zhenhua Pan

List of Publications by Year
in descending order

39	3,548	304368 22	329751 37
papers	citations	h-index	g-index

39	39	39	4210
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Scalable water splitting on particulate photocatalyst sheets with a solar-to-hydrogen energy conversion efficiency exceeding 1%. Nature Materials, 2016, 15, 611-615.	13.3	1,311
2	Oxysulfide photocatalyst for visible-light-driven overall water splitting. Nature Materials, 2019, 18, 827-832.	13.3	422
3	Particulate Photocatalyst Sheets Based on Carbon Conductor Layer for Efficient Z-Scheme Pure-Water Splitting at Ambient Pressure. Journal of the American Chemical Society, 2017, 139, 1675-1683.	6.6	322
4	Spatially separating redox centers on 2D carbon nitride with cobalt single atom for photocatalytic H ₂ O ₂ production. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 6376-6382.	3.3	245
5	Electrochemical and Photoelectrochemical Water Oxidation for Hydrogen Peroxide Production. Angewandte Chemie - International Edition, 2021, 60, 10469-10480.	7.2	152
6	Sequential cocatalyst decoration on BaTaO2N towards highly-active Z-scheme water splitting. Nature Communications, 2021, 12, 1005.	5.8	124
7	Overall photosynthesis of H2O2 by an inorganic semiconductor. Nature Communications, 2022, 13, 1034.	5.8	105
8	Surface Modifications of (ZnSe)_{0.5}(CuGa_{2.5}Se_{4.25})_{0.5} to Promote Photocatalytic Z-Scheme Overall Water Splitting. Journal of the American Chemical Society, 2021, 143, 10633-10641.	6.6	88
9	Electronic Tuning of Metal Nanoparticles for Highly Efficient Photocatalytic Hydrogen Peroxide Production. ACS Catalysis, 2019, 9, 626-631.	5.5	84
10	Photocatalyst Sheets Composed of Particulate LaMg_{1/3}Ta_{2/3}O₂N and Mo-Doped BiVO₄ for Z-Scheme Water Splitting under Visible Light. ACS Catalysis, 2016, 6, 7188-7196.	5.5	79
11	Metal selenide photocatalysts for visible-light-driven <i>Z</i>-scheme pure water splitting. Journal of Materials Chemistry A, 2019, 7, 7415-7422.	5.2	67
12	Photoreduced Graphene Oxide as a Conductive Binder to Improve the Water Splitting Activity of Photocatalyst Sheets. Advanced Functional Materials, 2016, 26, 7011-7019.	7.8	62
13	Simultaneously Tuning the Defects and Surface Properties of Ta₃N₅ Nanoparticles by Mgâ€“Zr Codoping for Significantly Accelerated Photocatalytic H₂ Evolution. Journal of the American Chemical Society, 2021, 143, 10059-10064.	6.6	62
14	Charge Separation in Photocatalysts: Mechanisms, Physical Parameters, and Design Principles. ACS Energy Letters, 2022, 7, 432-452.	8.8	41
15	Application of LaMg1/3Ta2/3O2N as a hydrogen evolution photocatalyst of a photocatalyst sheet for Z-scheme water splitting. Applied Catalysis A: General, 2016, 521, 26-33.	2.2	36
16	Preparation and characterization of ZrO2/TiO2 composite photocatalytic film by micro-arc oxidation. Transactions of Nonferrous Metals Society of China, 2013, 23, 2945-2950.	1.7	32
17	Elucidating charge separation in particulate photocatalysts using nearly intrinsic semiconductors with small asymmetric band bending. Sustainable Energy and Fuels, 2019, 3, 850-864.	2.5	30
18	Cathodic Hydrogen Peroxide Electrosynthesis Using Anthraquinone Modified Carbon Nitride on Gas Diffusion Electrode. ACS Applied Energy Materials, 2019, 2, 7972-7979.	2.5	30

#	Article	IF	Citations
19	Metal-organic frameworks derived cobalt encapsulated in porous nitrogen-doped carbon nanostructure towards highly efficient and durable oxygen reduction reaction electrocatalysis. Journal of Power Sources, 2020, 451, 227747.	4.0	30
20	Tunable nano-interfaces between MnO_x and layered double hydroxides boost oxygen evolving electrocatalysis. Journal of Materials Chemistry A, 2018, 6, 21918-21926.	5.2	29
21	Mutually-dependent kinetics and energetics of photocatalyst/co-catalyst/two-redox liquid junctions. Energy and Environmental Science, 2020, 13, 162-173.	15.6	29
22	Stable Water Oxidation in Acid Using Manganese-Modified TiO₂ Protective Coatings. ACS Applied Materials & Interfaces, 2018, 10, 18805-18815.	4.0	24
23	Metal selenides for photocatalytic Z-scheme pure water splitting mediated by reduced graphene oxide. Chinese Journal of Catalysis, 2019, 40, 1668-1672.	6.9	21
24	Synthesis of Y2Ti2O5S2 by thermal sulfidation for photocatalytic water oxidation and reduction under visible light irradiation. Research on Chemical Intermediates, 2021, 47, 225-234.	1.3	19
25	Cocatalyst engineering of a narrow bandgap Ga-La₅Ti₂Cu_{0.9}Ag_{0.1}O₇S₅ photocatalyst towards effectively enhanced water splitting. Journal of Materials Chemistry A, 2021, 9, 27485-27492.	5.2	16
26	A Novel Way to Prepare Visibleâ€Lightâ€Responsive <scp>WO</scp>₃/<scp>T</scp>i<scp>O</scp>₂ Composite Film with High Porosity. International Journal of Applied Ceramic Technology, 2014, 11, 254-262.	1.1	13
27	Hydrogen evolution activity tuning <i>via</i> two-dimensional electron accumulation at buried interfaces. Journal of Materials Chemistry A, 2019, 7, 20696-20705.	5.2	11
28	IIIâ€"V Semiconductor Photoelectrodes. Semiconductors and Semimetals, 2017, 97, 81-138.	0.4	10
29	Synthesis of a Ga-doped La5Ti2Cu0.9Ag0.1O7S5 photocatalyst by thermal sulfidation for hydrogen evolution under visible light. Journal of Catalysis, 2021, 399, 230-236.	3.1	10
30	Hematite photoanodes prepared by particle transfer for photoelectrochemical water splitting. Sustainable Energy and Fuels, 2022, 6, 2067-2074.	2.5	9
31	Tailoring the morphology of hafnium zirconium oxide (Hf_{0.6}Zr_{0.4}O<scp>₂</scp>) as a cocatalyst for photoelectrochemical water oxidation over a hematite (<scp>Î±â€Fe₂O₃</scp>) photoanode. Bulletin of the Korean Chemical Society, 2022, 43, 876-881.	1.0	9
32	Preparation of narrow band gap V2O5/TiO2 composite films by micro-arc oxidation. International Journal of Minerals, Metallurgy and Materials, 2012, 19, 1045-1051.	2.4	7
33	BiVO₄-Dotted WO₃ Photoanode with an Inverse Opal Underlayer for Photoelectrochemical Water Splitting. ACS Applied Energy Materials, 2022, 5, 5750-5755.	2.5	7
34	Photocatalytic Ozonation of Oxalic Acid Over Cu(II)-Grafted TiO₂ Under Visible Light Irradiation. Synthesis and Reactivity in Inorganic, Metal Organic, and Nano Metal Chemistry, 2015, 45, 447-450.	0.6	5
35	Mechanism and kinetics of Hâ€acid degradation in TiO₂/O₃/UV process. Canadian Journal of Chemical Engineering, 2014, 92, 851-860.	0.9	4
36	Electrochemical and Photoelectrochemical Water Oxidation for Hydrogen Peroxide Production. Angewandte Chemie, 2021, 133, 10561-10572.	1.6	2

#	Article	IF	Citations
37	Microscopic Interfacial Charge Transfer at Perovskite/Hole Transport Layer Interfaces Clarified Using Pattern-Illumination Time-Resolved Phase Microscopy. Journal of Physical Chemistry C, 2022, 126, 7548-7555.	1.5	1
38	Physical properties and photocatalytic activity of pulverized Ga-doped La5Ti2Cu0.9Ag0.1O7S5 powder. Materials Letters, 2022, 319, 132290.	1.3	0
39	Local charge carrier dynamics of a particulate Ga-doped La₅Ti₂Cu_{0.9}Ag_{0.1}O₇S₅ photocatalyst and the impact of Rh cocatalysts. Physical Chemistry Chemical Physics, 0, , .	1.3	0