Lizhi Zhang

List of Publications by Citations

200 papers	19,928 citations	73 h-index	139 g-index
208 ext. papers	23,800 ext. citations	11.1 avg, IF	7.53 L-index

#	Paper	IF	Citations
200	Synthesis and facet-dependent photoreactivity of BiOCl single-crystalline nanosheets. *Journal of the American Chemical Society*, **2012**, 134, 4473-6	16.4	1158
199	Efficient Visible Light Nitrogen Fixation with BiOBr Nanosheets of Oxygen Vacancies on the Exposed {001} Facets. *Journal of the American Chemical Society*, **2015**, 137, 6393-9	16.4	1129
198	Generalized One-Pot Synthesis, Characterization, and Photocatalytic Activity of Hierarchical BiOX (X = Cl, Br, I) Nanoplate Microspheres. *Journal of Physical Chemistry C*, **2008**, 112, 747-753	3.8	1030
197	Bismuth oxyhalide nanomaterials: layered structures meet photocatalysis. *Nanoscale*, **2014**, 6, 8473-88	7.7	655
196	Oxygen Vacancy-Mediated Photocatalysis of BiOCl: Reactivity, Selectivity, and Perspectives. *Angewandte Chemie - International Edition*, **2018**, 57, 122-138	16.4	593
195	Low-Temperature Synthesis and High Visible-Light-Induced Photocatalytic Activity of BiOI/TiO2 Heterostructures. *Journal of Physical Chemistry C*, **2009**, 113, 7371-7378	3.8	591
194	New Reaction Pathway Induced by Plasmon for Selective Benzyl Alcohol Oxidation on BiOCl Possessing Oxygen Vacancies. *Journal of the American Chemical Society*, **2017**, 139, 3513-3521	16.4	517
193	ZnO/BiOI Heterostructures: Photoinduced Charge-Transfer Property and Enhanced Visible-Light Photocatalytic Activity. *Journal of Physical Chemistry C*, **2011**, 115, 20555-20564	3.8	477
192	Surface structure-dependent molecular oxygen activation of BiOCl single-crystalline nanosheets. *Journal of the American Chemical Society*, **2013**, 135, 15750-3	16.4	460
191	Solar Water Splitting and Nitrogen Fixation with Layered Bismuth Oxyhalides. *Accounts of Chemical Research*, **2017**, 50, 112-121	24.3	425
190	Efficient photocatalytic removal of NO in indoor air with hierarchical bismuth oxybromide nanoplate microspheres under visible light. *Environmental Science & Technology*, **2009**, 43, 4143-50	10.3	396
189	Porous structure dependent photoreactivity of graphitic carbon nitride under visible light. *Journal of Materials Chemistry*, **2012**, 22, 1160-1166		378
188	Giant Enhancement of Internal Electric Field Boosting Bulk Charge Separation for Photocatalysis. *Advanced Materials*, **2016**, 28, 4059-64	24	354
187	Superior visible light hydrogen evolution of Janus bilayer junctions via atomic-level charge flow steering. *Nature Communications*, **2016**, 7, 11480	17.4	303
186	Sustainable molecular oxygen activation with oxygen vacancies on the {001} facets of BiOCl nanosheets under solar light. *Nanoscale*, **2014**, 6, 14168-73	7.7	269
185	Highly efficient photocatalytic removal of sodium pentachlorophenate with Bi3O4Br under visible light. *Applied Catalysis B: Environmental*, **2013**, 136-137, 112-121	21.8	265
184	Oxygen Vacancy Structure Associated Photocatalytic Water Oxidation of BiOCl. *ACS Catalysis*, **2016**, 6, 8276-8285	13.1	263

183	Oxygen Vacancy Associated Surface Fenton Chemistry: Surface Structure Dependent Hydroxyl Radicals Generation and Substrate Dependent Reactivity. *Environmental Science & Technology*, **2017**, 51, 5685-5694	10.3	251
182	Hydroxylamine Promoted Goethite Surface Fenton Degradation of Organic Pollutants. *Environmental Science & Technology*, **2017**, 51, 5118-5126	10.3	251
181	Efficient removal of Cr(VI) from aqueous solution with Fe@Fe2O3 core-shell nanowires. *Environmental Science & Technology*, **2008**, 42, 6955-60	10.3	251
180	Visible Light Photocatalysis of BiOI and Its Photocatalytic Activity Enhancement by in Situ Ionic Liquid Modification. *Journal of Physical Chemistry C*, **2011**, 115, 14300-14308	3.8	249
179	Selective oxidation of benzyl alcohol into benzaldehyde over semiconductors under visible light: The case of Bi12O17Cl2 nanobelts. *Applied Catalysis B: Environmental*, **2013**, 142-143, 487-493	21.8	222
178	Core-shell structure dependent reactivity of Fe@Fe□□ nanowires on aerobic degradation of 4-chlorophenol. *Environmental Science & Technology*, **2013**, 47, 5344-52	10.3	218
177	Self-doping and surface plasmon modification induced visible light photocatalysis of BiOCl. *Nanoscale*, **2013**, 5, 10573-81	7.7	207
176	Facet-dependent solar ammonia synthesis of BiOCl nanosheets via a proton-assisted electron transfer pathway. *Nanoscale*, **2016**, 8, 1986-93	7.7	200
175	Enhanced photocatalytic removal of sodium pentachlorophenate with self-doped Bi2WO6 under visible light by generating more superoxide ions. *Environmental Science & Technology*, **2014**, 48, 5823-31	10.3	198
174	Protocatechuic Acid Promoted Alachlor Degradation in Fe(III)/H2O2 Fenton System. *Environmental Science & Technology*, **2015**, 49, 7948-56	10.3	187
173	Electronic and Band Structure Tuning of Ternary Semiconductor Photocatalysts by Self Doping: The Case of BiOI. *Journal of Physical Chemistry C*, **2010**, 114, 18198-18206	3.8	179
172	Facet-Dependent Cr(VI) Adsorption of Hematite Nanocrystals. *Environmental Science & Technology*, **2016**, 50, 1964-72	10.3	174
171	Iron oxide shell mediated environmental remediation properties of nano zero-valent iron. *Environmental Science: Nano*, **2017**, 4, 27-45	7.1	172
170	Visible light driven selective oxidation of amines to imines with BiOCl: Does oxygen vacancy concentration matter?. *Applied Catalysis B: Environmental*, **2018**, 228, 87-96	21.8	169
169	Efficient removal of heavy metal ions with biopolymer template synthesized mesoporous titania beads of hundreds of micrometers size. *Environmental Science & Technology*, **2012**, 46, 419-25	10.3	169
168	Nonaqueous Sol□el Synthesized Hierarchical CeO2 Nanocrystal Microspheres as Novel Adsorbents for Wastewater Treatment. *Journal of Physical Chemistry C*, **2009**, 113, 16625-16630	3.8	168
167	Fe@Fe2O3 core-shell nanowires enhanced Fenton oxidation by accelerating the Fe(III)/Fe(II) cycles. *Water Research*, **2014**, 59, 145-53	12.5	167
166	Synthesis and internal electric field dependent photoreactivity of Bi3O4Cl single-crystalline nanosheets with high {001} facet exposure percentages. *Nanoscale*, **2014**, 6, 167-71	7.7	161

165	Efficient Ammonia Electrosynthesis from Nitrate on Strained Ruthenium Nanoclusters. *Journal of the American Chemical Society*, **2020**, 142, 7036-7046	16.4	159
164	Persistent free radicals in carbon-based materials on transformation of refractory organic contaminants (ROCs) in water: A critical review. *Water Research*, **2018**, 137, 130-143	12.5	158
163	Oxygen vacancy induced selective silver deposition on the {001} facets of BiOCl single-crystalline nanosheets for enhanced Cr(VI) and sodium pentachlorophenate removal under visible light. *Nanoscale*, **2014**, 6, 7805-10	7.7	153
162	Ascorbic acid/Fe@Fe2O3: A highly efficient combined Fenton reagent to remove organic contaminants. *Journal of Hazardous Materials*, **2016**, 310, 170-8	12.8	141
161	Hydrothermal Synthesis of FeS2 as a High-Efficiency Fenton Reagent to Degrade Alachlor via Superoxide-Mediated Fe(II)/Fe(III) Cycle. *ACS Applied Materials & Interfaces*, **2015**, 7, 28534-44	9.5	140
160	2O3 CoreShell Nanowires as Iron Reagent. 1. Efficient Degradation of Rhodamine B by a Novel Sono-Fenton Process. *Journal of Physical Chemistry C*, **2007**, 111, 4087-4093	3.8	138
159	Dramatically enhanced aerobic atrazine degradation with Fe@Fe2O3 core-shell nanowires by tetrapolyphosphate. *Environmental Science & Technology*, **2014**, 48, 3354-62	10.3	136
158	Facile Microwave-Assisted Synthesis and Magnetic and Gas Sensing Properties of Fe3O4 Nanoroses. *Journal of Physical Chemistry C*, **2010**, 114, 6237-6242	3.8	132
157	Efficient anoxic pollutant removal with oxygen functionalized graphitic carbon nitride under visible light. *RSC Advances*, **2014**, 4, 5553	3.7	131
156	Synthesis and Characterization of FeFe2O3 CoreShell Nanowires and Nanonecklaces. *Crystal Growth and Design*, **2007**, 7, 459-464	3.5	131
155	Self doping promoted photocatalytic removal of no under visible light with bi2moo6: Indispensable role of superoxide ions. *Applied Catalysis B: Environmental*, **2016**, 182, 316-325	21.8	127
154	Generalized Preparation of Porous Nanocrystalline ZnFe2O4 Superstructures from Zinc Ferrioxalate Precursor and Its Superparamagnetic Property. *Journal of Physical Chemistry C*, **2008**, 112, 13163-13170	3.8	125
153	Facet-Level Mechanistic Insights into General Homogeneous Carbon Doping for Enhanced Solar-to-Hydrogen Conversion. *Advanced Functional Materials*, **2015**, 25, 2189-2201	15.6	121
152	Photochemistry of Hydrochar: Reactive Oxygen Species Generation and Sulfadimidine Degradation. *Environmental Science & Technology*, **2017**, 51, 11278-11287	10.3	121
151	Oxygen Vacancy Promoted O2 Activation over Perovskite Oxide for Low-Temperature CO Oxidation. *ACS Catalysis*, **2019**, 9, 9751-9763	13.1	116
150	Oxygen Vacancies Promoted the Selective Photocatalytic Removal of NO with Blue TiO via Simultaneous Molecular Oxygen Activation and Photogenerated Hole Annihilation. *Environmental Science & Technology*, **2019**, 53, 6444-6453	10.3	114
149	Synthesis and Enhanced Cr(VI) Photoreduction Property of Formate Anion Containing Graphitic Carbon Nitride. *Journal of Physical Chemistry C*, **2013**, 117, 4062-4068	3.8	114
148	Insight into core-shell dependent anoxic Cr(VI) removal with Fe@Fe2O3 nanowires: indispensable role of surface bound Fe(II). *ACS Applied Materials & Interfaces*, **2015**, 7, 1997-2005	9.5	110

147	Direct Oxidation of Methanol on Self-Supported Nanoporous Gold Film Electrodes with High Catalytic Activity and Stability. *Chemistry of Materials*, **2007**, 19, 6065-6067	9.6	110
146	First observation of visible light photocatalytic activity of carbon modified Nb2O5 nanostructures. *Journal of Materials Chemistry*, **2010**, 20, 3052		107
145	Hydrothermal Carbon-Mediated Fenton-Like Reaction Mechanism in the Degradation of Alachlor: Direct Electron Transfer from Hydrothermal Carbon to Fe(III). *ACS Applied Materials & Interfaces*, **2017**, 9, 17115-17124	9.5	103
144	Design of a highly efficient and wide pH electro-Fenton oxidation system with molecular oxygen activated by ferrous-tetrapolyphosphate complex. *Environmental Science & Technology*, **2015**, 49, 3032-9	10.3	103
143	Selective Synthesis of FeS and FeS2Nanosheet Films on Iron Substrates as Novel Photocathodes for Tandem Dye-Sensitized Solar Cells. *Journal of Physical Chemistry C*, **2008**, 112, 13037-13042	3.8	102
142	Oxygen Vacancies Mediated Complete Visible Light NO Oxidation via Side-On Bridging Superoxide Radicals. *Environmental Science & Technology*, **2018**, 52, 8659-8665	10.3	102
141	In Situ Carbon Homogeneous Doping on Ultrathin Bismuth Molybdate: A Dual-Purpose Strategy for Efficient Molecular Oxygen Activation. *Advanced Functional Materials*, **2017**, 27, 1703923	15.6	101
140	Hematite facet confined ferrous ions as high efficient Fenton catalysts to degrade organic contaminants by lowering H2O2 decomposition energetic span. *Applied Catalysis B: Environmental*, **2016**, 181, 127-137	21.8	97
139	Phosphate Shifted Oxygen Reduction Pathway on Fe@FeO Core-Shell Nanowires for Enhanced Reactive Oxygen Species Generation and Aerobic 4-Chlorophenol Degradation. *Environmental Science & Technology*, **2017**, 51, 8101-8109	10.3	95
138	Fe@Fe2O3Core-Shell Nanowires as an Iron Reagent. 3. Their Combination with CNTs as an Effective Oxygen-Fed Gas Diffusion Electrode in a Neutral Electro-Fenton System. *Journal of Physical Chemistry C*, **2007**, 111, 14799-14803	3.8	95
137	Electrochemically self-doped WO3/TiO2 nanotubes for photocatalytic degradation of volatile organic compounds. *Applied Catalysis B: Environmental*, **2020**, 260, 118205	21.8	92
136	A highly efficient zinc catalyst for selective electroreduction of carbon dioxide in aqueous NaCl solution. *Journal of Materials Chemistry A*, **2015**, 3, 16409-16413	13	91
135	Total aerobic destruction of azo contaminants with nanoscale zero-valent copper at neutral pH: promotion effect of in-situ generated carbon center radicals. *Water Research*, **2014**, 66, 22-30	12.5	88
134	Ascorbate-Promoted Surface Iron Cycle for Efficient Heterogeneous Fenton Alachlor Degradation with Hematite Nanocrystals. *ACS Applied Materials & Interfaces*, **2017**, 9, 8751-8758	9.5	86
133	Anion (O, N, C, and S) vacancies promoted photocatalytic nitrogen fixation. *Green Chemistry*, **2019**, 21, 2852-2867	10	84
132	New opportunities for efficient N fixation by nanosheet photocatalysts. *Nanoscale*, **2018**, 10, 15429-15435	7.7	83
131	Photocatalytic NO removal on BiOI surface: The change from nonselective oxidation to selective oxidation. *Applied Catalysis B: Environmental*, **2015**, 168-169, 490-496	21.8	76
130	In situ growth of epitaxial lead iodide films composed of hexagonal single crystals. *Journal of Materials Chemistry*, **2005**, 15, 4555		76

129	Liquid Nitrogen Activation of Zero-Valent Iron and Its Enhanced Cr(VI) Removal Performance. *Environmental Science & Technology*, **2019**, 53, 8333-8341	10.3	75
128	Energy-confined solar thermal ammonia synthesis with K/Ru/TiO2-xHx. *Applied Catalysis B: Environmental*, **2018**, 224, 612-620	21.8	75
127	Efficient Visible Light-Driven Photocatalytic Degradation of Pentachlorophenol with Bi2O3/TiO2⊠Bx. *Journal of Physical Chemistry C*, **2012**, 116, 17118-17123	3.8	70
126	Fe@FeO promoted electrochemical mineralization of atrazine via a triazinon ring opening mechanism. *Water Research*, **2017**, 112, 9-18	12.5	65
125	Surface Fe(II)/Fe(III) Cycle Promoted Ultra-Highly Sensitive Electrochemical Sensing of Arsenic(III) with Dumbbell-Like Au/FeO Nanoparticles. *Analytical Chemistry*, **2018**, 90, 4569-4577	7.8	65
124	Facet-dependent contaminant removal properties of hematite nanocrystals and their environmental implications. *Environmental Science: Nano*, **2018**, 5, 1790-1806	7.1	64
123	Ascorbic acid enhanced activation of oxygen by ferrous iron: A case of aerobic degradation of rhodamine B. *Journal of Hazardous Materials*, **2016**, 308, 67-74	12.8	63
122	Visible Light Driven Organic Pollutants Degradation with Hydrothermally Carbonized Sewage Sludge and Oxalate Via Molecular Oxygen Activation. *Environmental Science & Technology*, **2018**, 52, 12656-12666	10.3	58
121	SnO2@C core-shell spheres: synthesis, characterization, and performance in reversible Li-ion storage. *Journal of Materials Science*, **2008**, 43, 2778-2784	4.3	56
120	A highly sensitive photoelectrochemical detection of perfluorooctanic acid with molecularly imprined polymer-functionalized nanoarchitectured hybrid of AgI-BiOI composite. *Biosensors and Bioelectronics*, **2015**, 73, 256-263	11.8	55
119	Ultrasensitive photoelectrochemical determination of chromium(VI) in water samples by ion-imprinted/formate anion-incorporated graphitic carbon nitride nanostructured hybrid. *Journal of Hazardous Materials*, **2016**, 312, 106-113	12.8	53
118	Ascorbic acid promoted magnetite Fenton degradation of alachlor: Mechanistic insights and kinetic modeling. *Applied Catalysis B: Environmental*, **2020**, 267, 118383	21.8	52
117	Enhanced aerobic degradation of 4-chlorophenol with iron-nickel nanoparticles. *Applied Surface Science*, **2017**, 393, 316-324	6.7	50
116	Controlled hydrothermal synthesis and growth mechanism of various nanostructured films of copper and silver tellurides. *Chemistry - A European Journal*, **2006**, 12, 4185-90	4.8	50
115	Insight into the effect of bromine on facet-dependent surface oxygen vacancies construction and stabilization of Bi2MoO6 for efficient photocatalytic NO removal. *Applied Catalysis B: Environmental*, **2020**, 265, 118585	21.8	50
114	Molecularly imprinted ultrathin graphitic carbon nitride nanosheets-Based electrochemiluminescence sensing probe for sensitive detection of perfluorooctanoic acid. *Analytica Chimica Acta*, **2015**, 896, 68-77	6.6	48
113	Beyond the Thermal Equilibrium Limit of Ammonia Synthesis with Dual Temperature Zone Catalyst Powered by Solar Light. *CheM*, **2019**, 5, 2702-2717	16.2	46
112	Interfacial Charging-Decharging Strategy for Efficient and Selective Aerobic NO Oxidation on Oxygen Vacancy. *Environmental Science & Technology*, **2019**, 53, 6964-6971	10.3	44

111	Ferrous tetrapolyphosphate complex induced dioxygen activation for toxic organic pollutants degradation. *Separation and Purification Technology*, **2013**, 120, 148-155	8.3	44
110	Durch Sauerstoff-Leerstellen vermittelte Photokatalyse mit BiOCl: Reaktivität, Selektivität und Ausblick. *Angewandte Chemie*, **2018**, 130, 128-145	3.6	43
109	Anoxic and oxic removal of humic acids with Fe@Fe2O3 core-shell nanowires: a comparative study. *Water Research*, **2014**, 52, 92-100	12.5	43
108	Mn promoted Cr(VI) reduction with oxalic acid: The indispensable role of In-situ generated Mn. *Journal of Hazardous Materials*, **2018**, 343, 356-363	12.8	42
107	Dual-site activation enhanced photocatalytic removal of no with Au/CeO2. *Chemical Engineering Journal*, **2020**, 386, 124047	14.7	40
106	Fabrication of hierarchical porous iron oxide films utilizing the Kirkendall effect. *Chemical Communications*, **2005**, 2683-5	5.8	40
105	Phosphate modification enables high efficiency and electron selectivity of nZVI toward Cr(VI) removal. *Applied Catalysis B: Environmental*, **2020**, 263, 118364	21.8	39
104	Electrochemical Synthesis of Nanostructured Palladium of Different Morphology Directly on Gold Substrate through a Cyclic Deposition/Dissolution Route. *Journal of Physical Chemistry C*, **2009**, 113, 7200-7206	3.8	37
103	Electrospun template directed molecularly imprinted nanofibers incorporated with BiOI nanoflake arrays as photoactive electrode for photoelectrochemical detection of triphenyl phosphate. *Biosensors and Bioelectronics*, **2017**, 92, 61-67	11.8	36
102	Ascorbate Induced Facet Dependent Reductive Dissolution of Hematite Nanocrystals. *Journal of Physical Chemistry C*, **2017**, 121, 1113-1121	3.8	36
101	Adsorption and reduction of roxarsone on magnetic greigite (Fe3S4): Indispensable role of structural sulfide. *Chemical Engineering Journal*, **2017**, 330, 1232-1239	14.7	36
100	Photochemical behavior of ferrihydrite-oxalate system: Interfacial reaction mechanism and charge transfer process. *Water Research*, **2019**, 159, 10-19	12.5	35
99	Visible light promoted Fe3S4 Fenton oxidation of atrazine. *Applied Catalysis B: Environmental*, **2020**, 277, 119229	21.8	35
98	Low temperature synthesis of Bi2O3 solid spheres and their conversion to hierarchical BiOI nests via the Kirkendall effect. *CrystEngComm*, **2011**, 13, 5460	3.3	34
97	Simultaneous Manipulation of Bulk Excitons and Surface Defects for Ultrastable and Highly Selective CO Photoreduction. *Advanced Materials*, **2021**, 33, e2100143	24	34
96	Spin-State-Dependent Peroxymonosulfate Activation of Single-Atom MN Moieties via a Radical-Free Pathway. *ACS Catalysis*, **2021**, 11, 9569-9577	13.1	34
95	Rapid Aerobic Inactivation and Facile Removal of Escherichia coli with Amorphous Zero-Valent Iron Microspheres: Indispensable Roles of Reactive Oxygen Species and Iron Corrosion Products. *Environmental Science & Technology*, **2019**, 53, 3707-3717	10.3	34
94	Hexavalent chromium removal by a new composite system of dissimilatory iron reduction bacteria Aeromonas hydrophila and nanoscale zero-valent iron. *Chemical Engineering Journal*, **2019**, 362, 63-70	14.7	33

93	Enhanced adsorption and photocatalytic degradation of perfluorooctanoic acid in water using iron (hydr)oxides/carbon sphere composite. *Chemical Engineering Journal*, **2020**, 388, 124230	14.7	32
92	Ascorbic acid induced atrazine degradation. *Journal of Hazardous Materials*, **2017**, 327, 71-78	12.8	31
91	Ferrous ions promoted aerobic simazine degradation with Fe@Fe2O3 core–shell nanowires. *Applied Catalysis B: Environmental*, **2014**, 150-151, 1-11	21.8	31
90	Enhanced photocatalytic degradation of perfluorooctanoic acid using carbon-modified bismuth phosphate composite: Effectiveness, material synergy and roles of carbon. *Chemical Engineering Journal*, **2020**, 395, 124991	14.7	29
89	Van Der Waals gap-rich BiOCl atomic layers realizing efficient, pure-water CO-to-CO photocatalysis. *Nature Communications*, **2021**, 12, 5923	17.4	29
88	Surface hydrogen bond network spatially confined BiOCl oxygen vacancy for photocatalysis. *Science Bulletin*, **2020**, 65, 1916-1923	10.6	28
87	Photocatalytic performance of different exposed crystal facets of BiOCl. *Current Opinion in Green and Sustainable Chemistry*, **2017**, 6, 48-56	7.9	27
86	Highly efficient electrochemical conversion of CO2 and NaCl to CO and NaClO. *Green Chemistry*, **2019**, 21, 3256-3262	10	27
85	High-Throughput Signal-On Photoelectrochemical Immunoassay of Lysozyme Based on Hole-Trapping Triggered by Disintegrating Bioconjugates of Dopamine-Grafted Silica Nanospheres. *ACS Sensors*, **2018**, 3, 1480-1488	9.2	27
84	Microstructure-dependent photoelectrochemical and photocatalytic properties of BiOI. *Journal of Nanoparticle Research*, **2012**, 14, 1	2.3	27
83	Pyrite enables persulfate activation for efficient atrazine degradation. *Chemosphere*, **2020**, 244, 125568	8.4	27
82	Extraction of endocrine disrupting phenols with iron-ferric oxide core-shell nanowires on graphene oxide nanosheets, followed by their determination by HPLC. *Mikrochimica Acta*, **2015**, 182, 2503-2511	5.8	26
81	Fenton oxidation of organic contaminants with aquifer sediment activated by ascorbic acid. *Chemical Engineering Journal*, **2018**, 348, 255-262	14.7	26
80	Efficient removal of bromate with core-shell Fe@Fe2O3 nanowires. *Chemical Engineering Journal*, **2017**, 308, 880-888	14.7	26
79	Persulfate activation induced by ascorbic acid for efficient organic pollutants oxidation. *Chemical Engineering Journal*, **2020**, 382, 122355	14.7	26
78	Ascorbate guided conversion of hydrogen peroxide to hydroxyl radical on goethite. *Applied Catalysis B: Environmental*, **2021**, 282, 119558	21.8	26
77	Adjacent single-atom irons boosting molecular oxygen activation on MnO. *Nature Communications*, **2021**, 12, 5422	17.4	26
76	Dechlorination-Hydroxylation of Atrazine to Hydroxyatrazine with Thiosulfate: A Detoxification Strategy in Seconds. *Environmental Science & Technology*, **2019**, 53, 3208-3216	10.3	25

75	Enhanced Cr(VI) removal of zero-valent iron with high proton conductive FeC2O4□2H2O shell. *Chemical Engineering Journal*, **2020**, 389, 124414	14.7	24
74	Magnetic solid-phase extraction followed by high performance liquid chromatography for determination of hexanal and heptanal in human urine. *Analytical Methods*, **2011**, 3, 1418	3.2	24
73	Hydrogen Spillover to Oxygen Vacancy of TiOH/Fe: Breaking the Scaling Relationship of Ammonia Synthesis. *Journal of the American Chemical Society*, **2020**, 142, 17403-17412	16.4	24
72	Boosted photoelectrochemical immunosensing of metronidazole in tablet using coral-like g-CN nanoarchitectures. *Biosensors and Bioelectronics*, **2019**, 123, 7-13	11.8	23
71	Kirkendall Effect Boosts Phosphorylated nZVI for Efficient Heavy Metal Wastewater Treatment. *Angewandte Chemie - International Edition*, **2021**, 60, 17115-17122	16.4	21
70	A one-step acidification strategy for sewage sludge dewatering with oxalic acid. *Chemosphere*, **2020**, 238, 124598	8.4	21
69	Elucidating the Nature of the Cu(I) Active Site in CuO/TiO for Excellent Low-Temperature CO Oxidation. *ACS Applied Materials & Interfaces*, **2020**, 12, 7091-7101	9.5	20
68	Deposition of Prussian blue on nanoporous gold film electrode and its electrocatalytic reduction of H2O2. *Journal of Solid State Electrochemistry*, **2008**, 12, 1567-1571	2.6	20
67	Photothermal reverse-water-gas-shift over Au/CeO2 with high yield and selectivity in CO2 conversion. *Catalysis Communications*, **2019**, 129, 105724	3.2	19
66	Well-defined Co□□OH as □electronic pump□on Co-LDH nanocages for enhanced oxygen evolution reaction. *Applied Catalysis B: Environmental*, **2020**, 269, 118782	21.8	19
65	Disposable photoelectrochemical sensing strip for highly sensitive determination of perfluorooctane sulfonyl fluoride on functionalized screen-printed carbon electrode. *Talanta*, **2018**, 181, 147-153	6.2	19
64	C,N-Codoped InOOH microspheres: one-pot synthesis, growth mechanism and visible light photocatalysis. *CrystEngComm*, **2013**, 15, 721-728	3.3	19
63	Solar-driven efficient methane catalytic oxidation over epitaxial ZnO/La0.8Sr0.2CoO3 heterojunctions. *Applied Catalysis B: Environmental*, **2020**, 265, 118469	21.8	19
62	Surface structure-dependent photocatalytic O activation for pollutant removal with bismuth oxyhalides. *Chemical Communications*, **2020**, 56, 15282-15296	5.8	19
61	Sulfur vacancy promoted peroxidase-like activity of magnetic greigite (FeS) for colorimetric detection of serum glucose. *Analytica Chimica Acta*, **2020**, 1127, 246-255	6.6	19
60	Sulfite promoted photochemical cleavage of s-triazine ring: The case study of atrazine. *Chemical Engineering Journal*, **2017**, 330, 1075-1081	14.7	18
59	Simulated solar light driven roxarsone degradation and arsenic immobilization with hematite and oxalate. *Chemical Engineering Journal*, **2020**, 384, 123254	14.7	18
58	The surface hydroxyl and oxygen vacancy dependent Cr(VI) adsorption performance of BiOCl. *Environmental Science: Nano*, **2020**, 7, 1454-1463	7.1	17

57	Atomic-Scale Tuning of Graphene/Cubic SiC Schottky Junction for Stable Low-Bias Photoelectrochemical Solar-to-Fuel Conversion. *ACS Nano*, **2020**, 14, 4905-4915	16.7	17
56	Nitrogen dioxide radicals mediated mineralization of perfluorooctanoic acid in aqueous nitrate solution with UV irradiation. *Chemosphere*, **2017**, 188, 367-374	8.4	17
55	One-pot template-free synthesis, formation mechanism, and lithium ions storage property of hollow SnO2 microspheres. *Journal of Solid State Electrochemistry*, **2010**, 14, 931-936	2.6	17
54	Structural dependent Cr(VI) adsorption and reduction of biochar: hydrochar versus pyrochar. *Science of the Total Environment*, **2021**, 783, 147084	10.2	17
53	Molecular O Activation over Cu(I)-Mediated C?N Bond for Low-Temperature CO Oxidation. *ACS Applied Materials & Interfaces*, **2018**, 10, 17167-17174	9.5	16
52	Amorphization enables highly efficient anaerobic thiamphenicol reduction by zero-valent iron. *Applied Catalysis B: Environmental*, **2020**, 264, 118550	21.8	16
51	Ni(II) induced aerobic ring opening degradation of atrazine with core-shell Fe@Fe2O3 nanowires. *Chemical Engineering Journal*, **2018**, 335, 720-727	14.7	16
50	Molecular-scale structures of uranyl surface complexes on hematite facets. *Environmental Science: Nano*, **2019**, 6, 892-903	7.1	15
49	Rare earth La single atoms supported MoO3-x for efficient photocatalytic nitrogen fixation. *Applied Catalysis B: Environmental*, **2022**, 301, 120766	21.8	14
48	Simulated solar light driven Fe(III)/Fe(II) redox cycle for roxarsone degradation and simultaneous arsenate immobilization. *Journal of Hazardous Materials*, **2020**, 394, 121635	12.8	14
47	Rapid photochemical decomposition of perfluorooctanoic acid mediated by a comprehensive effect of nitrogen dioxide radicals and Fe/Fe redox cycle. *Journal of Hazardous Materials*, **2020**, 388, 121730	12.8	14
46	Diffusion-Controlled Z-Scheme-Steered Charge Separation across PDI/BiOI Heterointerface for Ultraviolet, Visible, and Infrared Light-Driven Photocatalysis. *Advanced Functional Materials*, **2021**, 31, 2102315	15.6	14
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