Xu-Bing Li

List of Publications by Year
in descending order

74 papers	5,047 citations	81743 39 h-index	88477 70 g-index
77 all docs	77 docs citations	77 times ranked	5467 citing authors

#	Article	IF	Citations
1	Rational Design of Dotâ€onâ€Rod Nanoâ€Heterostructure for Photocatalytic CO₂ Reduction: Pivotal Role of Hole Transfer and Utilization. Advanced Materials, 2022, 34, e2106662.	11.1	42
2	Reductive Carbonâ€"Carbon Coupling on Metal Sites Regulates Photocatalytic CO₂ Reduction in Water Using ZnSe Quantum Dots. Angewandte Chemie - International Edition, 2022, 61, .	7.2	36
3	Cobalt carbide nanosheets as effective catalysts toward photothermal degradation of mustard-gas simulants under solar light. Applied Catalysis B: Environmental, 2021, 284, 119703.	10.8	19
4	Nitrogenase inspired artificial photosynthetic nitrogen fixation. CheM, 2021, 7, 1431-1450.	5.8	43
5	Perâ€6â€Thiolâ€Cyclodextrin Engineered [FeFe]â€Hydrogenase Mimic/CdSe Quantum Dot Assembly for Photocatalytic Hydrogen Production. Solar Rrl, 2021, 5, 2000474.	3.1	9
6	Site-selective D₂O-mediated deuteration of diaryl alcohols <i>via</i> quantum dots photocatalysis. Chemical Communications, 2021, 57, 6768-6771.	2.2	23
7	Rational design of isostructural 2D porphyrin-based covalent organic frameworks for tunable photocatalytic hydrogen evolution. Nature Communications, 2021, 12, 1354.	5.8	286
8	Tandem photoelectrochemical and photoredox catalysis for efficient and selective aryl halides functionalization by solar energy. Matter, 2021, 4, 2354-2366.	5.0	24
9	Probe Binding Mode and Structure of the Photocatalytic Center: Hydrogen Generation by Quantum Dots and Nickel Ions. Energy & Fuels, 2021, 35, 19185-19190.	2.5	7
10	Mechanistic Insights Into Iron(II) Bis(pyridyl)amineâ€Bipyridine Skeleton for Selective CO₂ Photoreduction. Angewandte Chemie - International Edition, 2021, 60, 26072-26079.	7.2	25
11	Optimal d-band-induced Cu₃N as a cocatalyst on metal sulfides for boosting photocatalytic hydrogen evolution. Journal of Materials Chemistry A, 2020, 8, 22601-22606.	5.2	20
12	Identifying a Real Catalyst of [NiFe]â€Hydrogenase Mimic for Exceptional H 2 Photogeneration. Angewandte Chemie - International Edition, 2020, 59, 18400-18404.	7.2	11
13	Bioinspired metal complexes for energy-related photocatalytic small molecule transformation. Chemical Communications, 2020, 56, 15496-15512.	2.2	22
14	Semiconductor nanocrystals for small molecule activation<i>via</i>artificial photosynthesis. Chemical Society Reviews, 2020, 49, 9028-9056.	18.7	127
15	Identifying a Real Catalyst of [NiFe]â€Hydrogenase Mimic for Exceptional H₂ Photogeneration. Angewandte Chemie, 2020, 132, 18558-18562.	1.6	2
16	Flower-like cobalt carbide for efficient carbon dioxide conversion. Chemical Communications, 2020, 56, 7849-7852.	2.2	30
17	Site- and Spatial-Selective Integration of Non-noble Metal Ions into Quantum Dots for Robust Hydrogen Photogeneration. Matter, 2020, 3, 571-585.	5.0	36
18	Unveiling Catalytic Sites in a Typical Hydrogen Photogeneration System Consisting of Semiconductor Quantum Dots and 3d-Metal Ions. Journal of the American Chemical Society, 2020, 142, 4680-4689.	6.6	51

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19	Thiol Activation toward Selective Thiolation of Aromatic Câ€"H Bond. Organic Letters, 2020, 22, 3804-3809.	2.4	26
20	Efficient and Selective CO2 Reduction Integrated with Organic Synthesis by Solar Energy. CheM, 2019, 5, 2605-2616.	5.8	179
21	Photoelectrochemical cell for Pâ€"H/Câ€"H cross-coupling with hydrogen evolution. Chemical Communications, 2019, 55, 10376-10379.	2.2	47
22	Semiconductor Quantum Dots: An Emerging Candidate for CO₂ Photoreduction. Advanced Materials, 2019, 31, e1900709.	11.1	316
23	Regioselective <i>Ortho</i> Amination of an Aromatic Câ€"H Bond by Trifluoroacetic Acid via Electrochemistry. Organic Letters, 2019, 21, 5581-5585.	2.4	36
24	Superhydrophilic Graphdiyne Accelerates Interfacial Mass/Electron Transportation to Boost Electrocatalytic and Photoelectrocatalytic Water Oxidation Activity. Advanced Functional Materials, 2019, 29, 1808079.	7.8	95
25	Superhydrophilic Graphdiyne: Superhydrophilic Graphdiyne Accelerates Interfacial Mass/Electron Transportation to Boost Electrocatalytic and Photoelectrocatalytic Water Oxidation Activity (Adv.) Tj ETQq1 1 0.784314 rgBT /Overlock	7.8	1
26	Quantum Dot Assembly for Lightâ€Driven Multielectron Redox Reactions, such as Hydrogen Evolution and CO 2 Reduction. Angewandte Chemie, 2019, 131, 10918-10925.	1.6	20
27	Visible-Light-Induced Nanoparticle Assembly for Effective Hydrogen Photogeneration. ACS Sustainable Chemistry and Engineering, 2019, 7, 7286-7293.	3.2	12
28	Quantum Dot Assembly for Lightâ€Driven Multielectron Redox Reactions, such as Hydrogen Evolution and CO₂ Reduction. Angewandte Chemie - International Edition, 2019, 58, 10804-10811.	7.2	91
29	Catalytic Hydrogen Production Using A Cobalt Catalyst Bearing a Phosphinoamine Ligand. ChemPhotoChem, 2019, 3, 220-224.	1.5	5
30	Photocatalytic Hydrogen Evolution: Susceptible Surface Sulfide Regulates Catalytic Activity of CdSe Quantum Dots for Hydrogen Photogeneration (Adv. Mater. 7/2019). Advanced Materials, 2019, 31, 1970048.	11.1	1
31	Hand-in-hand quantum dot assembly sensitized photocathodes for enhanced photoelectrochemical hydrogen evolution. Journal of Materials Chemistry A, 2019, 7, 26098-26104.	5.2	10
32	Susceptible Surface Sulfide Regulates Catalytic Activity of CdSe Quantum Dots for Hydrogen Photogeneration. Advanced Materials, 2019, 31, e1804872.	11.1	55
33	Surface stoichiometry manipulation enhances solar hydrogen evolution of CdSe quantum dots. Journal of Materials Chemistry A, 2018, 6, 6015-6021.	5.2	57
34	Self-assembled inorganic clusters of semiconducting quantum dots for effective solar hydrogen evolution. Chemical Communications, 2018, 54, 4858-4861.	2.2	14
35	Photocatalysis with Quantum Dots and Visible Light for Effective Organic Synthesis. Chemistry - A European Journal, 2018, 24, 11530-11534.	1.7	71
36	Threeâ€Dimensional Graphene Networks with Abundant Sharp Edge Sites for Efficient Electrocatalytic Hydrogen Evolution. Angewandte Chemie, 2018, 130, 198-203.	1.6	41

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37	Enhanced Charge Separation Efficiency Accelerates Hydrogen Evolution from Water of Carbon Nitride and 3,4,9,10-Perylene-tetracarboxylic Dianhydride Composite Photocatalyst. ACS Applied Materials & Interfaces, 2018, 10, 3515-3521.	4.0	35
38	Recent Advances in Sensitized Photocathodes: From Molecular Dyes to Semiconducting Quantum Dots. Advanced Science, 2018, 5, 1700684.	5.6	65
39	Sensitized Photocathodes: Recent Advances in Sensitized Photocathodes: From Molecular Dyes to Semiconducting Quantum Dots (Adv. Sci. 4/2018). Advanced Science, 2018, 5, 1870023.	5.6	3
40	Holeâ€Transferâ€Layer Modification of Quantum Dotâ€Sensitized Photocathodes for Dramatically Enhanced Hydrogen Evolution. Particle and Particle Systems Characterization, 2018, 35, 1700278.	1.2	3
41	Threeâ€Dimensional Graphene Networks with Abundant Sharp Edge Sites for Efficient Electrocatalytic Hydrogen Evolution. Angewandte Chemie - International Edition, 2018, 57, 192-197.	7.2	106
42	Metallic Co₂C: A Promising Co-catalyst To Boost Photocatalytic Hydrogen Evolution of Colloidal Quantum Dots. ACS Catalysis, 2018, 8, 5890-5895.	5.5	92
43	Exceptional Catalytic Nature of Quantum Dots for Photocatalytic Hydrogen Evolution without External Cocatalysts. Advanced Functional Materials, 2018, 28, 1801769.	7.8	54
44	Direct synthesis of sulfide capped CdS and CdS/ZnS colloidal nanocrystals for efficient hydrogen evolution under visible light irradiation. Journal of Materials Chemistry A, 2018, 6, 16328-16332.	5.2	29
45	Semiconducting quantum dots forÂartificial photosynthesis. Nature Reviews Chemistry, 2018, 2, 160-173.	13.8	334
46	Frontispiece: Photocatalysis with Quantum Dots and Visible Light for Effective Organic Synthesis. Chemistry - A European Journal, 2018, 24, .	1.7	0
47	A Redox Shuttle Accelerates O₂ Evolution of Photocatalysts Formed In Situ under Visible Light. Advanced Materials, 2017, 29, 1606009.	11.1	48
48	Self-Assembled Framework Enhances Electronic Communication of Ultrasmall-Sized Nanoparticles for Exceptional Solar Hydrogen Evolution. Journal of the American Chemical Society, 2017, 139, 4789-4796.	6.6	146
49	Photocatalysis with Quantum Dots and Visible Light: Selective and Efficient Oxidation of Alcohols to Carbonyl Compounds through a Radical Relay Process in Water. Angewandte Chemie - International Edition, 2017, 56, 3020-3024.	7.2	151
50	Photocatalysis with Quantum Dots and Visible Light: Selective and Efficient Oxidation of Alcohols to Carbonyl Compounds through a Radical Relay Process in Water. Angewandte Chemie, 2017, 129, 3066-3070.	1.6	32
51	Assembling metallic 1T-MoS₂nanosheets with inorganic-ligand stabilized quantum dots for exceptional solar hydrogen evolution. Chemical Communications, 2017, 53, 5606-5609.	2.2	39
52	Direct synthesis of all-inorganic heterostructured CdSe/CdS QDs in aqueous solution for improved photocatalytic hydrogen generation. Journal of Materials Chemistry A, 2017, 5, 10365-10373.	5.2	89
53	Integrating CdSe Quantum Dots with a [FeFe]â€Hydrogenase Mimic into a Photocathode for Hydrogen Evolution at a Low Bias Voltage. ChemPhotoChem, 2017, 1, 260-264.	1.5	16
54	Nonstoichiometric Cu_{<i>x</i>}In_{<i>y</i>}S Quantum Dots for Efficient Photocatalytic Hydrogen Evolution. ChemSusChem, 2017, 10, 4833-4838.	3.6	45

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55	Graphdiyne: A Promising Catalystâ€“Support To Stabilize Cobalt Nanoparticles for Oxygen Evolution. ACS Catalysis, 2017, 7, 5209-5213.	5.5	150
56	Tracking Co(I) Intermediate in Operando in Photocatalytic Hydrogen Evolution by X-ray Transient Absorption Spectroscopy and DFT Calculation. Journal of Physical Chemistry Letters, 2016, 7, 5253-5258.	2.1	44
57	Comparison of H₂ photogeneration by [FeFe]-hydrogenase mimics with CdSe QDs and Ru(bpy)₃Cl₂ in aqueous solution. Energy and Environmental Science, 2016, 9, 2083-2089.	15.6	65
58	Solar Energy Conversion: Holeâ€Acceptingâ€Ligandâ€Modified CdSe QDs for Dramatic Enhancement of Photocatalytic and Photoelectrochemical Hydrogen Evolution by Solar Energy (Adv. Sci. 4/2016). Advanced Science, 2016, 3, .	5.6	1
59	Holeâ€Acceptingâ€Ligandâ€Modified CdSe QDs for Dramatic Enhancement of Photocatalytic and Photoelectrochemical Hydrogen Evolution by Solar Energy. Advanced Science, 2016, 3, 1500282.	5.6	60
60	Secondary coordination sphere accelerates hole transfer for enhanced hydrogen photogeneration from [FeFe]-hydrogenase mimic and CdSe QDs in water. Scientific Reports, 2016, 6, 29851.	1.6	33
61	Protonated Graphitic Carbon Nitride with Surface Attached Molecule as Hole Relay for Efficient Photocatalytic O₂ Evolution. ACS Catalysis, 2016, 6, 8336-8341.	5.5	44
62	Visible light-induced photochemical oxygen evolution from water by 3,4,9,10-perylenetetracarboxylic dianhydride nanorods as an n-type organic semiconductor. Catalysis Science and Technology, 2016, 6, 672-676.	2.1	16
63	Graphdiyne: A Metal-Free Material as Hole Transfer Layer To Fabricate Quantum Dot-Sensitized Photocathodes for Hydrogen Production. Journal of the American Chemical Society, 2016, 138, 3954-3957.	6.6	335
64	A solution-processed, mercaptoacetic acid-engineered CdSe quantum dot photocathode for efficient hydrogen production under visible light irradiation. Energy and Environmental Science, 2015, 8, 1443-1449.	15.6	90
65	Visible Light Catalysis Assisted Site-Specific Functionalization of Amino Acid Derivatives by Câ€“H Bond Activation without Oxidant: Cross-Coupling Hydrogen Evolution Reaction. ACS Catalysis, 2015, 5, 2391-2396.	5.5	148
66	Vectorial Electron Transfer for Improved Hydrogen Evolution by Mercaptopropionicâ€Acidâ€Regulated CdSe Quantumâ€Dotsâ€“TiO₂â€“Ni(OH)₂ Assembly. ChemSusChem, 2015, 8, 642-649.	3.6	39
67	Mechanistic Insights into the Interfaceâ€Directed Transformation of Thiols into Disulfides and Molecular Hydrogen by Visibleâ€Light Irradiation of Quantum Dots. Angewandte Chemie - International Edition, 2014, 53, 2085-2089.	7.2	205
68	Photocatalytic Hydrogen Evolution from Glycerol and Water over Nickelâ€Hybrid Cadmium Sulfide Quantum Dots under Visibleâ€Light Irradiation. ChemSusChem, 2014, 7, 1468-1475.	3.6	91
69	Visible Light Catalysis-Assisted Assembly of Ni_h-QD Hollow Nanospheres in Situ via Hydrogen Bubbles. Journal of the American Chemical Society, 2014, 136, 8261-8268.	6.6	74
70	A robust â€œartificial catalystâ€• in situ formed from CdTe QDs and inorganic cobalt salts for photocatalytic hydrogen evolution. Energy and Environmental Science, 2013, 6, 465-469.	15.6	120
71	Chitosan confinement enhances hydrogen photogeneration from a mimic of the diiron subsite of [FeFe]-hydrogenase. Nature Communications, 2013, 4, 2695.	5.8	159
72	Photocatalysis: An Exceptional Artificial Photocatalyst, Ni_hâ€CdSe/CdS Core/Shell Hybrid, Made In Situ from CdSe Quantum Dots and Nickel Salts for Efficient Hydrogen Evolution (Adv. Mater.) Tj ETQq0 0 0 rgBT /Overlock 10 T	1.1	1

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73	An Exceptional Artificial Photocatalyst, Ni_hâ€CdSe/CdS Core/Shell Hybrid, Made In Situ from CdSe Quantum Dots and Nickel Salts for Efficient Hydrogen Evolution. Advanced Materials, 2013, 25, 6613-6618.	11.1	140
74	Reductive Carbonâ€Carbon Coupling on Metal Sites Regulates Photocatalytic CO2 Reduction in Water Using ZnSe Quantum Dots. Angewandte Chemie, 0, , .	1.6	4