	3.1	198
35	Visualization of moirÃ© superlattices. Nature Nanotechnology, 2020, 15, 580-584.	31.5	187
36	A Direct Mechanism of Ultrafast Intramolecular Singlet Fission in Pentacene Dimers. ACS Central Science, 2016, 2, 316-324.	11.3	176

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37	Interfacial Charge Transfer Circumventing Momentum Mismatch at Two-Dimensional van der Waals Heterojunctions. Nano Letters, 2017, 17, 3591-3598.	9.1	172
38	Excitons in strain-induced one-dimensional moirÃ© potentials at transition metal dichalcogenide heterojunctions. Nature Materials, 2020, 19, 1068-1073.	27.5	169
39	How lasing happens in CsPbBr3 perovskite nanowires. Nature Communications, 2019, 10, 265.	12.8	168
40	Organic Cations Might Not Be Essential to the Remarkable Properties of Band Edge Carriers in Lead Halide Perovskites. Advanced Materials, 2017, 29, 1603072.	21.0	166
41	Continuousâ€Wave Lasing in Cesium Lead Bromide Perovskite Nanowires. Advanced Optical Materials, 2018, 6, 1700982.	7.3	161
42	Approaching the Intrinsic Limit in Transition Metal Diselenides via Point Defect Control. Nano Letters, 2019, 19, 4371-4379.	9.1	161
43	Dynamics of the triplet-pair state reveals the likely coexistence of coherent and incoherent singlet fission in crystalline hexacene. Nature Chemistry, 2017, 9, 341-346.	13.6	155
44	Polariton panorama. Nanophotonics, 2020, 10, 549-577.	6.0	155
45	Coulomb Barrier for Charge Separation at an Organic Semiconductor Interface. Physical Review Letters, 2008, 101, 196403.	7.8	153
46	Long, Atomically Precise Donorâ€"Acceptor Cove-Edge Nanoribbons as Electron Acceptors. Journal of the American Chemical Society, 2017, 139, 5648-5651.	13.7	150
47	Light-induced picosecond rotational disordering of the inorganic sublattice in hybrid perovskites. Science Advances, 2017, 3, e1602388.	10.3	149
48	Many-body interactions in photo-excited lead iodide perovskite. Journal of Materials Chemistry A, 2015, 3, 9285-9290.	10.3	144
49	Incorporating Large A Cations into Lead Iodide Perovskite Cages: Relaxed Goldschmidt Tolerance Factor and Impact on Excitonâ€"Phonon Interaction. ACS Central Science, 2019, 5, 1377-1386.	11.3	142
50	Magnetic Order and Symmetry in the 2D Semiconductor CrSBr. Nano Letters, 2021, 21, 3511-3517.	9.1	141
51	Charge Transport at Metalâˆ'Molecule Interfaces:Â A Spectroscopic View. Journal of Physical Chemistry B, 2004, 108, 8778-8793.	2.6	126
52	Quantifying Polaron Formation and Charge Carrier Cooling in Leadâ€Iodide Perovskites. Advanced Materials, 2018, 30, e1707312.	21.0	124
53	Deep moirÃ© potentials in twisted transition metal dichalcogenide bilayers. Nature Physics, 2021, 17, 720-725.	16.7	124
54	Pi-stacked pentacene thin films grown on Au(111). Applied Physics Letters, 2003, 82, 3248-3250.	3.3	118

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55	Layered Antiferromagnetism Induces Large Negative Magnetoresistance in the van der Waals Semiconductor CrSBr. Advanced Materials, 2020, 32, e2003240.	21.0	116
56	Multiphonon Relaxation Slows Singlet Fission in Crystalline Hexacene. Journal of the American Chemical Society, 2014, 136, 10654-10660.	13.7	114
57	Persistent Energetic Electrons in Methylammonium Lead Iodide Perovskite Thin Films. Journal of the American Chemical Society, 2016, 138, 15717-15726.	13.7	107
58	Exceeding the Shockleyâ€“Queisser limit in solar energy conversion. Energy and Environmental Science, 2013, 6, 3508.	30.8	106
59	Intrinsic Charge Transport across Phase Transitions in Hybrid Organoâ€Inorganic Perovskites. Advanced Materials, 2016, 28, 6509-6514.	21.0	103
60	Ferroelectric large polarons. Nature Materials, 2018, 17, 379-381.	27.5	103
61	Distinct properties of the triplet pair state from singlet fission. Science Advances, 2017, 3, e1700241.	10.3	102
62	Rigid, Conjugated Macrocycles for High Performance Organic Photodetectors. Journal of the American Chemical Society, 2016, 138, 16426-16431.	13.7	98
63	Helical Nanoribbons for Ultra-Narrowband Photodetectors. Journal of the American Chemical Society, 2017, 139, 5644-5647.	13.7	97
64	ELECTRON TRANSFER AT MOLECULE-METAL INTERFACES: A Two-Photon Photoemission Study. Annual Review of Physical Chemistry, 2002, 53, 221-247.	10.8	94
65	Interlayer electronic coupling on demand in a 2D magnetic semiconductor. Nature Materials, 2021, 20, 1657-1662.	27.5	94
66	Three-Dimensional Graphene Nanostructures. Journal of the American Chemical Society, 2018, 140, 9341-9345.	13.7	93
67	Reversible strain-induced magnetic phase transition in a van der Waals magnet. Nature Nanotechnology, 2022, 17, 256-261.	31.5	93
68	Assembly of Organic Molecules on Silicon Surfaces via the Siâˆ'N Linkage. Journal of the American Chemical Society, 1999, 121, 454-455.	13.7	92
69	Direct Determination of Band-Gap Renormalization in the Photoexcited Monolayer <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:msub><mml:mrow><mml:mi>MoS</mml:mi></mml:mrow><mml:mn>2</mml:mn></mml:msub> Physical Review Letters, 2019, 122, 246803.	7.8	92
70	Role of Dielectric Drag in Polaron Mobility in Lead Halide Perovskites. ACS Energy Letters, 2017, 2, 2555-2562.	17.4	90
71	Dynamic Screening and Slow Cooling of Hot Carriers in Lead Halide Perovskites. Advanced Materials, 2019, 31, e1803054.	21.0	86
72	Grafting of High-Density Poly(Ethylene Glycol) Monolayers on Si(111). Langmuir, 2001, 17, 7798-7803.	3.5	83

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73	Direct Observation of Entropy-Driven Electron-Hole Pair Separation at an Organic Semiconductor Interface. Physical Review Letters, 2015, 114, 247003.	7.8	82
74	Optical generation of high carrier densities in 2D semiconductor heterobilayers. Science Advances, 2019, 5, eaax0145.	10.3	80
75	Molecular Assemblies on Silicon Surfaces via Siâˆ'O Linkages. Langmuir, 2000, 16, 6766-6772.	3.5	79
76	Harvesting Singlet Fission for Solar Energy Conversion: One- versus Two-Electron Transfer from the Quantum Mechanical Superposition. Journal of the American Chemical Society, 2012, 134, 18295-18302.	13.7	79
77	Nanobubble induced formation of quantum emitters in monolayer semiconductors. 2D Materials, 2017, 4, 021019.	4.4	76
78	Optical parametric amplification by monolayer transition metal dichalcogenides. Nature Photonics, 2021, 15, 6-10.	31.4	74
79	Enhanced tunable second harmonic generation from twistable interfaces and vertical superlattices in boron nitride homostructures. Science Advances, 2021, 7, .	10.3	73
80	Anomalously Large Polarization Effect Responsible for Excitonic Red Shifts in PbSe Quantum Dot Solids. Journal of Physical Chemistry Letters, 2011, 2, 795-800.	4.6	72
81	Harvesting singlet fission for solar energy conversion via triplet energy transfer. Nature Communications, 2013, 4, 2679.	12.8	70
82	Intra- to Intermolecular Singlet Fission. Journal of Physical Chemistry C, 2015, 119, 1312-1319.	3.1	65
83	A Dynamic Landscape from Femtoseconds to Minutes for Excess Electrons at Iceâˆ'Metal Interfaces. Journal of Physical Chemistry C, 2009, 113, 979-988.	3.1	61
84	Ambipolar Landau levels and strong band-selective carrier interactions in monolayer WSe2. Nature Materials, 2018, 17, 411-415.	27.5	60
85	Coupling between magnetic order and charge transport in a two-dimensional magnetic semiconductor. Nature Materials, 2022, 21, 754-760.	27.5	60
86	Competition Between Hot-Electron Cooling and Large Polaron Screening in CsPbBr₃ Perovskite Single Crystals. Journal of Physical Chemistry C, 2018, 122, 13724-13730.	3.1	59
87	A modular synthetic approach for band-gap engineering of armchair graphene nanoribbons. Nature Communications, 2018, 9, 1687.	12.8	59
88	Programmable hyperbolic polaritons in van der Waals semiconductors. Science, 2021, 371, 617-620.	12.6	58
89	Temperature dependent relaxation of a â€œsolidâ€"liquidâ€• Journal of Polymer Science, Part B: Polymer Physics, 2009, 47, 1285-1290.	2.1	57
90	van der Waals Solids from Self-Assembled Nanoscale Building Blocks. Nano Letters, 2016, 16, 1445-1449.	9.1	56

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91	Single-crystal-to-single-crystal intercalation of a low-bandgap superatomic crystal. Nature Chemistry, 2017, 9, 1170-1174.	13.6	56
92	Exciton dynamics at molecule-metal interfaces:C60â^•Au(111). Physical Review B, 2005, 72, .	3.2	55
93	Efficient Bottomâ€Up Preparation of Graphene Nanoribbons by Mild Suzukiâ€"Miyaura Polymerization of Simple Triaryl Monomers. Chemistry - A European Journal, 2016, 22, 9116-9120.	3.3	55
94	Two-Photon Photoemission Study of Heterogeneous Electron Transfer:Â C6F6on Cu(111). Journal of Physical Chemistry B, 1999, 103, 3449-3456.	2.6	53
95	Stereochemical expression of ns2 electron pairs in metal halide perovskites. Nature Reviews Chemistry, 2021, 5, 838-852.	30.2	53
96	Coveâ€Edge Nanoribbon Materials for Efficient Inverted Halide Perovskite Solar Cells. Angewandte Chemie - International Edition, 2017, 56, 14648-14652.	13.8	51
97	How to Draw Energy Level Diagrams in Excitonic Solar Cells. Journal of Physical Chemistry Letters, 2014, 5, 2283-2288.	4.6	50
98	Diffusivity Reveals Three Distinct Phases of Interlayer Excitons in <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mrow><mml:mi>MoSe</mml:mi></mml:mrow><mml:mrow><mml:mn>2</mml:mn></mml:mrow>< Heterobilayers. Physical Review Letters, 2021, 126, 106804.	7.8	49
99	Electronic Structure at Organic/Metal Interfaces:Â Naphthalene/Cu(111). Journal of Physical Chemistry B, 2000, 104, 10332-10338.	2.6	47
100	Unoccupied States in C60Thin Films Probed by Two-Photon Photoemission. Journal of Physical Chemistry B, 2002, 106, 5975-5981.	2.6	47
101	Controlling Singlet Fission by Molecular Contortion. Journal of the American Chemical Society, 2019, 141, 13143-13147.	13.7	47
102	Solvated Electrons in Solidsâ€"Ferroelectric Large Polarons in Lead Halide Perovskites. Journal of the American Chemical Society, 2021, 143, 5-16.	13.7	44
103	Layer-by-Layer Growth of Incommensurate, Polycrystalline, Lying-Down Pentacene Thin Films on Au(111). Chemistry of Materials, 2006, 18, 1318-1323.	6.7	43
104	Lightâ€"Matter Interaction and Lasing in Lead Halide Perovskites. Accounts of Chemical Research, 2019, 52, 2950-2959.	15.6	43
105	Direct determination of momentum-resolved electron transfer in the photoexcited van der Waals heterobilayer <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:mrow><mml:mi mathvariant="normal">W</mml:mi><mml:msub><mml:mi mathvariant="normal">S</mml:mi><mml:mn>2</mml:mn></mml:msub><mml:mo>/</mml:mo><mml:mi>Mo</mml:mi><mml:msub> mathvariant="normal">S</mml:mi><mml:mn>2</mml:mn></mml:msub></mml:mrow></mml:math>. Physical Review B, 2020, 101, .	3.2	43
106	Superatomic Two-Dimensional Semiconductor. Nano Letters, 2018, 18, 1483-1488.	9.1	41
107	Continuous Wave Sum Frequency Generation and Imaging of Monolayer and Heterobilayer Two-Dimensional Semiconductors. ACS Nano, 2020, 14, 708-714.	14.6	41
108	High carrier mobility in graphene doped using a monolayer of tungsten oxyselenide. Nature Electronics, 2021, 4, 731-739.	26.0	41

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109	Electronic Structure and Dynamics at Organic Donor/Acceptor Interfaces. MRS Bulletin, 2010, 35, 443-448.	3.5	40
110	Electrostatic Screening of Charged Defects in Monolayer MoS₂. Journal of Physical Chemistry Letters, 2017, 8, 2148-2152.	4.6	40
111	Chemical Vapor Deposition of Organic Monolayers on Si(100) via Siâ"'N Linkages. Langmuir, 1999, 15, 8147-8154.	3.5	39
112	Electron Dynamics at the ZnO (101Ì…0) Surface. Journal of Physical Chemistry C, 2008, 112, 14682-14692.	3.1	38
113	Quantitative Glycomics from Fluidic Glycan Microarrays. Journal of the American Chemical Society, 2009, 131, 13646-13650.	13.7	37
114	Lateral confinement of image electron wave function by an interfacial dipole lattice. Journal of Chemical Physics, 2003, 118, 4337-4340.	3.0	35
115	Charge transfer excitons and image potential states on organic semiconductor surfaces. Physical Review B, 2009, 80, .	3.2	35
116	Two-Step Approach to the Formation of Organic Monolayers on the Silicon Oxide Surface. Langmuir, 2001, 17, 5576-5580.	3.5	34
117	Trion-Species-Resolved Quantum Beats in MoSe₂. ACS Nano, 2017, 11, 11550-11558.	14.6	33
118	Femtosecond exciton dynamics in WSe2 optical waveguides. Nature Communications, 2020, 11, 3567.	12.8	31
119	Polaron and ion diffusion in a poly(3-hexylthiophene) thin-film transistor gated with polymer electrolyte dielectric. Applied Physics A: Materials Science and Processing, 2009, 95, 291-296.	2.3	30
120	Spin-orbitâ€"coupled exciton-polariton condensates in lead halide perovskites. Science Advances, 2021, 7, eabj7667.	10.3	30
121	Distance-Dependent Electronic Coupling at Moleculeâ"'Metal Interfaces:Â C60/Cu(111). Journal of Physical Chemistry B, 2004, 108, 7788-7793.	2.6	29
122	Dissecting Interlayer Hole and Electron Transfer in Transition Metal Dichalcogenide Heterostructures via Two-Dimensional Electronic Spectroscopy. Nano Letters, 2021, 21, 4738-4743.	9.1	29
123	Tribological Properties of Alkoxyl Monolayers on Oxide Terminated Silicon. Tribology Letters, 2003, 14, 237-244.	2.6	28
124	Doping-Induced Superconductivity in the van der Waals Superatomic Crystal Re₆Se₈Cl₂. Nano Letters, 2020, 20, 1718-1724.	9.1	28
125	Electronic Band Formation at Organicâ"'Metal Interfaces:Â Role of Adsorbateâ"'Surface Interaction. Journal of Physical Chemistry B, 2001, 105, 10912-10917.	2.6	27
126	Microcontact Printing Directly on the Silicon Surface. Langmuir, 2002, 18, 3415-3417.	3.5	27

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127	Quantifying Interfacial Electric Fields and Local Crystallinity in Polymerâ€"Fullerene Bulkâ€Heterojunction Solar Cells. Advanced Functional Materials, 2011, 21, 2666-2673.	14.9	27
128	Direct Photodesorption of Atomic Hydrogen from Si(100) at 157 nm:â€‰ Experiment and Simulation. Journal of Physical Chemistry B, 1999, 103, 4892-4899.	2.6	26
129	Probing ultrafast charge separation at organic donor/acceptor interfaces by a femtosecond electric field meter. Applied Physics Letters, 2011, 99, 083307.	3.3	26
130	Exciton dynamics at interfaces of organic semiconductors. Journal of Electron Spectroscopy and Related Phenomena, 2009, 174, 116-124.	1.7	23
131	Optical Probe of Charge Separation at Organic/Inorganic Semiconductor Interfaces. Journal of Physical Chemistry C, 2013, 117, 10974-10979.	3.1	23
132	Stringing the Perylene Diimide Bow. Angewandte Chemie - International Edition, 2020, 59, 14303-14307.	13.8	23
133	Nano-spectroscopy of excitons in atomically thin transition metal dichalcogenides. Nature Communications, 2022, 13, 542.	12.8	23
134	Two-Dimensional Hierarchical Semiconductor with Addressable Surfaces. Journal of the American Chemical Society, 2018, 140, 9369-9373.	13.7	22
135	Formation of Two-Dimensional Polarons that are Absent in Three-Dimensional Crystals. Physical Review Letters, 2007, 98, 246801.	7.8	21
136	Decoding ultrafast polarization responses in lead halide perovskites by the two-dimensional optical Kerr effect. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	7.1	21
137	Mapping electric field distributions in biased organic bulk heterojunctions under illumination by nonlinear optical microscopy. Applied Physics Letters, 2013, 102, .	3.3	20
138	Strain-Induced Stereoselective Formation of Blue-Emitting Cyclostilbenes. Journal of the American Chemical Society, 2015, 137, 12282-12288.	13.7	20
139	Spin Waves and Magnetic Exchange Hamiltonian in CrSBr. Advanced Science, 2022, 9, .	11.2	20
140	Exceeding the Limit in Solar Energy Conversion with Multiple Excitons. Accounts of Chemical Research, 2013, 46, 1239-1241.	15.6	19
141	Time-, Energy-, and Phase-Resolved Second-Harmonic Generation at Semiconductor Interfaces. Journal of Physical Chemistry C, 2014, 118, 27981-27988.	3.1	19
142	Free Trions with Near-Unity Quantum Yield in Monolayer MoSe₂. ACS Nano, 2022, 16, 140-147.	14.6	19
143	Direct View of Phonon Dynamics in Atomically Thin MoS₂. Nano Letters, 2022, 22, 4718-4724.	9.1	19
144	Twoâ€Dimensional Fullerene Assembly from an Exfoliated van der Waals Template. Angewandte Chemie - International Edition, 2018, 57, 6125-6129.	13.8	18

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145	Disentangling Many-Body Effects in the Coherent Optical Response of 2D Semiconductors. Nano Letters, 2022, 22, 5322-5329.	9.1	18
146	Image-potential states on the metallic (111) surface of bismuth. New Journal of Physics, 2008, 10, 113018.	2.9	17
147	Spontaneous Electronic Band Formation and Switchable Behaviors in a Phase-Rich Superatomic Crystal. Journal of the American Chemical Society, 2018, 140, 15601-15605.	13.7	17
148	Optical Anisotropy and Phase Transitions in Lead Halide Perovskites. Journal of Physical Chemistry Letters, 2021, 12, 5016-5022.	4.6	17
149	Coveâ€Edge Nanoribbon Materials for Efficient Inverted Halide Perovskite Solar Cells. Angewandte Chemie, 2017, 129, 14840-14844.	2.0	16
150	Mixing at the Charged Interface of a Polymer Semiconductor and a Polyelectrolyte Dielectric. Journal of Physical Chemistry Letters, 2010, 1, 862-867.	4.6	15
151	Charge Saturation and Intrinsic Doping in Electrolyte-Gated Organic Semiconductors. Journal of Physical Chemistry Letters, 2015, 6, 4840-4844.	4.6	15
152	Bimodal Bandgaps in Mixed Cesium Methylammonium Lead Bromide Perovskite Single Crystals. Journal of Physical Chemistry C, 2019, 123, 14865-14870.	3.1	15
153	Superatomic solid solutions. Nature Chemistry, 2021, 13, 607-613.	13.6	15
154	Probing Transient Electric Fields in Photoexcited Organic Semiconductor Thin Films and Interfaces by Time-Resolved Second Harmonic Generation. Journal of Physical Chemistry C, 2014, 118, 10670-10676.	3.1	14
155	Enhanced Open-Circuit Voltage in Perovskite Solar Cells with Open-Cage [60]Fullerene Derivatives as Electron-Transporting Materials. Materials, 2019, 12, 1314.	2.9	13
156	Photoemission from excitons in organic semiconductors. Journal of Electron Spectroscopy and Related Phenomena, 2015, 204, 75-79.	1.7	12
157	In-Plane Anisotropy in Biaxial ReS₂ Crystals Probed by Nano-Optical Imaging of Waveguide Modes. ACS Photonics, 2022, 9, 443-451.	6.6	12
158	Experimental Demonstration of Correlated Flux Scaling in Photoconductivity and Photoluminescence of Lead-Halide Perovskites. Physical Review Applied, 2018, 10, .	3.8	11
159	Shape Matching in Superatom Chemistry and Assembly. Journal of the American Chemical Society, 2020, 142, 11993-11998.	13.7	11
160	Broad-Band Near-Infrared Doublet Emission in a Tetrathiafulvalene-Based Metalâ€"Organic Framework. Journal of Physical Chemistry Letters, 2020, 11, 762-766.	4.6	11
161	The ultrafast Kerr effect in anisotropic and dispersive media. Journal of Chemical Physics, 2021, 154, 094202.	3.0	11
162	Charge Transport, Nanostructure, and the Mott Insulator-to-Metal Transition in Poly(3-hexylthiophene). Journal of Physical Chemistry C, 2008, 112, 16174-16177.	3.1	10

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163	Mo 6 S 3 Br 6 : An Anisotropic 2D Superatomic Semiconductor. Advanced Functional Materials, 2019, 29, 1902951.	14.9	10
164	Hierarchical Coherent Phonons in a Superatomic Semiconductor. Advanced Materials, 2019, 31, e1903209.	21.0	9
165	Direct Time-Domain View of Auger Recombination in a Semiconductor. Physical Review Letters, 2017, 118, 087402.	7.8	8
166	Strong polaronic effect in a superatomic two-dimensional semiconductor. Journal of Chemical Physics, 2020, 152, 171101.	3.0	8
167	Ultrafast evolution of the complex dielectric function of monolayer WS₂ after photoexcitation. Physical Chemistry Chemical Physics, 2021, 23, 22640-22646.	2.8	8
168	Charge Transport and Separation Dynamics at the C₆₀/GaAs(001) Interface. Journal of Physical Chemistry C, 2014, 118, 2987-2991.	3.1	6
169	Twoâ€Dimensional Fullerene Assembly from an Exfoliated van der Waals Template. Angewandte Chemie, 2018, 130, 6233-6237.	2.0	6
170	SURFACE CHEMISTRY FOR PROTEIN MICROARRAYS. International Journal of Nanoscience, 2007, 06, 109-116.	0.7	5
171	Friction, Wear, and Aging of an Alkoxy-monolayer Boundary Lubricant on Silicon. Tribology Letters, 2008, 30, 205-213.	2.6	5
172	Stringing the Perylene Diimide Bow. Angewandte Chemie, 2020, 132, 14409-14413.	2.0	5
173	Hyperspectral microscopy of two-dimensional semiconductors. Optical Materials: X, 2022, 14, 100145.	0.8	5
174	Quantifying space charge accumulation in organic bulk heterojunctions by nonlinear optical microscopy. Organic Electronics, 2013, 14, 3014-3018.	2.6	4
175	Understanding lead halide perovskites. Journal of Chemical Physics, 2020, 153, 030401.	3.0	4
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