Gang Chen

List of Publications by Year
in descending order

48 papers	2,644 citations	279487 23 h-index	197535 49 g-index
49 all docs	49 docs citations	49 times ranked	3451 citing authors

#	Article	IF	Citations
1	All-perovskite tandem solar cells with improved grain surface passivation. Nature, 2022, 603, 73-78.	13.7	544
2	Shapes and vorticities of superfluid helium nanodroplets. Science, 2014, 345, 906-909.	6.0	197
3	Flexible all-perovskite tandem solar cells approaching 25% efficiency with molecule-bridged hole-selective contact. Nature Energy, 2022, 7, 708-717.	19.8	171
4	Templated growth of oriented layered hybrid perovskites on 3D-like perovskites. Nature Communications, 2020, 11, 582.	5.8	167
5	Radially oriented mesoporous TiO ₂ microspheres with single-crystalâ€“like anatase walls for high-efficiency optoelectronic devices. Science Advances, 2015, 1, e1500166.	4.7	139
6	Ligandâ€Modulated Excess PbI₂ Nanosheets for Highly Efficient and Stable Perovskite Solar Cells. Advanced Materials, 2020, 32, e2000865.	11.1	136
7	Metal chalcogenides as counter electrode materials in quantum dot sensitized solar cells: a perspective. Journal of Materials Chemistry A, 2015, 3, 23074-23089.	5.2	105
8	Two-Dimensional Organicâ€“Inorganic Hybrid Perovskite Photonic Films. Nano Letters, 2016, 16, 4166-4173.	4.5	105
9	Mesoporous Silica Thin Membranes with Large Vertical Mesochannels for Nanosizeâ€Based Separation. Advanced Materials, 2017, 29, 1702274.	11.1	87
10	Conformational and Compositional Tuning of Phenanthrocarbazole-Based Dopant-Free Hole-Transport Polymers Boosting the Performance of Perovskite Solar Cells. Journal of the American Chemical Society, 2020, 142, 17681-17692.	6.6	83
11	Constructing Three-Dimensional Mesoporous Bouquet-Posy-like TiO₂ Superstructures with Radially Oriented Mesochannels and Single-Crystal Walls. Journal of the American Chemical Society, 2017, 139, 517-526.	6.6	76
12	A New Organic Interlayer Spacer for Stable and Efficient 2D Ruddlesdenâ€“Popper Perovskite Solar Cells. Nano Letters, 2019, 19, 5237-5245.	4.5	76
13	Highly Thermostable and Efficient Formamidiniumâ€Based Lowâ€Dimensional Perovskite Solar Cells. Angewandte Chemie - International Edition, 2021, 60, 856-864.	7.2	75
14	In Situ Observation of Vapor-Assisted 2Dâ€“3D Heterostructure Formation for Stable and Efficient Perovskite Solar Cells. Nano Letters, 2020, 20, 1296-1304.	4.5	65
15	Dynamic and Quantitative Control of the DNAâ€Mediated Growth of Gold Plasmonic Nanostructures. Angewandte Chemie - International Edition, 2014, 53, 8338-8342.	7.2	63
16	In Situ Observation of Crystallization Dynamics and Grain Orientation in Sequential Deposition of Metal Halide Perovskites. Advanced Functional Materials, 2019, 29, 1902319.	7.8	53
17	In Situ Realâ€Time Study of the Dynamic Formation and Conversion Processes of Metal Halide Perovskite Films. Advanced Materials, 2018, 30, 1706401.	11.1	52
18	Tailoring Interlayer Spacers for Efficient and Stable Formamidiniumâ€Based Lowâ€Dimensional Perovskite Solar Cells. Advanced Materials, 2022, 34, e2106380.	11.1	42

#	Article	IF	Citations
19	Self-Assembly of Protein Crystals with Different Crystal Structures Using Tobacco Mosaic Virus Coat Protein as a Building Block. ACS Nano, 2018, 12, 1673-1679.	7.3	33
20	In situ X-ray scattering observation of two-dimensional interfacial colloidal crystallization. Nature Communications, 2018, 9, 1335.	5.8	32
21	Precisely Controlled Vertical Alignment in Mesostructured Carbon Thin Films for Efficient Electrochemical Sensing. ACS Nano, 2021, 15, 7713-7721.	7.3	28
22	Improving efficiency and stability of colorful perovskite solar cells with two-dimensional photonic crystals. Nanoscale, 2020, 12, 8425-8431.	2.8	27
23	Interfacial Structure and Composition Managements for Highâ€Performance Methylammoniumâ€Free Perovskite Solar Cells. Advanced Functional Materials, 2020, 30, 2005846.	7.8	25
24	Structure determination of Pt-coated Au dumbbells<i>via</i>fluctuation X-ray scattering. Journal of Synchrotron Radiation, 2012, 19, 695-700.	1.0	23
25	Highly dispersed Pt nanoparticles on 2D MoS₂ nanosheets for efficient and stable hydrogen evolution reaction. Journal of Materials Chemistry A, 2022, 10, 5273-5279.	5.2	20
26	Dynamic Crystallization and Phase Transition in Evaporating Colloidal Droplets. Nano Letters, 2019, 19, 8225-8233.	4.5	19
27	Photo-driven growth of a monolayer of platinum spherical-nanocrowns uniformly coated on a membrane toward fuel cell applications. Journal of Materials Chemistry A, 2020, 8, 23284-23292.	5.2	18
28	Precise Fabrication of De Novo Nanoparticle Lattices on Dynamic 2D Protein Crystalline Lattices. Nano Letters, 2020, 20, 1154-1160.	4.5	16
29	Realâ€Time Probing of Nanowire Assembly Kinetics at the Airâ€“Water Interface by Inâ€…Situ Synchrotron Xâ€Ray Scattering. Angewandte Chemie - International Edition, 2018, 57, 8130-8134.	7.2	14
30	Synergistic Improvements in Efficiency and Stability of 2D Perovskite Solar Cells with Metal Ion Doping. Advanced Materials Interfaces, 2019, 6, 1901259.	1.9	14
31	A Hierarchical Anodic Aluminum Oxide Template. Nano Letters, 2021, 21, 250-257.	4.5	14
32	Component Particle Structure in Heterogeneous Disordered Ensembles Extracted from High-Throughput Fluctuation X-Ray Scattering. Physical Review Letters, 2013, 110, 195501.	2.9	12
33	Highly Thermostable and Efficient Formamidiniumâ€Based Lowâ€Dimensional Perovskite Solar Cells. Angewandte Chemie, 2021, 133, 869-877.	1.6	12
34	Self-passivation of low-dimensional hybrid halide perovskites guided by structural characteristics and degradation kinetics. Energy and Environmental Science, 2021, 14, 2357-2368.	15.6	12
35	Noncovalent Self-Assembly of Protein Crystals with Tunable Structures. Nano Letters, 2021, 21, 1749-1757.	4.5	11
36	Humidityâ€Induced Defectâ€Healing of Formamidiniumâ€Based Perovskite Films. Small, 2021, 17, e2104165.	5.2	10

#	ARTICLE	IF	CITATIONS
37	Controllable Formation of Efficient CuSe Counter Electrodes for Quantum Dot Sensitized Solar Cells. Journal of the Electrochemical Society, 2017, 164, F1566-F1571.	1.3	9
38	A Crossâ€Linked PCBM Interlayer for Efficient and UVâ€Stable Methylammoniumâ€Free Perovskite Solar Cells. Energy Technology, 2020, 8, 2000224.	1.8	9
39	Structural and optical control of DNA-mediated Janus plasmonic nanostructures. Nanoscale, 2016, 8, 9337-9342.	2.8	7
40	X-ray standing wave enhanced scattering from mesoporous silica thin films. Applied Physics Letters, 2017, 110, .	1.5	7
41	Wide-angle polarization-free plasmon-enhanced light absorption in perovskite films using silver nanowires. Optics Express, 2017, 25, 3594.	1.7	7
42	Substrate suppression of thermal roughness in stacked supported bilayers. Physical Review E, 2011, 84, 041914.	0.8	6
43	Realâ€Time Probing of Nanowire Assembly Kinetics at the Airâ€“Water Interface by Inâ€…Situ Synchrotron Xâ€Ray Scattering. Angewandte Chemie, 2018, 130, 8262-8266.	1.6	3
44	A Nanomesh Electrode for Self-Driven Perovskite Photodetectors with Tunable Asymmetric Schottky Junctions. Nanoscale, 2021, 13, 17147-17155.	2.8	3
45	Sizes of pure and doped helium droplets from single shot x-ray imaging. Journal of Chemical Physics, 2022, 156, 041102.	1.2	3
46	Iterative and accurate determination of small angle X-ray scattering background. Nuclear Science and Techniques/Hewuli, 2016, 27, 1.	1.3	2
47	Experimental evidence for x-ray standing wave modulated surface scattering effect. Applied Physics Letters, 2019, 114, 141601.	1.5	2
48	X-ray and optical characterizations of DNA-mediated Janus nanostructures. Applied Physics Letters, 2016, 109, 233101.	1.5	1