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Origin of photocatalytic activity of nitrogen-doped TiO₂ nanobelts

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1038	On the origin of the visible-light activity of titanium dioxide doped with carbonate species. 2010 , 11, 3269-72		10
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1036	Synthesis and characterization of La ₂ O ₃ /TiO ₂ -x% and the visible light photocatalytic oxidation of 4-chlorophenol. 2010 , 178, 440-9		33
1035	Sol-gel nanoparticulate mesoporous films with enhanced self-cleaning properties. 2010 , 216, 142-148		24
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1033	Halogen element modified titanium dioxide for visible light photocatalysis. 2010 , 162, 437-447		131
1032	Facile synthesis of mesoporous N doped zirconium titanium mixed oxide nanomaterial with enhanced photocatalytic activity under visible light. 2010 , 20, 10876		20

1031	Analysis of Ga coordination environment in novel spinel zinc gallium oxy-nitride photocatalysts. 2010 , 20, 9787	24
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1029	Tuning the Charge-Transfer Property of PbS-Quantum Dot/TiO ₂ -Nanobelt Nanohybrids via Quantum Confinement. 2010 , 1, 1030-1035	117
1028	Unique electronic structure induced high photoreactivity of sulfur-doped graphitic C ₃ N ₄ . <i>Journal of the American Chemical Society</i> , 2010 , 132, 11642-8	16.4 1597
1027	Visible-light-driven reversible and switchable hydrophobic to hydrophilic nitrogen-doped titania surfaces: correlation with photocatalysis. 2010 , 2, 2257-61	61
1026	A critical evaluation of the mode of incorporation of nitrogen in doped anatase photocatalysts. 2010 , 12, 960-9	48
1025	Enhancement of ethanol vapor sensing of TiO ₂ nanobelts by surface engineering. 2010 , 2, 3263-9	171
1024	Ag ₂ O/TiO ₂ nanobelts heterostructure with enhanced ultraviolet and visible photocatalytic activity. 2010 , 2, 2385-92	444
1023	Insights into the roles of organic coating in tuning the defect chemistry of monodisperse TiO(2) nanocrystals for tailored properties. 2010 , 12, 10857-64	27
1022	Are dopant-stabilized visible light-responsive photocatalysts efficient and stable?. 2010 , 12, 14677-81	9
1021	Synthesis and visible light photoactivity of a high temperature stable yellow TiO ₂ photocatalyst. 2010 , 20, 8700	27
1020	Titanium, zirconium, hafnium. 2010 , 106, 155	
1019	Achieving maximum photo-oxidation reactivity of Cs _{0.68} Ti _{1.83} O _{4-x} N _x photocatalysts through valence band fine-tuning. 2011 , 1, 222	26
1018	Nano-p π junctions on surface-coarsened TiO ₂ nanobelts with enhanced photocatalytic activity. 2011 , 21, 5106	106
1017	One-pot synthesis of BiSbO ₄ nanophotocatalyst with enhanced visible-light performance. 2011 , 13, 3920	15
1016	Phase transformation of TiO ₂ nanobelts and TiO ₂ (B)/anatase interface heterostructure nanobelts with enhanced photocatalytic activity. 2011 , 13, 6643	101
1015	The effect of electronegative difference on the electronic structure and visible light photocatalytic activity of N-doped anatase TiO ₂ by first-principles calculations. 2011 , 98, 162107	33
1014	Electrochemical Deposition of Eu ³⁺ -Doped CeO ₂ Nanobelts with Enhanced Optical Properties. 2011 , 115, 351-356	96

1013	Boron Environments in B-Doped and (B, N)-Codoped TiO ₂ Photocatalysts: A Combined Solid-State NMR and Theoretical Calculation Study. 2011 , 115, 2709-2719	148
1012	Nitrogen-doped anatase nanofibers decorated with noble metal nanoparticles for photocatalytic production of hydrogen. 2011 , 5, 5025-30	123
1011	Nanoheterostructures on TiO ₂ nanobelts achieved by acid hydrothermal method with enhanced photocatalytic and gas sensitive performance. 2011 , 21, 7937	138
1010	SnO _x /ZnGa ₂ O ₄ Photocatalysts with Enhanced Visible Light Activity. 2011 , 1, 923-928	48
1009	Origin of the Enhanced Visible-Light Absorption in N-Doped Bulk Anatase TiO ₂ from First-Principles Calculations. 2011 , 115, 19394-19404	86
1008	Fabrication of a visible-light response mesoporous TiO ₂ membrane with superior water permeability via a weak alkaline sol-gel process. 2011 , 47, 3457-9	24
1007	Porous TiO ₂ with a controllable bimodal pore size distribution from natural ilmenite. 2011 , 13, 1322-1327	17
1006	F-Doped Co ₃ O ₄ photocatalysts for sustainable H ₂ generation from water/ethanol. <i>Journal of the American Chemical Society</i> , 2011 , 133, 19362-5	16.4 149
1005	Antimicrobial effects of TiO(2) and Ag(2)O nanoparticles against drug-resistant bacteria and leishmania parasites. 2011 , 6, 933-40	260
1004	Nitrogen self-doped nanosized TiO ₂ sheets with exposed {001} facets for enhanced visible-light photocatalytic activity. 2011 , 47, 6906-8	319
1003	Nitrogen/Palladium-Codoped TiO ₂ for Efficient Visible Light Photocatalytic Dye Degradation. 2011 , 115, 22110-22120	202
1002	Effects of H-, N-, and (H, N)-Doping on the Photocatalytic Activity of TiO ₂ . 2011 , 115, 12224-12231	132
1001	Visible-light-response iodine-doped titanium dioxide nanocrystals for dye-sensitized solar cells. 2011 , 21, 3877	69
1000	Room temperature ferromagnetism in N-doped rutile TiO ₂ films. 2011 , 109, 07C302	44
999	Facet effect of single-crystalline Ag ₃ PO ₄ sub-microcrystals on photocatalytic properties. <i>Journal of the American Chemical Society</i> , 2011 , 133, 6490-2	16.4 1156
998	Visible-light-derived photocatalyst based on TiO(2)-N with a tubular structure. 2011 , 50, 9948-57	13
997	Preparation of visible light responsive N doped TiO ₂ via a reduction/oxidation procedure by nonthermal plasma treatment. 2011 , 258, 1249-1255	13
996	Enhanced Photocatalytic Activity in ZnGa ₂ O ₃ Nanobelts. 2011 , 94, 3117-3122	52

995	Structures and properties of titania thin films annealed under different atmosphere. 2011 , 520, 1379-1384	34
994	Enhanced photocatalytic activity of Bi ₂ WO ₆ with oxygen vacancies by zirconium doping. 2011 , 196, 255-62	135
993	Cu-doped TiO ₂ nanoparticles enhance survival of <i>Shewanella oneidensis</i> MR-1 under ultraviolet light (UV) exposure. 2011 , 409, 4635-9	29
992	Preparation, characterization and photocatalytic activity of N-doped NaTaO ₃ nanocubes. 2011 , 214, 155-160	29
991	Surfactant-assisted hydrothermal fabrication and visible-light-driven photocatalytic degradation of methylene blue over multiple morphological BiVO ₄ single-crystallites. 2011 , 125, 59-65	102
990	Photoelectrochemical and photocatalytic properties of N+S co-doped TiO ₂ nanotube array films under visible light irradiation. 2011 , 129, 553-557	80
989	Nitrogen-doped transparent tin oxide thin films deposited by sputtering. 2011 , 11, S139-S142	9
988	Nitrogen doping into titanium dioxide by the sol-gel method using nitric acid. 2011 , 37, 869-881	13
987	Optical performance evolutions of reductive glutathione coated CdSe quantum dots in different environments. 2011 , 13, 1301-1309	10
986	Advances and applications in the FIREBALL ab initio tight-binding molecular-dynamics formalism. 2011 , 248, 1989-2007	169
985	A Highly Active Titanium Dioxide Based Visible-Light Photocatalyst with Nonmetal Doping and Plasmonic Metal Decoration. 2011 , 123, 7226-7230	113
984	A highly active titanium dioxide based visible-light photocatalyst with nonmetal doping and plasmonic metal decoration. 2011 , 50, 7088-92	263
983	Structure analysis and photocatalytic properties of spinel zinc gallium oxonitrides. 2011 , 17, 12417-28	12
982	Preparation and visible light photocatalytic activity of mesoporous N, S-codoped TiO ₂ (B) nanobelts. 2011 , 257, 3652-3656	28
981	Origin of reactivity diversity of lattice oxygen in titanates. 2011 , 511, 82-86	11
980	Effect of nitrogen-doping temperature on the structure and photocatalytic activity of the B,N-doped TiO ₂ . 2011 , 184, 134-140	45
979	Enhanced visible light photocatalytic activity of novel Pt/C-doped TiO ₂ /PtCl ₄ three-component nanojunction system for degradation of toluene in air. 2011 , 187, 509-16	76
978	Bandgap tailoring of rutile TiO ₂ (110) via surface patterning with electron cyclotron resonance sputtering. 2011 , 98, 053105	27

977	Nitrogen-Doped TiO ₂ Photocatalyst Prepared by Mechanochemical Method: Doping Mechanisms and Visible Photoactivity of Pollutant Degradation. 2012 , 2012, 1-10	10
976	Enhanced Photoactivity of Fe + N Codoped Anatase-Rutile TiO ₂ Nanowire Film under Visible Light Irradiation. 2012 , 2012, 1-8	6
975	Hydrothermal Synthesis of Phthalocyanine Sensitization TiO ₂ Nanowires. 2012 , 531, 387-390	3
974	Preparation and Characterization of I ₂ Sensitized Nanoporous TiO ₂ with Enhanced Photocatalytic Activity under Visible-Light Irradiation. 2012 , 2012, 1-8	
973	Nitrogen Incorporation in TiO ₂ : Does It Make a Visible Light Photo-Active Material?. 2012 , 2012, 1-10	83
972	Engineering light: advances in wavelength conversion materials for energy and environmental technologies. 2012 , 46, 12316-28	66
971	Synthesis, Characterization, Electronic Structure, and Photocatalytic Behavior of CuGaO ₂ and CuGa _{1-x} Fe _x O ₂ (x = 0.05, 0.10, 0.15, 0.20) Delafossites. 2012 , 116, 1865-1872	87
970	Reduced graphene oxide/titanium dioxide composites for supercapacitor electrodes: shape and coupling effects. 2012 , 22, 19161	160
969	Fluorine ions-mediated morphology control of anatase TiO ₂ with enhanced photocatalytic activity. 2012 , 14, 5349-62	190
968	Enhanced Photothermocatalytic Synergetic Activity Toward Gaseous Benzene for Mo+C-Codoped Titanate Nanobelts. 2012 , 2, 2557-2565	39
967	Photocatalytic degradation of methyl orange over nitrogen-fluorine codoped TiO ₂ nanobelts prepared by solvothermal synthesis. 2012 , 4, 6816-26	100
966	Synthesis of ultrafine titanium dioxide nanowires using hydrothermal method. 2012 , 47, 3124-3128	25
965	Nitrogen-doped titanate-anatase core-shell nanobelts with exposed {101} anatase facets and enhanced visible light photocatalytic activity. <i>Journal of the American Chemical Society</i> , 2012 , 134, 5754-7	16.4 284
964	TiO ₂ synthesis inspired by biomineralization: control of morphology, crystal phase, and light-use efficiency in a single process. <i>Journal of the American Chemical Society</i> , 2012 , 134, 8841-7	16.4 98
963	A sonochemical route to fabricate the novel porous F, Ce-codoped TiO ₂ photocatalyst with efficient photocatalytic performance. 2012 , 19, 903-911	23
962	Synthesis of Mn-intercalated layered titanate by exfoliation-flocculation approach and its efficient photocatalytic activity under visible light. 2012 , 196, 282-287	16
961	Fabrication and Photocatalytic Activity of Highly Crystalline Nitrogen Doped Mesoporous TiO ₂ . 2012 , 33, 1665-1671	15
960	Photoelectrochemical performance enhanced by a nickel oxide-hematite p-n junction photoanode. 2012 , 48, 8213-5	179

959	Sunlight active antibacterial nanostructured N-doped TiO ₂ thin films synthesized by an ultrasonic spray pyrolysis technique. 2012 , 2, 10639	14
958	Chemical vapor deposition of a PbSe/CdS/nitrogen-doped TiO ₂ nanorod array photoelectrode and its band-edge level structure. 2012 , 36, 2302	7
957	Structure, reactivity, photoactivity and stability of Ti-O based materials: a theoretical comparison. 2012 , 14, 2333-8	40
956	Visible-light photocatalytic SiO ₂ /TiO ₂ -Cx/C nanoporous composites using TiCl ₄ as the precursor for TiO ₂ and polyhydroxyl tannin as the carbon source. 2012 , 2, 390-399	15
955	Laser Synthesis and Characterization of Nitrogen-Doped TiO ₂ Vertically Aligned Columnar Array Photocatalysts. 2012 , 116, 14534-14540	17
954	Carbon-modified BiVO ₄ microtubes embedded with Ag nanoparticles have high photocatalytic activity under visible light. 2012 , 4, 7501-8	75
953	A review on the visible light active titanium dioxide photocatalysts for environmental applications. 2012 , 125, 331-349	2848
952	Hierarchical TiO ₂ /CdS "spindle-like" composite with high photodegradation and antibacterial capability under visible light irradiation. 2012 , 229-230, 209-16	79
951	Photocatalytic water splitting by band-gap engineering of solid solution Bi _{1-x} Dy _x VO ₄ and Bi _{0.5} M _{0.5} VO ₄ (M=La, Sm, Nd, Gd, Eu, Y). 2012 , 522, 19-24	30
950	Effects of nitrogen concentration on N-doped anatase TiO ₂ : Density functional theory and Hubbard U analysis. 2012 , 522, 46-50	32
949	Nitrogen doped TiO ₂ nanoparticles decorated on graphene sheets for photocatalysis applications. 2012 , 12, 1485-1492	74
948	Band gap engineering of compensated (N, H) and (C, 2H) codoped anatase TiO ₂ : A first-principles calculation. 2012 , 539-540, 175-179	26
947	Giant Enhancement of Near-Ultraviolet Light Absorption by TiO ₂ via a Three-Dimensional Aluminum Plasmonic Nano Funnel-Antenna. 2012 , 116, 21547-21555	14
946	Study of the Electronic Structure and Magnetic Properties of Fe ₂ O ₃ by First-Principles Calculation and Molecular Orbital Calculations. 2012 , 116, 8688-8691	37
945	UV-visible-light-activated photocatalysts based on Bi ₂ O ₃ /Bi ₄ Ti ₃ O ₁₂ /TiO ₂ double-heterostructured TiO ₂ nanobelts. 2012 , 22, 23395	47
944	Enhanced Field Emission Properties of Electrochemically Synthesized Self-Aligned Nitrogen-Doped TiO ₂ Nanotube Array Thin Films. 2012 , 116, 16740-16746	45
943	A red anatase TiO ₂ photocatalyst for solar energy conversion. 2012 , 5, 9603	332
942	Facet-dependent activity of bismuth sulfide as low-cost counter-electrode materials for dye-sensitized solar cells. 2012 , 22, 18572	40

941	Origin of visible-light activity of N-doped TiO ₂ photocatalyst: Behaviors of N and S atoms in a wet N-doping process. 2012 , 128, 77-83		45
940	Delaminated sodium titanate nanobelts in synergy with cationic polyacrylamide to induce flocculation on kaolin clay. 2012 , 414, 9-16		8
939	Synthesis and characterization of activated carbon-coated SiO ₂ /TiO ₂ -x nanoporous composites with high adsorption capability and visible light photocatalytic activity. 2012 , 135, 579-586		19
938	Spectroscopic evidence of NO _x formation and band-gap narrowing in N-doped TiO ₂ films grown by pulsed magnetron sputtering. 2012 , 136, 729-736		14
937	Electrochemically synthesized visible light absorbing vertically aligned N-doped TiO ₂ nanotube array films. 2012 , 47, 4491-4497		26
936	Enhanced photocatalytic performance of titania nanotubes modified with sulfuric acid. 2012 , 363-364, 423-429		14
935	Tungsten Oxide Clathrates for Water Oxidation: A First Principles Study. 2012 , 24, 4252-4260		31
934	Highly efficient visible-light-driven plasmonic photocatalysts based on graphene oxide-hybridized one-dimensional Ag/AgCl heteroarchitectures. 2012 , 22, 21487		92
933	Synthesis and characterization of nitrogen-doped titanium dioxide nanomaterials derived from nanotube sodium titanate precursor. 2012 , 27, 2408-2416		17
932	Hierarchical TiO ₂ /Bi nanowire architecture with photoelectrochemical activity under visible light illumination. 2012 , 5, 7918		57
931	Photocatalysis by Nanostructured TiO ₂ -based Semiconductors. 2012 , 89		1
930	Water oxidation on N-Doped TiO ₂ nanotube arrays. 2012 , 112, 2585-2590		9
929	Visible light driven photoelectrochemical water oxidation on nitrogen-modified TiO ₂ nanowires. 2012 , 12, 26-32		464
928	Improved photovoltaic performance of dye-sensitized solar cells with modified self-assembling highly ordered mesoporous TiO ₂ photoanodes. 2012 , 22, 11711		33
927	Selective photoreduction of nitric oxide to nitrogen by nanostructured TiO ₂ photocatalysts: role of oxygen vacancies and iron dopant. <i>Journal of the American Chemical Society</i> , 2012 , 134, 9369-75	16.4	194
926	Enhancing visible light photo-oxidation of water with TiO ₂ nanowire arrays via cotreatment with H ₂ and NH ₃ : synergistic effects between Ti ³⁺ and N. <i>Journal of the American Chemical Society</i> , 2012 , 134, 3659-62	16.4	536
925	Synthesis and study of plasmon-induced carrier behavior at Ag/TiO ₂ nanowires. 2012 , 18, 8508-14		50
924	Probing the electronic structure and photoactivation process of nitrogen-doped TiO ₂ using DRS, PL, and EPR. 2012 , 13, 1542-50		25

923	One-step hydrothermal synthesis of N-doped TiO ₂ /C nanocomposites with high visible light photocatalytic activity. 2012 , 4, 576-84	290
922	Application of in situ measurement of photo-induced variations in electron work function for in-depth understanding of the photocatalytic activity of TiO ₂ nanotubes. 2012 , 23, 275704	7
921	Effective photocatalytic properties of N doped Titanium dioxide nanotube arrays prepared by anodization. 2012 , 106, 341-353	16
920	Visible light photocatalytic activity of nitrogen-doped La ₂ Ti ₂ O ₇ nanosheets originating from band gap narrowing. 2012 , 5, 213-221	173
919	Photocatalytic degradation on Disperse Blue with modified nano-TiO ₂ film electrode. 2012 , 16, 1429-1445	7
918	Origin of significant visible-light absorption properties of Mn-doped TiO ₂ thin films. 2012 , 60, 1974-1985	49
917	Sonochemical synthesis and characterization of Cl-doped TiO ₂ and its application in the photodegradation of phthalate ester under visible light irradiation. 2012 , 189-190, 288-294	64
916	The photo-catalytic activities of neodymium and fluorine doped TiO ₂ nanoparticles. 2012 , 38, 4791-4796	26
915	Controlling the synergistic effect of oxygen vacancies and N dopants to enhance photocatalytic activity of N-doped TiO ₂ by H ₂ reduction. 2012 , 425-426, 117-124	69
914	Synthesis of porous platinum-ion-doped titanium dioxide and the photocatalytic degradation of 4-chlorophenol under visible light irradiation. 2012 , 121-122, 148-153	32
913	Controllable synthesis of hexagonal and orthorhombic YFeO ₃ and their visible-light photocatalytic activities. 2012 , 81, 1-4	65
912	Microwave-assisted rapid synthesis of anatase TiO ₂ nanocrystals with exposed {001} facets. 2012 , 356, 137-143	41
911	The influence of the oxidation degree of poly(3-hexylthiophene) on the photocatalytic activity of poly(3-hexylthiophene)/TiO ₂ composites. 2012 , 96, 286-291	47
910	Hierarchical nitrogen doped bismuth niobate architectures: controllable synthesis and excellent photocatalytic activity. 2012 , 217-218, 177-86	52
909	Photocatalytic hydrogen generation enhanced by band gap narrowing and improved charge carrier mobility in AgTaO ₃ by compensated co-doping. 2013 , 15, 16220-6	46
908	Experimental and statistical analysis of surface charge, aggregation and adsorption behaviors of surface-functionalized titanium dioxide nanoparticles in aquatic system. 2013 , 15, 1	17
907	Visible-light photocatalytic, solar thermal and photoelectrochemical properties of aluminium-reduced black titania. 2013 , 6, 3007	543
906	Unexpected catalytic performance in silent tantalum oxide through nitridation and defect chemistry. <i>Journal of the American Chemical Society</i> , 2013 , 135, 11433-6	16.4 71

905	Enhanced Sunlight Photocatalytic Performance of Hafnium Doped ZnO Nanoparticles for Methylene Blue Degradation. 2013 , 145, 108-114	13
904	Catalysis in Fuel Cells and Hydrogen Production. 2013 , 217-270	10
903	Gold Nanorod-Enhanced Light Absorption and Photoelectrochemical Performance of Fe_2O_3 Thin-Film Electrode for Solar Water Splitting. 2013 , 117, 22060-22068	55
902	Comparison of the killing effects between nitrogen-doped and pure TiO_2 on HeLa cells with visible light irradiation. 2013 , 8, 96	22
901	Hybrid BiOBr-TiO_2 nanocomposites with high visible light photocatalytic activity for water treatment. 2013 , 263 Pt 2, 650-8	124
900	Facile fabrication of N-doped TiO_2 nanocatalyst with superior performance under visible light irradiation. 2013 , 199, 280-286	21
899	Cu-doped TiO_2 nanoparticles/graphene composites for efficient visible-light photocatalysis. 2013 , 39, 7107-7113	87
898	Facile synthesis and enhanced photocatalytic properties of truncated bipyramid-shaped anatase TiO_2 nanocrystals. 2013 , 102-103, 53-55	2
897	Influence of visible-light irradiation on physicochemical and photocatalytic properties of nitrogen-doped three-dimensional (3D) titanium dioxide. 2013 , 258-259, 10-8	25
896	Plasmon-induced photonic and energy-transfer enhancement of solar water splitting by a hematite nanorod array. 2013 , 4, 2651	357
895	Yellow-colored mesoporous pure titania and its high stability in visible light photocatalysis. 2013 , 245, 227-232	14
894	Room temperature ferromagnetism in defective TiO_2 nanoparticles: Role of surface and grain boundary oxygen vacancies. 2013 , 114, 203906	90
893	A novel approach for the preparation of phase-tunable TiO_2 nanocomposite crystals with superior visible-light-driven photocatalytic activity. 2013 , 34, 1216-1223	15
892	Electrochemical reduction induced self-doping of Ti^{3+} for efficient water splitting performance on TiO_2 based photoelectrodes. 2013 , 15, 15637-44	150
891	Synthesis and characterization of P-doped TiO_2 thin-films for photocatalytic degradation of butyl benzyl phthalate under visible-light irradiation. 2013 , 34, 1267-1273	61
890	Use of co-spray pyrolysis for synthesizing nitrogen-doped TiO_2 films. 2013 , 36, 827-831	1
889	Tuning the Fermi Level and the Kinetics of Surface States of TiO_2 Nanorods by Means of Ammonia Treatments. 2013 , 117, 20517-20524	53
888	Surface chemical analysis on the carbon-doped mesoporous TiO_2 photocatalysts after post-thermal treatment: XPS and FTIR characterization. 2013 , 74, 924-928	75

887	Efficient visible-light induced photocatalysis on nanoporous nitrogen-doped titanium dioxide catalysts. 2013 , 228, 756-764	48
886	Analysis of visible-light-active Sn(II)-TiO ₂ photocatalysts. 2013 , 15, 6185-9	11
885	Photocatalytic generation of hydrogen with visible-light nitrogen-doped lanthanum titanium oxides. 2013 , 199, 48-52	81
884	Preparation of highly efficient Al-doped ZnO photocatalyst by combustion synthesis. 2013 , 13, 697-704	240
883	Graphene modified Nd/TiO ₂ photocatalyst for methyl orange degradation under visible light irradiation. 2013 , 39, 3569-3575	56
882	Theoretical approaches to excited-state-related phenomena in oxide surfaces. 2013 , 113, 4456-95	69
881	Synthesis of few-layer MoS ₂ nanosheet-coated TiO ₂ nanobelt heterostructures for enhanced photocatalytic activities. 2013 , 9, 140-7	1059
880	Investigation of the photoactivity of pristine and mixed phase N-doped titania under visible and solar irradiation. 2013 , 83, 145-151	4
879	Enhanced photocatalytic degradation of methyl orange in TiO ₂ (B)@anatase heterostructure nanocomposites prepared by a facile hydrothermal method. 2013 , 112, 173-176	13
878	Hydrothermal fabrication of Ti ³⁺ self-doped TiO ₂ nanorods with high visible light photocatalytic activity. 2013 , 112, 145-148	8
877	Low-temperature synthesis of anatase C-N-TiO ₂ photocatalyst with enhanced visible-light-induced photocatalytic activity. 2013 , 271, 357-361	10
876	SiO ₂ @Ag@BiO ₂ @TiO ₂ multi-shell structures: plasmon enhanced photocatalysts with wide-spectral-response. 2013 , 1, 13128	64
875	Mechanisms of Reactions Induced by Photocatalysis of Titanium Dioxide Nanoparticles. 2013 , 115-157	2
874	A facile sol-gel method for synthesis of porous Nd-doped TiO ₂ monolith with enhanced photocatalytic activity under UV-vis irradiation. 2013 , 182, 87-94	30
873	Synthesis of La-doped Ag _{1.4} K _{0.6} Ta ₄ O ₁₁ nanocomposites as efficient photocatalysts for hydrogen production and organic pollutants degradation. 2013 , 467, 335-341	4
872	Synergism of oxygen vacancy and carbonaceous species on enhanced photocatalytic activity of electrospun ZnO-carbon nanofibers: Charge carrier scavengers mechanism. 2013 , 466, 153-160	79
871	The new understanding on photocatalytic mechanism of visible-light response NS codoped anatase TiO ₂ by first-principles. 2013 , 142-143, 45-53	127
870	Soft-chemical synthesis of mesoporous nitrogen-modified titania with superior photocatalytic performance under visible light irradiation. 2013 , 219, 155-161	22

869	Direct photocurrent generation from nitrogen doped TiO ₂ electrodes in solid-state dye-sensitized solar cells: Towards optically-active metal oxides for photovoltaic applications. 2013 , 117, 624-631	38
868	Band-gap tuning of N-doped TiO ₂ photocatalysts for visible-light-driven selective oxidation of alcohols to aldehydes in water. 2013 , 3, 7215	45
867	2O Core-Shell Nanoparticles as Visible-Light Plasmonic Photocatalysts. 2013 , 3, 47-51	420
866	Engineering of Facets, Band Structure, and Gas-Sensing Properties of Hierarchical Sn ²⁺ -Doped SnO ₂ Nanostructures. 2013 , 23, n/a-n/a	45
865	Defective TiO ₂ with oxygen vacancies: synthesis, properties and photocatalytic applications. 2013 , 5, 3601-14	1426
864	Photoelectrochemical reduction of nitrates at the illuminated p-GaInP ₂ photoelectrode. 2013 , 6, 1802-1805	18
863	Enhancement of visible-light-induced photodegradation over hierarchical porous TiO ₂ by nonmetal doping and water-mediated dye sensitization. 2013 , 268, 252-258	58
862	Optical Properties of (Oxy)Nitride Materials: A Review. 2013 , 96, 665-687	260
861	From AgI/TiO ₂ to Ag/TiO ₂ : effects of the annealing temperature on the compositions, porous nanostructures, and visible-light photocatalytic properties. 2013 , 39, 1011-1019	21
860	Physico-chemical processes and kinetics of sunlight-induced hydrophobic \leftrightarrow superhydrophilic switching of transparent N-doped TiO ₂ thin films. 2013 , 5, 3967-74	22
859	Enhanced photocatalytic performances of CeO ₂ /TiO ₂ nanobelt heterostructures. 2013 , 9, 3864-72	231
858	H-Doped Black Titania with Very High Solar Absorption and Excellent Photocatalysis Enhanced by Localized Surface Plasmon Resonance. 2013 , 23, 5444-5450	532
857	Fast and spontaneous reduction of gold ions over oxygen-vacancy-rich TiO ₂ : A novel strategy to design defect-based composite photocatalyst. 2013 , 459, 34-40	79
856	Preparation and photoelectrochemical properties of nitrogen doped nanotubular TiO ₂ arrays. 2013 , 282, 174-180	20
855	Enhanced visible photocatalytic activity of nanocrystalline α -Fe ₂ O ₃ by coupling phosphate-functionalized graphene. 2013 , 3, 7438	30
854	A facile one-step approach to synthesizing ZnO/graphene composites for enhanced degradation of methylene blue under visible light. 2013 , 274, 273-281	222
853	Vacancy associates promoting solar-driven photocatalytic activity of ultrathin bismuth oxychloride nanosheets. <i>Journal of the American Chemical Society</i> , 2013 , 135, 10411-7	16.4 911
852	Structural, optical and photocatalytic properties of hafnium doped zinc oxide nanophotocatalyst. 2013 , 39, 8693-8700	33

851	Graphene-based materials for hydrogen generation from light-driven water splitting. 2013 , 25, 3820-39	608
850	Tuning the Electronic Structure of Graphite Oxide through Ammonia Treatment for Photocatalytic Generation of H ₂ and O ₂ from Water Splitting. 2013 , 117, 6516-6524	136
849	One-pot pyrolytic synthesis of CN-codoped mesoporous anatase TiO ₂ and its highly efficient photo-degradation properties. 2013 , 37, 451-457	6
848	Sol-gel synthesis and photocatalytic activity of B and Zr co-doped TiO ₂ . 2013 , 74, 1026-1031	27
847	Electrochemical behavior and photocatalytic performance of nitrogen-doped TiO ₂ nanotubes arrays powders prepared by combining anodization with solvothermal process. 2013 , 39, 5545-5552	24
846	Photodegradation by a Heterogeneous Mixture of Micro-Sized Anatase and Truncated Rhomboid Anatase Hollow Spheres. 2013 , 5, 1871-1876	6
845	Role of the Surface Lewis Acid and Base Sites in the Adsorption of CO ₂ on Titania Nanotubes and Platinized Titania Nanotubes: An in Situ FT-IR Study. 2013 , 117, 12661-12678	70
844	Fabrication and photoelectrochemical properties of ZnS/Au/TiO ₂ nanotube array films. 2013 , 15, 4041-8	40
843	Tuning the surface structure of nitrogen-doped TiO ₂ nanofibres--an effective method to enhance photocatalytic activities of visible-light-driven green synthesis and degradation. 2013 , 19, 5731-41	30
842	Origin of the Visible Light Absorption of Boron/Nitrogen Co-doped Anatase TiO ₂ . 2013 , 117, 26454-26459	24
841	Microwave-assisted synthesis of nanoparticulate perovskite LaFeO ₃ as a high active visible-light photocatalyst. 2013 , 13, 340-343	117
840	Optical Transition and Photocatalytic Performance of d1 Metallic Perovskites. 2013 , 117, 5593-5598	30
839	Synthesis of lanthanide-doped NaYF ₄ @TiO ₂ core-shell composites with highly crystalline and tunable TiO ₂ shells under mild conditions and their upconversion-based photocatalysis. 2013 , 5, 8930-3	85
838	The Synergistic Effect of Nitrogen Dopant and Calcination Temperature on the Visible-Light-Induced Photoactivity of N-Doped TiO ₂ . 2013 , 2013, 1-13	17
837	The Photocatalytic Property of Nitrogen-Doped TiO ₂ Nanoball Film. 2013 , 2013, 1-6	9
836	Visible Light Photoelectrochemical Properties of N-Doped TiO ₂ Nanorod Arrays from TiN. 2013 , 2013, 1-8	8
835	Fabrication of Mo+N-Codoped TiO ₂ Nanotube Arrays by Anodization and Sputtering for Visible Light-Induced Photoelectrochemical and Photocatalytic Properties. 2013 , 2013, 1-9	3
834	Photocatalytic Activity of Bare and Amine-Treated TiO ₂ Nanoparticles. 2013 , 1578, 1	

- 833 Nitrogen Doping to Metatitanic Acid by NH₃ Heat Treatment for Achieving Visible-Light-Responsive Photocatalytic Activity. **2013**, 761, 35-39
- 832 Feasibility of Hydrothermal Nitrogen Doping Process for Enhancing Visible Light Photocatalytic Activity of Metatitanic Acid Powder. **2013**, 761, 41-45
- 831 Gray TiO₂ nanowires synthesized by aluminum-mediated reduction and their excellent photocatalytic activity for water cleaning. **2013**, 19, 13313-6 64
- 830 Preparation and photovoltaic properties of N-doped TiO₂ nanocrystals in vacuum. **2013**, 28, 468-474 2
- 829 Photocatalytic degradation on Disperse Blue with nano-TiO₂ film electrode. **2013**, 46, 269 1
- 828 Nitrogen-doped TiO₂ Photocatalysts Synthesized from Titanium Nitride: Characterizations and Photocatalytic Hydrogen Evolution Performance. **2013**, 16, 2
- 827 Enhanced photocatalytic activity for H₂ evolution under irradiation of UV-vis light by Au-modified nitrogen-doped TiO₂. **2014**, 9, e103671 28
- 826 Visible Light Induced Photocatalytic Degradation of Methyl Red with Codoped Titania. **2014**, 2014, 1-7 4
- 825 Anatase TiO₂ nanobelts with plasmonic Au decoration exhibiting efficient charge separation and enhanced activity. **2014**, 613, 117-121 26
- 824 Second Generation Nitrogen Doped Titania Nanoparticles: A Comprehensive Electronic and Microstructural Picture. **2014**, 32, 1195-1213 14
- 823 Synthesis, characterization, and bioactivity of carboxylic acid-functionalized titanium dioxide nanobelts. **2014**, 11, 43 34
- 822 Enhancement of Visible-Light-Induced Photocurrent and Photocatalytic Activity of V and N Codoped TiO₂Nanotube Array Films. **2014**, 161, H416-H421 16
- 821 Solvothermal Synthesis and Visible-Light Driven Photocatalytic Properties of YFeO₃ Nanoparticles. **2014**, 151, 108-115 7
- 820 Effect of nitrogen doping on wetting and photoactive properties of laser processed zinc oxide-graphene oxide nanocomposite layers. **2014**, 116, 024906 12
- 819 Engineered Electronic States of Transition Metal Doped TiO₂ Nanocrystals for Low Overpotential Oxygen Evolution Reaction. **2014**, 118, 29499-29506 92
- 818 Comparative study on the visible light driven photocatalytic activity between substitutional nitrogen doped and interstitial nitrogen doped TiO₂. **2014**, 488, 239-247 26
- 817 Oxygen-deficient titania as alternative support for Pt catalysts for the oxygen reduction reaction. **2014**, 23, 701-707 14
- 816 High-throughput evaluation in nitrogen doping of amorphous titanium dioxide. **2014**, 251, 1225-1230 2

815	Preparation of Fe/N Co-Doped TiO ₂ Powders by Mild Hydrothermal Method. 2014 , 804, 217-220	1
814	Principles of Heterogeneous Photocatalysis. 2014 , 1-41	3
813	The role of annealing temperature in enhancing the photocatalytic activity of nitrogen-doped hexaniobate. 2014 , 25, 294-300	2
812	Fabrication of heterostructured SrTiO ₃ /TiO ₂ nanotube array films and their use in photocathodic protection of stainless steel. 2014 , 121, 361-368	66
811	Hierarchical sulfonated graphene oxide/TiO ₂ composites for highly efficient hydrogen production with a wide pH range. 2014 , 147, 888-896	34
810	Realizing high visible-light-induced carriers mobility in TiO ₂ -based photoanodes. 2014 , 251, 195-201	3
809	Structurally controlled ZnO/TiO ₂ heterostructures as efficient photocatalysts for hydrogen generation from water without noble metals: The role of microporous amorphous/crystalline composite structure. 2014 , 245, 979-985	73
808	Synergic photocatalytic effects of nitrogen and niobium co-doping in TiO ₂ for the redox conversion of aquatic pollutants under visible light. 2014 , 310, 91-99	69
807	Control of the visible and UV light water splitting and photocatalysis of nitrogen doped TiO ₂ thin films deposited by reactive magnetron sputtering. 2014 , 144, 12-21	54
806	Ionic-liquid-assisted synthesis of high-visible-light-activated Nb ₂ O ₅ -tri-doped mesoporous TiO ₂ via a microwave route. 2014 , 144, 442-453	108
805	Hierarchical SnO ₂ Nanostructures: Recent Advances in Design, Synthesis, and Applications. 2014 , 26, 123-133	456
804	Photocatalytic activity of nitrogen-doped TiO ₂ -based nanowires: a photo-assisted Kelvin probe force microscopy study. 2014 , 16, 1	9
803	Nitrogen-doped and gold-loaded TiO ₂ photocatalysts synthesized by sequential reactive pulsed laser deposition. 2014 , 117, 97-101	6
802	Solvents mediated-synthesis of BiOI photocatalysts with tunable morphologies and their visible-light driven photocatalytic performances in removing of arsenic from water. 2014 , 264, 293-302	160
801	Preparation of N-Doped Bi ₂ WO ₆ Microspheres for Efficient Visible Light-Induced Photocatalysis. 2014 , 27, 124-130	13
800	Air-processed depleted bulk heterojunction solar cells based on PbS/CdS core-shell quantum dots and TiO ₂ nanorod arrays. 2014 , 124, 67-74	34
799	Synergistic effect of Cu ₂ O/TiO ₂ heterostructure nanoparticle and its high H ₂ evolution activity. 2014 , 39, 6345-6353	94
798	A one pot synthesis of Au/ZnO nanocomposites for plasmon-enhanced sunlight driven photocatalytic activity. 2014 , 38, 2999	73

- 797 Visible-light photocatalytic activity of Pt supported TiO₂ combined with up-conversion luminescence agent (Er³⁺:Y₃Al₅O₁₂) for hydrogen production from aqueous methanol solution. **2014**, 252, 21-27 38
- 796 Enhancing visible light responsive photocatalytic activity by decorating Mn-doped ZnO nanoparticles on graphene. **2014**, 40, 10085-10097 76
- 795 Nitrogen-doped Li₄Ti₅O₁₂ nanosheets with enhanced lithium storage properties. **2014**, 266, 150-154 48
- 794 Branch density-controlled synthesis of hierarchical TiO₂ nanobelt and tunable three-step electron transfer for enhanced photocatalytic property. **2014**, 6, 10044-59 33
- 793 Synthesis, Characterization, and Photocatalytic Activity of Y-Doped CeO₂ Nanorods. **2014**, 4, 577-584 237
- 792 Catalytic properties of titania nanotube prepared by simple refluxing method. **2014**, 116, 160-163 7
- 791 Synergetic effects of hydrophilic surface modification and N-doping for visible light response on photocatalytic activity of TiO₂. **2014**, 14, 300-305 17
- 790 Atomic N Modified Rutile TiO₂(110) Surface Layer with Significant Visible Light Photoactivity. **2014**, 118, 994-1000 26
- 789 Photocatalytic activity of PbO₂-type TiO₂. **2014**, 8, 822-826 12
- 788 Formation of internal p-n junctions in Ta₃N₅ photoanodes for water splitting. **2014**, 2, 20570-20577 39
- 787 PdO/TiO₂ and Pd/TiO₂ heterostructured nanobelts with enhanced photocatalytic activity. **2014**, 9, 1648-54 48
- 786 Optical properties and structure of the TiN/Nitrogen-doped TiO₂ nanocomposite. **2014**, 321, 457-463 8
- 785 Bi₂Sn₂O₇/TiO₂ nanocomposites for enhancing visible light photocatalytic activity. **2014**, 4, 49900-49907 17
- 784 Kinetic study of the heterogeneous photocatalysis of porous nanocrystalline TiO₂ assemblies using a continuous random walk simulation. **2014**, 16, 22343-51 17
- 783 Three human cell types respond to multi-walled carbon nanotubes and titanium dioxide nanobelts with cell-specific transcriptomic and proteomic expression patterns. **2014**, 8, 533-48 48
- 782 Anode-selective coating of titanium(IV) oxide (TiO₂) using electrophoretic sulfone-containing click polyester. **2014**, 4, 15983-15994 16
- 781 CO₂ Adsorption on Anatase TiO₂ (101) Surfaces in the Presence of Subnanometer Ag/Pt Clusters: Implications for CO₂ Photoreduction. **2014**, 118, 26236-26248 48
- 780 Facile synthesis of ultrasmall TiO₂ nanocrystals/porous carbon composites in large quantity and their photocatalytic performance under visible light. **2014**, 4, 33408 16

779	Lanthanide-doped upconversion materials: emerging applications for photovoltaics and photocatalysis. 2014 , 25, 482001		115
778	Visible light-driven decomposition of gaseous benzene on robust Sn ²⁺ -doped anatase TiO ₂ nanoparticles. 2014 , 4, 34315-34324		35
777	A facile and versatile method for preparation of colored TiO ₂ with enhanced solar-driven photocatalytic activity. 2014 , 6, 10216-23		308
776	Self-assembled hierarchical Bi ₁₂ TiO ₂₀ -graphene nanoarchitectures with excellent simulated sunlight photocatalytic activity. 2014 , 16, 2705-14		39
775	Low-temperature conversion of titanate nanotubes into nitrogen-doped TiO ₂ nanoparticles. 2014 , 16, 7486-7492		18
774	Dimensionality of nanoscale TiO ₂ determines the mechanism of photoinduced electron injection from a CdSe nanoparticle. 2014 , 14, 1790-6		34
773	Visible-light-responsive bicrystalline (anatase/brookite) nanoporous nitrogen-doped TiO ₂ photocatalysts by plasma treatment. 2014 , 254, 268-275		35
772	Improvements in the electrochemical kinetic properties and rate capability of anatase titanium dioxide nanoparticles by nitrogen doping. 2014 , 6, 4458-65		68
771	Solar hydrogen generation by a CdS-Au-TiO ₂ sandwich nanorod array enhanced with Au nanoparticle as electron relay and plasmonic photosensitizer. <i>Journal of the American Chemical Society</i> , 2014 , 136, 8438-49	16.4	472
770	Fabrication of nano TiO ₂ @graphene composite: Reusable photocatalyst for hydrogen production, degradation of organic and inorganic pollutants. 2014 , 198, 10-18		59
769	Solvothermal synthesis of orthorhombic Sb ₂ WO ₆ hierarchical structures and their visible-light-driven photocatalytic activity. 2014 , 43, 8439-45		20
768	Enhanced H ₂ Generation of Au-Loaded, Nitrogen-Doped TiO ₂ Hierarchical Nanostructures under Visible Light. 2014 , 1, 1300018		58
767	Synthesis and enhancement of visible light activities of nitrogen-doped BaTiO ₃ . 2014 , 615, 243-248		47
766	Morphology control, defect engineering and photoactivity tuning of ZnO crystals by graphene oxide—a unique 2D macromolecular surfactant. 2014 , 16, 5589-99		111
765	Band gap engineering of early transition-metal-doped anatase TiO ₂ —first principles calculations. 2014 , 16, 21446-51		49
764	Bismuth oxyhalide nanomaterials: layered structures meet photocatalysis. 2014 , 6, 8473-88		655
763	Electro-Optic Modulation Induced Enhancement in Photocatalytic Activity of N-Doped TiO ₂ Thin Films. 2014 , 118, 7130-7138		44
762	PbI ₂ co-doping induced structural recovery of TiO ₂ for overall water splitting under visible light irradiation. 2014 , 615, 79-83		26

761	Titanium dioxide-based nanomaterials for photocatalytic fuel generations. 2014 , 114, 9987-10043	1794
760	One-dimensional nanostructure based materials for versatile photocatalytic applications. 2014 , 4, 12685	182
759	Probing the optical property and electronic structure of TiO ₂ nanomaterials for renewable energy applications. 2014 , 114, 9662-707	368
758	Facile synthesis of highly efficient one-dimensional plasmonic photocatalysts through Ag@Cu ²⁺ core-shell heteronanowires. 2014 , 6, 15716-25	119
757	Characterization and high pollutant removal ability of buoyant (C, N)-TiO ₂ /PTFE flakes prepared by high-energy ball-milling. 2014 , 4, 40019	13
756	Photocatalytic activity of ZnWO ₄ band structure, morphology and surface modification. 2014 , 6, 14423-32	84
755	Enhancement in the photocatalytic activity of Ag loaded N-doped TiO ₂ nanocomposite under sunlight. 2014 , 25, 3179-3189	25
754	One-dimensional titanium dioxide nanomaterials: nanowires, nanorods, and nanobelts. 2014 , 114, 9346-84	504
753	Novel V ₂ O ₅ /BiVO ₄ /TiO ₂ Nanocomposites with High Visible-Light-Induced Photocatalytic Activity for the Degradation of Toluene. 2014 , 118, 10113-10121	153
752	Enhanced anomalous photo-absorption from TiO ₂ nanostructures. 2014 , 115, 124306	20
751	The role of physical and operational parameters in photocatalysis by N-doped TiO ₂ sol-gel thin films. 2014 , 257, 159-169	36
750	Visible light driven photoelectrochemical properties of Ti@TiO ₂ nanowire electrodes sensitized with core-shell Ag@Ag ₂ S nanoparticles. 2014 , 118, 14037-46	35
749	Self-doping for visible light photocatalytic purposes: construction of SiO ₂ /SnO ₂ /SnO ₂ :Sn ²⁺ nanostructures with tunable optical and photocatalytic performance. 2014 , 4, 30820	29
748	Review on modified N-TiO ₂ for green energy applications under UV/visible light: selected results and reaction mechanisms. 2014 , 4, 28265-28299	125
747	Visible-light driven photocatalyst (Er ³⁺ :YAlO ₃ /Pt-TaTaO ₃) for hydrogen production from water splitting. 2014 , 39, 17608-17616	19
746	The influence of Au and Pt electrodes on the stability of TiO ₂ under UV light activation for sensing formaldehyde in moisture circumstances. 2014 , 199, 15-21	13
745	Roles of TaON and Ta ₃ N ₅ in the visible-Fenton-like degradation of atrazine. 2014 , 267, 55-61	21
744	Origin of photocatalytic activity of W/N-codoped TiO ₂ : H ₂ production and DFT calculation with GGA+U. 2014 , 152-153, 73-81	38

743	A facile surfactant-free method to prepare $\text{Ti}_{0.95}\text{Er}_{0.05}\text{O}_2$ nanocrystal and its photocatalytic performance. 2014 , 43, 202-206	9
742	Platinum loaded $\text{NaNbO}_3\text{-xN}_x$ with nanostep surface nanostructures toward enhanced visible-light photocatalytic activity. 2014 , 156-157, 378-384	50
741	Influence of calcination parameters on the synthesis of N-doped TiO_2 by the polymeric precursors method. 2014 , 215, 211-218	17
740	Immobilization of N, S-codoped BiOBr on glass fibers for photocatalytic degradation of rhodamine B. 2014 , 261, 170-175	35
739	Templated fabrication of hierarchically porous Fe_3O_4 bimetallic solid superacid for efficient photochemical oxidation of azo dyes under visible light. 2014 , 244, 296-306	29
738	Tailoring the band structure of Bi_2O_3 by co-doping for realized photocatalytic hydrogen generation. 2014 , 601, 92-97	20
737	Preparation of N doped TiO_2 via microwave-assisted method and its photocatalytic activity for degradation of Malathion. 2014 , 133, 669-76	88
736	Electron transport in dye-sensitized solar cells based on TiO_2 nanowires. 2014 , 57, 892-897	5
735	Effective nonmetal incorporation in black titania with enhanced solar energy utilization. 2014 , 7, 967	317
734	Quasiparticle theoretical characterization of electronic and optical properties of the photocatalytic material $\text{Ti}_3\text{O}_4\text{N}$. 2015 , 30, 2934-2939	3
733	Electronic and magnetic properties of the cation vacancy defect in mHfO_2 . 2015 , 92,	17
732	Mesoporous Biphasic C and N Codoped Anatase Nanocrystal/Carbon Composites and their Derived Doped Anatase Nanoparticles in Phenol Elimination under Visible Light. 2015 , 7, 2945-2956	4
731	Formation of Bi_2WO_6 Bipyramids with Vacancy Pairs for Enhanced Solar-Driven Photoactivity. 2015 , 25, 3726-3734	117
730	A Crucial Role of Rh Substituent Ion in Photoinduced Internal Electron Transfer and Enhanced Photocatalytic Activity of $\text{CdS-Ti}_{(5.2-x)/6}\text{Rh}_x/2\text{O}_2$ Nanohybrids. 2015 , 11, 5771-80	17
729	Transformation of hydrogen titanate nanoribbons to TiO_2 nanoribbons and the influence of the transformation strategies on the photocatalytic performance. 2015 , 6, 831-44	24
728	First-Principles Study on the Structural and Electronic Properties of N Atoms Doped-Rutile TiO_2 of Oxygen Vacancies. 2015 , 2015, 1-10	2
727	. 2015 ,	
726	Size and Temperature Dependence of Electron Transfer between CdSe Quantum Dots and a TiO_2 Nanobelt. 2015 , 119, 5639-5647	16

725	Dual Mechanism of Indium Incorporation into TiO ₂ (Rutile). 2015 , 119, 1146-1154	12
724	In situ picosecond transient diffuse reflectance spectroscopy of opaque TiO ₂ systems under microwave irradiation and influence of oxygen vacancies on the UV-driven/microwave-assisted TiO ₂ photocatalysis. 2015 , 3, 5958-5969	26
723	Introduction: Fundamentals of Water Splitting and Literature Survey. 2015 , 1-53	1
722	Electronic structures of anatase (TiO ₂) _{1-x} (TaON) _x solid solutions: a first-principles study. 2015 , 17, 17980-8	4
721	Semiconducting Materials. 2015 , 1-40	4
720	Controlled nitrogen insertion in titanium dioxide for optimal photocatalytic degradation of atrazine. 2015 , 5, 44041-44052	41
719	Investigation into High Efficiency Visible Light Photocatalysts for Water Reduction and Oxidation. 2015 ,	7
718	Preparation and characterization of Pt/TiO ₂ photocatalysts and their efficiency in degradation of recalcitrant chemicals. 2015 , 156, 369-378	15
717	High photoconductive combustion synthesized TiO ₂ derived nanobelts for photocatalytic water purification under solar irradiation. 2015 , 39, 6040-6051	25
716	Simultaneous formation of silica-protected and N-doped TiO ₂ hollow spheres using organic/organic silica as self-removed templates. 2015 , 3, 2234-2241	25
715	Hydrothermal synthesis of bamboo-shaped nanosheet KNb ₃ O ₈ with enhanced photocatalytic activity. 2015 , 627, 117-122	26
714	Enhanced visible light photoactivity and charge separation in TiO ₂ /TiN bilayer thin films. 2015 , 492, 83-92	26
713	Y/Eu co-doped TiO ₂ : synthesis and photocatalytic activities under UV-light. 2015 , 33, 154-159	29
712	Thin carbon layer coated Ti(3+)-TiO ₂ nanocrystallites for visible-light driven photocatalysis. 2015 , 7, 5035-45	84
711	Nitrogen-treated Hierarchical Macro-/Mesoporous TiO ₂ Used as Anode Materials for Lithium Ion Batteries with High Performance at Elevated Temperatures. 2015 , 156, 53-59	27
710	Synthesis of dual-phase titanate/anatase with controllable morphology doped with nitrogen from a bola-amphiphile amine surfactant as template. 2015 , 41, 5916-5925	5
709	Nitrogen Doped 3D Titanium Dioxide Nanorods Architecture with Significantly Enhanced Visible Light Photoactivity. 2015 , 119, 4397-4405	36
708	Nitrogen-doping of bulk and nanotubular TiO ₂ photocatalysts by plasma-assisted atomic layer deposition. 2015 , 330, 476-486	23

707	Resonance Raman spectroscopic study for radial vibrational modes in ultra-thin walled TiO ₂ nanotubes. 2015 , 46, 231-235	5
706	1D CdS nanowire/2D BiVO ₄ nanosheet heterostructures toward photocatalytic selective fine-chemical synthesis. 2015 , 5, 16476-16483	55
705	A facile approach to further improve the substitution of nitrogen into reduced TiO ₂ with an enhanced photocatalytic activity. 2015 , 170-171, 66-73	57
704	Efficient visible-light photocatalytic hydrogen evolution over platinum supported titanium dioxide nanocomposites coating up-conversion luminescence agent (Er ³⁺ :Y ₃ Al ₅ O ₁₂ /Pt/TiO ₂). 2015 , 40, 2132-2140	22
703	Hydrothermal synthesis of porous rh-In ₂ O ₃ nanostructures with visible-light-driven photocatalytic degradation of tetracycline. 2015 , 17, 2336-2345	30
702	Photocatalytic degradation of acid orange 7 using Cr-doped CeO ₂ nanorods. 2015 , 26, 1441-1448	7
701	In-situ preparation of N-TiO ₂ /graphene nanocomposite and its enhanced photocatalytic hydrogen production by H ₂ S splitting under solar light. 2015 , 7, 5023-34	87
700	Black titanium dioxide (TiO ₂) nanomaterials. 2015 , 44, 1861-85	958
699	Origin of photocatalytic activity of nitrogen-doped germanium dioxide under visible light from first principles. 2015 , 31, 517-524	7
698	High-Temperature Ammonolysis of Thin Film Ta ₂ O ₅ Photoanodes: Evolution of Structural, Optical, and Photoelectrochemical Properties. 2015 , 27, 708-715	63
697	Simulated Solar Light Responsive Carbon Nitride/TiO ₂ Nanofiber Heterojunction Photocatalyst: Synthesis, Characterization, and Photocatalytic Performance. 2015 , 36, 333-339	6
696	A Fe/Fe ₃ O ₄ /N-carbon composite with hierarchical porous structure and in situ formed N-doped graphene-like layers for high-performance lithium ion batteries. 2015 , 44, 4594-600	26
695	Rational design of Ag@Ag-Bi-KBa ₂ Ta ₅ O ₁₅ nanocomposites as efficient plasmonic photocatalysts for degradation of organic pollutants in water under visible light. 2015 , 496, 17-24	4
694	Recent Advances in Metal Oxide-Based Photoelectrochemical Hydrogen Production. 2015 , 343-370	
693	Electronic and optical properties of N-doped Bi ₂ O ₃ polymorphs for visible light-induced photocatalysis. 2015 , 21, 48	10
692	Thin Film Structures in Energy Applications. 2015 ,	5
691	Molecular nitrogen in N-doped TiO ₂ nanoribbons. 2015 , 5, 23350-23356	29
690	Improved electrochemical performance of nitrogen doped TiO ₂ -B nanowires as anode materials for Li-ion batteries. 2015 , 7, 12215-24	63

- 689 In situ preparation of $\text{NiO}/\text{graphene}$ nanocomposites: excellent candidate as a photocatalyst for enhanced solar hydrogen generation and high performance supercapacitor electrode. **2015**, 3, 17050-17063 80
- 688 Synergic Effects of Photocatalytic and Enzymatic Degradation of Dibenzothiophene by Titania Nanolayer Coated on Glass and Intracellular Enzymes. **2015**, 45, 1759-1763 2
- 687 Facile synthesis of hierarchical $\text{Ag}_3\text{PO}_4/\text{TiO}_2$ nanofiber heterostructures with highly enhanced visible light photocatalytic properties. **2015**, 355, 921-929 61
- 686 Anatase TiO_2 ultrathin nanobelts derived from room-temperature-synthesized titanates for fast and safe lithium storage. **2015**, 5, 11804 70
- 685 A facile solution approach to W,N co-doped TiO_2 nanobelt thin films with high photocatalytic activity. **2015**, 3, 15863-15868 48
- 684 Foamed single-crystalline anatase nanocrystals exhibiting enhanced photocatalytic activity. **2015**, 3, 17837-17846 46
- 683 Signal-off photoelectrochemical DNA sensing strategy based on target dependent DNA probe conformational conversion using CdS quantum dots sensitized TiO_2 nanorods array as photoactive material. **2015**, 759, 38-45 15
- 682 Origin of enhanced visible light driven water splitting by (Rh, Sb)- SrTiO_3 . **2015**, 17, 15274-83 33
- 681 Surface-mediated selective photocatalytic aerobic oxidation reactions on TiO_2 nanofibres. **2015**, 5, 56820-56831 16
- 680 Environmental Photochemistry Part III. **2015**, 2 2
- 679 Vanadium Oxide Supported on Titanosilicates for the Oxidative Dehydrogenation of n-Butane. **2015**, 54, 3602-3610 10
- 678 The photoelectrochemical exploration of multifunctional TiO_2 mesocrystals and its enzyme-assisted biosensing application. **2015**, 72, 18-24 39
- 677 Electronic properties of TiO_2 doped with Sc, Y, La, Zr, Hf, V, Nb and Ta. **2015**, 628, 43-48 32
- 676 Irradiation-induced TiO_2 nanorods for photoelectrochemical hydrogen production. **2015**, 40, 5034-5041 18
- 675 Facile synthesis of sheet-like $\text{NiTiO}_2/\text{g-C}_3\text{N}_4$ heterojunctions with highly enhanced and stable visible-light photocatalytic activities. **2015**, 5, 34281-34291 25
- 674 Design of a solar-driven TiO_2 nanofilm on Ti foil by self-structure modifications. **2015**, 5, 41437-41444 10
- 673 Copper phosphide modified cadmium sulfide nanorods as a novel p-n heterojunction for highly efficient visible-light-driven hydrogen production in water. **2015**, 3, 10243-10247 141
- 672 Improved performance and prolonged lifetime of titania-based materials: sequential use as adsorbent and photocatalyst. **2015**, 58, 1211-1219 4

671	Ammonium acetate and ethylenediamine-assisted synthesis of anatase nanocrystals with {010} facets and enhanced photocatalytic activity. 2015 , 3, 961-968	4
670	A novel bio-degradable polymer stabilized Ag/TiO ₂ nanocomposites and their catalytic activity on reduction of methylene blue under natural sun light. 2015 , 121, 126-34	17
669	Facet-Level Mechanistic Insights into General Homogeneous Carbon Doping for Enhanced Solar-to-Hydrogen Conversion. 2015 , 25, 2189-2201	121
668	Structure, synthesis, and applications of TiO ₂ nanobelts. 2015 , 27, 2557-82	247
667	Fabrication of a coral/double-wall TiO ₂ nanotube array film electrode with higher photoelectrocatalytic activity under sunlight. 2015 , 39, 3923-3928	14
666	Electronic structures and current conductivities of B, C, N and F defects in amorphous titanium dioxide. 2015 , 17, 11908-13	18
665	Band gap narrowing in nitrogen-doped La ₂ Ti ₂ O ₇ predicted by density-functional theory calculations. 2015 , 17, 8994-9000	31
664	Photocatalytic conversion of CO ₂ into value-added and renewable fuels. 2015 , 342, 154-167	309
663	Rutile phase n- and p-type anodic titania nanotube arrays with square-shaped pore morphologies. 2015 , 51, 7816-9	33
662	Surface characterisation and photocatalytic performance of N-doped TiO ₂ thin films deposited onto 200 nm pore size alumina membranes by sol-gel methods. 2015 , 159, 25-37	15
661	Highly efficient and stable Au/CeO ₂ -TiO ₂ photocatalyst for nitric oxide abatement: potential application in flue gas treatment. 2015 , 31, 10822-30	61
660	Transition metal/metal oxide modified MCM-41 for pollutant degradation and hydrogen energy production: a review. 2015 , 5, 83707-83724	65
659	Solution combustion synthesis of metal oxide nanomaterials for energy storage and conversion. 2015 , 7, 17590-610	259
658	Architectural design and phase engineering of N/B-codoped TiO ₂ (B)/anatase nanotube assemblies for high-rate and long-life lithium storage. 2015 , 3, 22591-22598	46
657	Facile ultrasonic deposition of SnO ₂ nanoparticles on TiO ₂ nanotube films for enhanced photoelectrochemical performances. 2015 , 3, 22605-22613	35
656	The effect of different co-catalysts (CuO, MoS ₂ and Pt) on hydrogen production of Er ³⁺ :YAlO ₃ /NaTaO ₃ by visible-light-induced methanol splitting. 2015 , 93, 749-757	18
655	Simultaneous enhancements in photon absorption and charge transport of bismuth vanadate photoanodes for solar water splitting. 2015 , 6, 8769	357
654	Synthesis and enhanced photoreactivity of metallic Bi-decorated BiOBr composites with abundant oxygen vacancies. 2015 , 26, 10002-10011	17

653	Hierarchical carbon quantum dots/hydrogenated-TaON heterojunctions for broad spectrum photocatalytic performance. 2015 , 18, 143-153	87
652	Investigation of band gap narrowing in nitrogen-doped La ₂ Ti ₂ O ₇ with transient absorption spectroscopy. 2015 , 17, 31039-43	12
651	Capsule-like CdS-modified TiO ₂ nanocomposites with enhanced photodegradation under visible light irradiation. 2015 , 10, 157-160	5
650	Multi-layer and open three-dimensionally ordered macroporous TiO ₂ /ZrO ₂ composite: diversified design and the comparison of multiple mode photocatalytic performance. 2015 , 86, 818-828	39
649	Light-Driven Heterogeneous Reduction of Carbon Dioxide: Photocatalysts and Photoelectrodes. 2015 , 115, 12888-935	1097
648	Visible light-induced photocatalytic activity of high surface area N-doped two-dimensional (2-D) TiO ₂ sheets. 2015 , 5, 88464-88470	8
647	Bioprocess-inspired synthesis of hierarchically porous nitrogen-doped TiO ₂ with high visible-light photocatalytic activity. 2015 , 3, 19588-19596	32
646	Emerging Enzyme-Based Technologies for Wastewater Treatment. 2015 , 69-85	3
645	Heteroatom doped graphene in photocatalysis: A review. 2015 , 358, 2-14	239
644	Anomalous behavior of visible light active TiO ₂ for the photocatalytic degradation of different Reactive dyes. 2015 , 14, 2024-34	26
643	Band Gap Engineering of In ₂ TiO ₅ for H ₂ Production under Near-infrared Light. 2015 , 7, 20761-8	14
642	One-pot hydrothermal route to synthesize the ZnIn ₂ S ₄ /g-C ₃ N ₄ composites with enhanced photocatalytic activity. 2015 , 50, 8142-8152	43
641	Nitrogen and cobalt co-doped zinc oxide nanowires / viable photoanodes for hydrogen generation via photoelectrochemical water splitting. 2015 , 299, 11-24	61
640	Polymorphic phase study on nitrogen-doped TiO ₂ nanoparticles: effect on oxygen site occupancy, dye sensitized solar cells efficiency and hydrogen production. 2015 , 5, 101276-101286	16
639	Enhanced performance of dye-sensitized solar cells with fluorine doped nanocrystalline TiO ₂ as photoanode. 2015 , 186, 151-156	11
638	Synthesis and enhanced photocatalytic activity of Zr-doped N-TiO ₂ nanostructures. 2015 , 26, 554-563	21
637	Nanoscale Optimization and Statistical Modeling of Photoelectrochemical Water Splitting Efficiency of N-Doped TiO ₂ Nanotubes. 2015 , 58, 114-122	6
636	Visible-light induced photocatalytic activity of electrospun-TiO ₂ in arsenic(III) oxidation. 2015 , 7, 511-8	39

635	Enhanced H ₂ S sensing characteristics of CuO-NiO core-shell microspheres sensors. 2015 , 209, 515-523	139
634	Effects of silver substrates on the visible light photocatalytic activities of copper-doped titanium dioxide thin films. 2015 , 30, 527-534	10
633	Evaluation of a carbon nanotube-titanate nanotube nanocomposite as an electrochemical biosensor scaffold. 2015 , 66, 208-15	19
632	Enhanced photocatalytic performance of porous TiO ₂ nanobelts with phase junctions. 2015 , 39, 29-33	17
631	Colored titania nanocrystals and excellent photocatalysis for water cleaning. 2015 , 60, 55-59	32
630	Amorphous TiO ₂ doped with carbon for visible light photodegradation of rhodamine B and 4-chlorophenol. 2015 , 324, 35-43	77
629	Highly efficient visible-light driven photocatalyst with enhanced charge separation prepared by annealing continuously in ammonia and vacuum. 2015 , 166-167, 1-8	16
628	Visible-Light-Active NiV ₂ O ₆ Films for Photoelectrochemical Water Oxidation. 2015 , 119, 14524-14531	20
627	Study of the effects of surface modification by thermal shock method on photocatalytic activity of TiO ₂ P25. 2015 , 165, 260-268	34
626	Semiconductor-based photocatalysts and photoelectrochemical cells for solar fuel generation: a review. 2015 , 5, 1360-1384	673
625	Application of the GGA-1/2 excited-state correction method to p-electron defective states: the special case of nitrogen-doped TiO ₂ . 2015 , 93, 261-266	7
624	Morphology control and characterization of broom-like porous CeO ₂ . 2015 , 260, 126-132	73
623	N-doped TiO ₂ nanotubes coated with a thin TaOxNy layer for photoelectrochemical water splitting: dual bulk and surface modification of photoanodes. 2015 , 8, 247-257	131
622	Morphology control and photocatalytic characterization of yttrium-doped hedgehog-like CeO ₂ . 2015 , 164, 120-127	30
621	Gas sensing properties of zinc stannate (Zn ₂ SnO ₄) nanowires prepared by carbon assisted thermal evaporation process. 2015 , 618, 455-462	59
620	Enhanced Photocatalytic Response of N Doped Niobium Titanates Prepared by Ion Exchange Process. 2016 , 01,	
619	TiO ₂ -Based Nanomaterials for Advanced Environmental and Energy-Related Applications. 2016 , 2016, 1-3	8
618	Double Walled Carbon Nanotube/TiO ₂ Nanocomposites for Photocatalytic Dye Degradation. 2016 , 2016, 1-9	16

617	Synthesis and Characterization of N-Doped Porous TiO ₂ Hollow Spheres and Their Photocatalytic and Optical Properties. 2016 , 9,	17
616	Thiourea-Modified TiO ₂ Nanorods with Enhanced Photocatalytic Activity. 2016 , 21, 181	17
615	Influence of Nitrogen Doping on Device Operation for TiO ₂ -Based Solid-State Dye-Sensitized Solar Cells: Photo-Physics from Materials to Devices. 2016 , 6,	18
614	. 2016 ,	8
613	Bandgap Engineering of Titanium D ₂ O Clusters: Labile Surface Sites Used for Ligand Substitution and Metal Incorporation. 2016 , 128, 5246-5251	29
612	Nitrogen-Doped Graphene for Photocatalytic Hydrogen Generation. 2016 , 11, 1125-37	49
611	Controlled Formation of TiO ₂ /MoS ₂ Core-Shell Heterostructures with Enhanced Visible-Light Photocatalytic Activities. 2016 , 33, 221-227	37
610	Directing photocatalytic and photoelectrocatalytic performance of TiO ₂ by using TEA and NH ₄ F as doping precursors. 2016 , 80, 462-473	6
609	Mussel-Directed Synthesis of Nitrogen-Doped Anatase TiO ₂ . 2016 , 128, 3083-3087	6
608	Synthesis of Nanoporous Li ₄ Ti ₅ O ₁₂ /TiO ₂ Composites for High-Performance Lithium-Ion-Battery Anodes. 2016 , 3, 1951-1959	9
607	Recent Advances in Controlling Syntheses and Energy Related Applications of MX ₂ and MX ₂ /Graphene Heterostructures. 2016 , 6, 1600459	35
606	Hierarchical structure engineering of brookite TiO ₂ crystals for enhanced photocatalytic and external antitumor property. 2016 , 61, 1818-1825	12
605	Synergy of metal and nonmetal dopants for visible-light photocatalysis: a case-study of Sn and N co-doped TiO ₂ . 2016 , 18, 9636-44	59
604	Geometry-enhanced ultra-long TiO ₂ nanobelts in an all-vanadium photoelectrochemical cell for efficient storage of solar energy. 2016 , 26, 200-207	19
603	Electronic metal-support interactions enhance the ammonia synthesis activity over ruthenium supported on Zr-modified CeO ₂ catalysts. 2016 , 6, 51106-51110	23
602	Defective, Porous TiO ₂ Nanosheets with Pt Decoration as an Efficient Photocatalyst for Ethylene Oxidation Synthesized by a C ₃ N ₄ Templating Method. 2016 , 8, 10104-8	61
601	Solar-assisted photocatalytic reduction of methyl orange azo dye over porous TiO ₂ nanostructures. 2016 , 40, 5483-5494	44
600	Nitrogen-doped TiO ₂ microspheres with hierarchical micro/nanostructures and rich dual-phase junctions for enhanced photocatalytic activity. 2016 , 6, 40923-40931	33

599	Facile low-temperature co-precipitation method to synthesize hierarchical network-like g-C ₃ N ₄ /SnIn ₄ S ₈ with superior photocatalytic performance. 2016 , 51, 6998-7007	22
598	Formation of BiOCl/Bi ₂ O ₃ and Related Materials for Efficient Visible-Light Photocatalysis. 2016 , 405-427	
597	Enhanced photocatalytic activity of N-doped TiO ₂ nanocrystals with exposed {001} facets. 2016 , 390, 689-695	33
596	Graphene Semiconductor Hybrid Photocatalysts and Their Application in Solar Fuel Production. 2016 , 353-386	2
595	Types of nitrogen incorporation in reactively sputtered titania thin films: Influence on UV-visible, photocatalytic and photoconduction properties. 2016 , 616, 466-476	5
594	Hydrazine-based synergistic Ti(III)/N doping of surfactant-templated TiO ₂ thin films for enhanced visible light photocatalysis. 2016 , 182, 382-393	18
593	Coating a N-doped TiO ₂ shell on dually sensitized upconversion nanocrystals to provide NIR-enhanced photocatalysts for efficient utilization of upconverted emissions. 2016 , 3, 1190-1197	9
592	One-pot low-temperature synthesis of TiO ₂ nanowire/rGO composites with enhanced photocatalytic activity. 2016 , 6, 94092-94097	11
591	Use of Selected Scavengers for the Determination of NF-TiO Reactive Oxygen Species during the Degradation of Microcystin-LR under Visible Light Irradiation. 2016 , 425, 183-189	116
590	Ultrafast Dynamics of Photogenerated Holes at a CHOH/TiO Rutile Interface. <i>Journal of the American Chemical Society</i> , 2016 , 138, 13740-13749	16.4 92
589	Substitution Boosts Charge Separation for High Solar-Driven Photocatalytic Performance. 2016 , 8, 26783-26793	30
588	Synthesis of BiVO ₄ /TiO ₂ /BiVO ₄ three-layer composite photocatalyst: effect of layered heterojunction structure on the enhancement of photocatalytic activity. 2016 , 6, 75482-75490	15
587	Defect assisted coupling of a-MoS ₂ /TiO ₂ interface and tuning of its electronic structure. 2016 , 27, 355203	18
586	Oxygen vacancies dependent Au nanoparticle deposition and CO oxidation. 2016 , 6, 87978-87987	23
585	Visible-light active mesoporous, nanocrystalline N,S-doped and co-doped titania photocatalysts synthesized by non-hydrolytic sol-gel route. 2016 , 42, 16718-16728	26
584	Rational Design of Zirconium-doped Titania Photocatalysts with Synergistic Brønsted Acidity and Photoactivity. 2016 , 9, 2759-2764	3
583	Surface functionalized HTiO nanowires engineered for visible-light photoswitching, electrochemical water splitting, and photocatalysis. 2016 , 18, 26900-26912	31
582	Optical studies of cobalt implanted rutile TiO ₂ (110) surfaces. 2016 , 387, 938-943	8

- 581 Theoretical studies on the form and effect of N-doping in an ZnGa₂O₄ photocatalyst. **2016**, 6, 74483-74492 7
- 580 Defect induced nickel, nitrogen-codoped mesoporous TiO₂ microspheres with enhanced visible light photocatalytic activity. **2016**, 60, 1-10 13
- 579 Nitrogen Doping in Oxygen-Deficient CaFeO: A Strategy for Efficient Oxygen Reduction Oxide Catalysts. **2016**, 8, 34387-34395 37
- 578 Enhanced photocatalytic degradation of dye under visible light on mesoporous microspheres by defects in manganese- and nitrogen-co-doped TiO₂. **2016**, 18, 1 9
- 577 PH₃-Treated TiO₂ Nanorods with Dual-Doping Effect for Photoelectrochemical Oxidation of Water. **2016**, 120, 22195-22201 25
- 576 Self-assembly of (NH₄)_{0.3}TiO_{1.1}F_{2.1} crystal by dinitrogen fixation as a precursor of N-doped TiO₂ nanosheets. **2016**, 18, 1 3
- 575 TiO₂ nanorod array@carbon cloth photocatalyst for CO₂ reduction. **2016**, 42, 15081-15086 17
- 574 Semiconductor Nanowires for Energy Harvesting. **2016**, 94, 297-368 4
- 573 Role of N doping on the structural, optical and photocatalytic properties of the silver deposited ZnO thin films. **2016**, 69, 131-138 12
- 572 Synthesis, characterization and photo-catalytic performance of meso-porous SiO₂ co-doped nano-spherical anatase TiO₂ with high thermal stability. **2016**, 6, 110741-110749 6
- 571 The Visible-Light Photocatalytic Activity and Antibacterial Performance of Ag/AgBr/TiO₂ Immobilized on Activated Carbon. **2016**, 92, 800-807 8
- 570 Chapter 8 Roles of Reduced Graphene Oxide in Improving Photocatalytic Hydrogen Generation Performance over Metal Sulphide Nanocomposites. **2016**, 331-368
- 569 Facile route to fabricate carbon-doped TiO₂ nanoparticles and its mechanism of enhanced visible light photocatalytic activity. **2016**, 122, 1 12
- 568 Gas-generated thermal oxidation of a coordination cluster for an anion-doped mesoporous metal oxide. **2015**, 5, 18468 2
- 567 Energy States of a Core-Shell Metal Oxide Photocatalyst Enabling Visible Light Absorption and Utilization in Solar-to-Fuel Conversion of Carbon Dioxide. **2016**, 6, 1600583 13
- 566 Photocatalytic degradation of indigo carmine using Nd-doped TiO₂-decorated graphene oxide nanocomposites. **2016**, 80, 38-49 32
- 565 Tuning the Structural Color of a 2D Photonic Crystal Using a Bowl-like Nanostructure. **2016**, 8, 15802-8 33
- 564 Hybrid nanocomposites with enhanced visible light photocatalytic ability for next generation of clean energy systems. **2016**, 524, 77-84 3

563	Preparation and characterization of nitrogen-doped TiO ₂ /diatomite integrated photocatalytic pellet for the adsorption-degradation of tetracycline hydrochloride using visible light. 2016 , 302, 682-696	114
562	Remarkable Enhancement of Photocatalytic Water Oxidation in N ₂ /Ar Plasma Treated, Mesoporous TiO ₂ Films. 2016 , 120, 14069-14081	39
561	Mechanism of strong visible light photocatalysis by Ag ₂ O-nanoparticle-decorated monoclinic TiO ₂ (B) porous nanorods. 2016 , 27, 315703	70
560	Unraveling the Origin of Visible Light Capture by Core-shell TiO ₂ Nanotubes. 2016 , 28, 4467-4475	39
559	CdSxSe1-x nanowhiskers sensitized Nitrogen-doped TiO ₂ : 3D-branched photoelectrode and its photoelectrochemical properties. 2016 , 469-470, 79-87	3
558	Surface defect engineering: gigantic enhancement in the optical and gas detection ability of metal oxide sensor. 2016 , 6, 65146-65151	7
557	N-Doped TiO ₂ Nanobelts with Coexposed (001) and (101) Facets and Their Highly Efficient Visible-Light-Driven Photocatalytic Hydrogen Production. 2016 , 8, 18126-31	134
556	Constructing Ru/TiO ₂ Heteronanostructures Toward Enhanced Photocatalytic Water Splitting via a RuO ₂ /TiO ₂ Heterojunction and Ru/TiO ₂ Schottky Junction. 2016 , 3, 1500631	49
555	Mussel-Directed Synthesis of Nitrogen-Doped Anatase TiO ₂ . 2016 , 55, 3031-5	23
554	Bandgap Engineering of Titanium-Oxo Clusters: Labile Surface Sites Used for Ligand Substitution and Metal Incorporation. 2016 , 55, 5160-5	146
553	Synergistic effect on the photocatalytic activity of N-doped TiO ₂ nanorods synthesised by novel route with exposed (110) facet. 2016 , 666, 38-49	58
552	Synthesis of carbon doped WO ₃ ·0.33H ₂ O hierarchical photocatalyst with improved photocatalytic activity. 2016 , 362, 182-190	29
551	Three way electron transfer of a CNB tri doped two-phase junction of TiO ₂ nanoparticles for efficient visible light photocatalytic dye degradation. 2016 , 6, 7854-7863	39
550	Surface synergism of Pd/H ₂ Ti ₃ O ₇ composite nanowires for catalytic and photocatalytic hydrogen production from ammonia borane. 2016 , 41, 3428-3435	22
549	Bandgap-designed TiO ₂ /SnO ₂ hollow hierarchical nanofibers: Synthesis, properties, and their photocatalytic mechanism. 2016 , 16, 251-260	42
548	Effect of metal ion doping on the optical properties and the deactivation of photocatalytic activity of ZnO nanopowder for application in sunscreens. 2016 , 288, 366-370	23
547	Core-shell amorphous cobalt phosphide/cadmium sulfide semiconductor nanorods for exceptional photocatalytic hydrogen production under visible light. 2016 , 4, 1598-1602	94
546	Synergistic promotion of solar-driven H ₂ generation by three-dimensionally ordered macroporous structured TiO ₂ -Au-CdS ternary photocatalyst. 2016 , 184, 182-190	117

545	Titanium oxynitride microspheres with the rock-salt structure for use as visible-light photocatalysts. 2016 , 4, 869-876	32
544	Fabrication and characterization of CdS/BiVO ₄ nanocomposites with efficient visible light driven photocatalytic activities. 2016 , 42, 4421-4428	37
543	Atomistic investigation into the mechanical behaviour of crystalline and amorphous TiO ₂ nanotubes. 2016 , 6, 28121-28129	10
542	Facile synthesis of a narrow-gap titanium dioxide anatase/rutile nanofiber film on titanium foil with high photocatalytic activity under sunlight. 2016 , 41, 10327-10334	12
541	Nitrogen doped anatase-rutile heterostructured nanotubes for enhanced photocatalytic hydrogen production: Promising structure for sustainable fuel production. 2016 , 41, 5865-5877	61
540	Synthesis, Structural and Optical Properties of Mn-Doped Ceria Nanoparticles: A Promising Catalytic Material. 2016 , 29, 265-273	25
539	Enhancement of photocatalytic activity of CaTiO ₃ through HNO ₃ acidification. 2016 , 322-323, 1-9	8
538	Core-Shell Vanadium Modified Titania@In ₂ S ₃ Hybrid Nanorod Arrays for Superior Interface Stability and Photochemical Activity. 2016 , 8, 9037-49	54
537	Fluoride concentration controlled TiO ₂ nanotubes: the interplay of microstructure and photocatalytic performance. 2016 , 6, 18333-18339	16
536	Cation ordering/disordering effects upon photocatalytic activity of CrNbO ₄ , CrTaO ₄ , Sr ₂ CrNbO ₆ and Sr ₂ CrTaO ₆ . 2016 , 41, 1550-1558	28
535	Simultaneously Controllable Doping Sites and the Activity of a W ^{VI} Codoped TiO ₂ Photocatalyst. 2016 , 6, 2745-2753	76
534	Origin of enhanced photocatalytic activity of F-doped CeO ₂ nanocubes. 2016 , 370, 427-432	32
533	Vertically aligned nitrogen doped (Sn,Nb)O ₂ nanotubes Robust photoanodes for hydrogen generation by photoelectrochemical water splitting. 2016 , 208, 1-14	25
532	A novel and efficient surfactant-free synthesis of Rutile TiO ₂ microflowers with enhanced photocatalytic activity. 2016 , 55, 38-43	15
531	TiO ₂ mesocrystal with nitrogen and fluorine codoping during topochemical transformation: Efficient visible light induced photocatalyst with the codopants. 2016 , 185, 181-188	47
530	TiO ₂ @Carbon Photocatalysts: The Effect of Carbon Thickness on Catalysis. 2016 , 8, 1903-12	87
529	Unprecedented photocatalytic activity of carbon coated/MoO ₃ core-shell nanoheterostructures under visible light irradiation. 2016 , 79, 1-7	27
528	Insights into enhanced visible-light photocatalytic activity of CeO ₂ doped with nonmetal impurity from the first principles. 2016 , 41, 200-208	35

527	Effect of Different Doping Order of V and N on the Photoelectrochemical and Photocatalytic Properties of TiO ₂ under Visible Light Irradiation from Nanotubular Titanic Acid Precursors. 2016 , 163, H42-H47	10
526	Effect of N-doping on visible light activity of TiO ₂ /BiO ₂ mixed oxide photocatalysts. 2016 , 4, 191-196	20
525	TiO ₂ as an active or supplemental material for lithium batteries. 2016 , 4, 14-31	144
524	Photoelectrocatalytic oxidation of bisphenol A over mesh of TiO ₂ /graphene/Cu ₂ O. 2016 , 183, 75-85	106
523	Effects of microwave condition on the formation and characteristics of TiO ₂ submicron-sized beads and its use in all-plastic flexible dye-sensitized solar cells. 2016 , 144, 7-13	12
522	N ₂ /Ar plasma induced doping of ordered mesoporous TiO ₂ thin films for visible light active photocatalysis. 2016 , 220, 120-128	48
521	Recent developments of zinc oxide based photocatalyst in water treatment technology: A review. 2016 , 88, 428-448	1284
520	Superhydrophobic surfaces with photocatalytic activity under UV and visible light irradiation. 2016 , 260, 32-38	40
519	Enhanced H ₂ production activity under solar irradiation over N-doped TiO ₂ prepared using pyridine as a precursor: a typical sample of N-doped TiO ₂ series. 2017 , 32, 52-63	7
518	Visible-light activity of N-LiInO ₂ : Band structure modifications through interstitial nitrogen doping. 2017 , 391, 645-653	6
517	Effects of Defects on Photocatalytic Activity of Hydrogen-Treated Titanium Oxide Nanobelts. 2017 , 7, 1742-1748	129
516	Enhanced visible light photocatalytic activity in N-doped edge- and corner-truncated octahedral Cu ₂ O. 2017 , 65, 22-28	11
515	Sunlight driven high photocatalytic activity of Sn doped N-TiO ₂ nanoparticles synthesized by a microwave assisted method. 2017 , 43, 5164-5172	41
514	Tuning the near-gap electronic structure of Cu ₂ O by anion/cation co-doping for enhanced solar energy conversion. 2017 , 31, 1650429	4
513	N-Doped Mesoporous In ₂ O ₃ for Photocatalytic Oxygen Evolution from the In-based Metal-Organic Frameworks. 2017 , 23, 7264-7271	27
512	Study of the role of oxygen vacancies as active sites in reduced graphene oxide-modified TiO ₂ . 2017 , 19, 7307-7315	31
511	Tubular nitrogen-doped TiO ₂ samples with efficient photocatalytic properties based on long-lived charge separation under visible-light irradiation: synthesis, characterization and reactivity. 2017 , 46, 4435-4451	7
510	Tuning optical band gap by electrochemical reduction in TiO ₂ nanorods for improving photocatalytic activities. 2017 , 7, 6202-6208	19

509	Optimization of sol-gel synthesis parameters in the preparation of N-doped TiO ₂ using surface response methodology. 2017 , 82, 322-334	15
508	Structure and Photocatalytic Activity of Nitrogen-doped HTiNbO ₅ Nanosheet Aggregation. 2017 , 12, 1750003	7
507	Unique Zinc Germanium Oxynitride Hyperbranched Nanostructures with Enhanced Visible-Light Photocatalytic Activity for CO ₂ Reduction. 2017 , 2017, 2195-2200	18
506	In situ fabrication of Ni nanoparticles on N-doped TiO ₂ nanowire arrays by nitridation of NiTiO ₂ for highly sensitive and enzyme-free glucose sensing. 2017 , 5, 1779-1786	15
505	Photoanodes based on TiO ₂ and FeO for solar water splitting - superior role of 1D nanoarchitectures and of combined heterostructures. 2017 , 46, 3716-3769	385
504	Synthesis and photocatalytic activities of H ₂ Ti ₆ O ₁₃ nanofibers and anatase TiO ₂ nanofibers with high-density nanocavities. 2017 , 712, 549-554	5
503	Morphological Effect in Photocatalytic Degradation of Direct Blue over Mesoporous TiO ₂ catalysts. 2017 , 2, 3282-3288	8
502	Electron transport and visible light absorption in a plasmonic photocatalyst based on strontium niobate. 2017 , 8, 15070	48
501	Enhanced visible light harnessing and oxygen vacancy promoted N, S co-doped CeO ₂ nanoparticle: a challenging photocatalyst for Cr(VI) reduction. 2017 , 7, 2772-2781	57
500	Surface-Plasmon-Resonance-Enhanced Photoelectrochemical Water Splitting from Au-Nanoparticle-Decorated 3D TiO ₂ Nanorod Architectures. 2017 , 121, 12071-12079	63
499	Boosting Supercapacitor Performance of TiO ₂ Nanobelts by Efficient Nitrogen Doping. 2017 , 4, 2328-2335	9
498	Visible light photocatalysts (Fe, N):TiO ₂ from ammonothermally processed, solvothermal self-assembly derived Fe-TiO ₂ mesoporous microspheres. 2017 , 195, 259-267	16
497	Single-step One-pot Synthesis of TiO ₂ Nanosheets Doped with Sulfur on Reduced Graphene Oxide with Enhanced Photocatalytic Activity. 2017 , 7, 46610	34
496	Simultaneous Ni Doping at Atom Scale in Ceria and Assembling into Well-Defined Lotuslike Structure for Enhanced Catalytic Performance. 2017 , 9, 16243-16251	22
495	Preparation of direct Z-scheme Bi ₂ Sn ₂ O ₇ /g-C ₃ N ₄ composite with enhanced photocatalytic performance. 2017 , 335, 130-139	35
494	Creating Carbon-Oxygen Bonds over TiO ₂ Nanofibers for Synergistic Benefits of Visible-Light Response and Charge Separation toward Photocatalysis. 2017 , 4, 1600795	6
493	Recent Progress in the Development of Semiconductor-Based Photocatalyst Materials for Applications in Photocatalytic Water Splitting and Degradation of Pollutants. 2017 , 1, 1700006	88
492	Nitrogen-doped Ti ₃ C ₂ T _x MXene electrodes for high-performance supercapacitors. 2017 , 38, 368-376	348

491	Preparation of magnetic imprinted graphene oxide composite for catalytic degradation of Congo red under dark ambient conditions. 2017 , 76, 1676-1686	5
490	Metal clusters: New era of hydrogen production. 2017 , 79, 878-892	34
489	Activation of solid grinding-derived Au/TiO ₂ photocatalysts for solar H ₂ production from water-methanol mixtures with low alcohol content. 2017 , 352, 22-34	35
488	Photocatalytic performance of different exposed crystal facets of BiOCl. 2017 , 6, 48-56	27
487	The role of active species in the N ₂ and N ₂ -H ₂ RF afterglows on selective surface nitriding of ALD-grown TiO ₂ films. 2017 , 324, 243-248	7
486	Theoretical and experimental studies on three water-stable, isostructural, paddlewheel based semiconducting metal-organic frameworks. 2017 , 46, 8204-8218	18
485	Band structure engineering strategies of metal oxide semiconductor nanowires and related nanostructures: A review. 2017 , 32, 073001	15
484	Molecular p-n heterojunction-enhanced visible-light hydrogen evolution over a N-doped TiO ₂ photocatalyst. 2017 , 7, 2039-2049	21
483	Photosensitization of TiO nanofibers by AgS with the synergistic effect of excess surface Ti states for enhanced photocatalytic activity under simulated sunlight. 2017 , 7, 255	39
482	Optimization of Fe ₂ O ₃ @Fe ₃ O ₄ incorporated N-TiO ₂ as super effective photocatalysts under visible light irradiation. 2017 , 412, 668-682	34
481	Observation of reduced phase transition temperature in N-doped thermochromic film of monoclinic VO ₂ . 2017 , 410, 363-372	32
480	A reusable surface-quaternized nanocellulose-based hybrid cryogel loaded with N-doped TiO ₂ for self-integrated adsorption/photo-degradation of methyl orange dye. 2017 , 7, 17279-17288	21
479	Effect of nitridation on visible light photocatalytic behavior of microporous (Ag, Ag ₂ O) co-loaded TiO ₂ . 2017 , 240, 137-144	14
478	Programmed Synthesis of Sn ₃ N ₄ Nanoparticles via a Soft Chemistry Approach with Urea: Application for Ethanol Vapor Sensing. 2017 , 29, 969-974	39
477	N-doped ZnO/MoS ₂ binary heterojunctions: the dual role of 2D MoS ₂ in the enhancement of photostability and photocatalytic activity under visible light irradiation for tetracycline degradation. 2017 , 1, 1093-1106	101
476	Spaced TiO ₂ nanotube arrays allow for a high performance hierarchical supercapacitor structure. 2017 , 5, 1895-1901	52
475	Mixed-phase TiO ₂ photocatalysis: correlation between phase composition and photodecomposition of water pollutants. 2017 , 37, 11-28	10
474	Metal-free photocatalysts for various applications in energy conversion and environmental purification. 2017 , 19, 882-899	212

473	Laser synthesized TiO-based nanoparticles and their efficiency in the photocatalytic degradation of linear carboxylic acids. 2017 , 18, 805-815	6
472	Mesoporous TiO ₂ /g-C ₃ N ₄ Microspheres with Enhanced Visible-Light Photocatalytic Activity. 2017 , 121, 22114-22122	89
471	Visible Emission in Nanocrystalline Rutile: Free Exciton and Water as Probes for Midgap States in Adsorption/Desorption Using Conventional and Synchronous Luminescence Spectroscopy. 2017 , 121, 21985-21994	5
470	Enhanced photocatalytic activity of Fe-doped TiO ₂ coated on N-doped activated carbon composites for photocatalytic degradation of dyeing wastewater. 2017 ,	6
469	Investigation of Mn ₂ O ₃ as impurity on the electrochemical hydrogen storage performance of MnO ₂ CeO ₂ nanocomposites. 2017 , 42, 28473-28484	27
468	p-Arsanilic acid stabilizing titanium-oxo clusters with various core structures and light absorption behaviours. 2017 , 86, 14-17	3
467	Unraveling the Intrinsic Structures that Influence the Transport of Charges in TiO ₂ Electrodes. 2017 , 7, 1700886	19
466	CO Reduction: From the Electrochemical to Photochemical Approach. 2017 , 4, 1700194	408
465	Design Synthesis of Nitrogen-Doped TiO ₂ @Carbon Nanosheets toward Selective Nitroaromatics Reduction under Mild Conditions. 2017 , 7, 6991-6998	24
464	NaBH ₄ modified TiO ₂ : Defect site enhancement related to its photocatalytic activity. 2017 , 199, 571-576	52
463	Growth of nitrogen-doped rutile TiO ₂ nanorod arrays and their improved performance in all-solid-state solar cells. 2017 , 4, 075023	2
462	Biotemplating synthesis and photocatalytic activities of N-doped CeO ₂ microcapsule tailored by hemerocallis pollen. 2017 , 28, 2741-2746	14
461	Engineering defects and photocatalytic activity of TiO nanoparticles by thermal treatments in NH ₃ and subsequent surface chemical etchings. 2017 , 19, 24049-24058	6
460	Carbon Nitride Polymer Sensitization and Nitrogen Doping of SrTiO ₃ /TiO ₂ Nanotube Heterostructure toward High Visible Light Photocatalytic Performance. 2017 , 56, 9999-10008	41
459	Face-to-Face Interfacial Assembly of Ultrathin g-CN and Anatase TiO Nanosheets for Enhanced Solar Photocatalytic Activity. 2017 , 9, 28674-28684	116
458	Role of Cl Ion Desorption in Photocurrent Enhancement of the Annealed Rutile Single-Crystalline TiO ₂ Nanorod Arrays. 2017 , 121, 18892-18899	12
457	Amine coupled ordered mesoporous (Co/Ni) co-doped TiO ₂ : a green photocatalyst for the selective aerobic oxidation of thioether. 2017 , 7, 4182-4192	12
456	Metastable titanium dioxide B-phase nanowire prepared by hydrothermal method. 2017 ,	3

455	Synthesis, characterization, and antibacterial activity of sodium and boron doped zirconium oxide nanosphere by a liquid phase method. 2017 , 145, 142-147	3
454	Platinum loaded on dual-doped TiO ₂ as an active and durable oxygen reduction reaction catalyst. 2017 , 9, e403-e403	26
453	Preparation of new visible-light driven nanocomposite photocatalysts, X/NaTaO ₃ /Er ³⁺ :YAlO ₃ (X = Ag, Au and Pt), for photocatalytic conversion of Cr(VI). 2017 , 54, 398-407	9
452	A newly designed porous oxynitride photoanode with enhanced charge carrier mobility. 2017 , 39, 172-182	18
451	Green sol-gel route for selective growth of 1D rutile NbTiO ₂ : a highly active photocatalyst for H ₂ generation and environmental remediation under natural sunlight. 2017 , 7, 33029-33042	22
450	Experimental and Theoretical Insights into Influence of Hydrogen and Nitrogen Plasma on the Water Splitting Performance of ALD Grown TiO ₂ Thin Films. 2017 , 121, 15538-15548	10
449	One-step synthesis of ultrathin nanobelts-assembled urchin-like anatase TiO ₂ nanostructures for highly efficient photocatalysis. 2017 , 19, 129-136	49
448	Novel chromium doped perovskites A ₂ ZnTiO ₆ (A = Pr, Gd): Synthesis, crystal structure and photocatalytic activity under simulated solar light irradiation. 2017 , 393, 348-356	13
447	Novel cake-like N-doped anatase/rutile mixed phase TiO ₂ derived from metal-organic frameworks for visible light photocatalysis. 2017 , 43, 835-840	45
446	A Visible Light Photocatalyst of Carbonate-Like Species Doped TiO ₂ . 2017 , 100, 333-342	11
445	Photocatalytic activity of CaTiO ₃ synthesized by solid state, sol-gel and hydrothermal methods. 2017 , 81, 806-813	29
444	New insights into the support morphology-dependent ammonia synthesis activity of Ru/CeO ₂ catalysts. 2017 , 7, 191-199	76
443	Photoelectrochemical performances of the SnO ₂ -TiO ₂ bilayer composite films prepared by a facile liquid phase deposition method. 2017 , 692, 227-235	12
442	Functionalization of cotton fabrics with plasmonic photo-active nanostructured Au-TiO layer. 2017 , 176, 336-344	15
441	Electrochemical Enhancement of Photocatalytic Disinfection on Aligned TiO ₂ and Nitrogen Doped TiO ₂ Nanotubes. 2017 , 22,	27
440	Fast and Large-Scale Anodizing Synthesis of Pine-Cone TiO ₂ for Solar-Driven Photocatalysis. 2017 , 7, 229	8
439	Mesoporous Titania: Synthesis, Properties and Comparison with Non-Porous Titania. 2017 ,	4
438	Photodegradation of Methyl Orange in Aqueous Solution by the Visible Light Active Co:La:TiO ₂ Nanocomposite. 2017 , 08,	3

437	Fabrication of Visible-light Responsive N-doped TiO ₂ Nanorod Films via a Top-down Sol-gel Deposition Method Using NH ₄ TiOF ₃ Single Crystals. 2018 , 47, 628-631	1
436	Solar energy conversion on g-C ₃ N ₄ photocatalyst: Light harvesting, charge separation, and surface kinetics. 2018 , 27, 1111-1123	102
435	Environmentally friendly wollastonite@TiO ₂ composite particles prepared by a mechano-chemical method. 2018 , 40, 105-112	6
434	Facile synthesis of C-decorated Fe, N co-doped TiO ₂ with enhanced visible-light photocatalytic activity by a novel co-precursor method. 2018 , 39, 747-759	26
433	Construction of urchin-like ZnIn ₂ S ₄ -Au-TiO ₂ heterostructure with enhanced activity for photocatalytic hydrogen evolution. 2018 , 234, 260-267	124
432	Optimizing the efficiency of perovskite solar cells by a sub-nanometer compact titanium oxide electron transport layer. 2018 , 49, 230-236	13
431	Formation of Anisotropic Nanostructures on Rutile TiO ₂ (110) Surfaces and Their Photo-Absorption Properties. 2018 , 49, 3117-3121	3
430	Recent progress in ultrathin two-dimensional semiconductors for photocatalysis. 2018 , 130, 1-39	88
429	Electronic Structure of Titania Nanosheets With Vacancies Based on Nonadiabatic Quantum Molecular Dynamics Simulations. 2018 , 255, 1700689	3
428	Ultrafast one-step synthesis of N and Ti ³⁺ codoped TiO ₂ nanosheets via energetic material deflagration. 2018 , 11, 4735-4743	16
427	Effect of catalyst calcination temperature in the visible light photocatalytic oxidation of gaseous formaldehyde by multi-element doped titanium dioxide. 2018 , 25, 15216-15225	28
426	Metal Nanoparticles for Diagnosis and Therapy of Bacterial Infection. 2018 , 7, e1701392	92
425	Novel Green Biomimetic Approach for Preparation of Highly Stable Au-ZnO Heterojunctions with Enhanced Photocatalytic Activity. 2018 , 1, 1870-1878	40
424	Tricomponent brookite/anatase TiO ₂ /g-C ₃ N ₄ heterojunction in mesoporous hollow microspheres for enhanced visible-light photocatalysis. 2018 , 6, 7236-7245	56
423	Simple plasma assisted atomic layer deposition technique for high substitutional nitrogen doping of TiO ₂ . 2018 , 36, 031602	5
422	Nanomaterials for treating emerging contaminants in water by adsorption and photocatalysis: Systematic review and bibliometric analysis. 2018 , 627, 1253-1263	156
421	A Rational Design for Enhanced Catalytic Activity and Durability: Strongly Coupled N-Doped CrO _x /Ce _{0.2} Zr _{0.8} O ₂ Nanoparticle Composites. 2018 , 1, 1150-1163	9
420	Plasma-Assisted Synthesis and Surface Modification of Electrode Materials for Renewable Energy. 2018 , 30, e1705850	323

4 ¹⁹	Synthesis of highly water-dispersible N-doped anatase titania based on low temperature solvent-thermal method. 2018 , 11, 871-879	5
4 ¹⁸	Growth of rutile TiO nanorods in Ti and Cu ion sequentially implanted SiO and the involved mechanisms. 2018 , 29, 025601	3
4 ¹⁷	Exploration of Ag decoration and Bi doping on the photocatalytic activity of Fe ₂ O ₃ under simulated solar light irradiation. 2018 , 96, 1713-1722	3
4 ¹⁶	Novel multistage fixed-bed photoreactor for bacterial inactivation using N-doped TiO ₂ nanoparticles under vis-LEDs and sunlight illumination. 2018 , 3, 1	6
4 ¹⁵	High-efficiency and conveniently recyclable photo-catalysts for dye degradation based on urchin-like CuO microparticle/polymer hybrid composites. 2018 , 439, 784-791	13
4 ¹⁴	A facile strategy for the synthesis of ferroferric oxide/titanium dioxide/molybdenum disulfide heterostructures as a magnetically separable photocatalyst under visible-light. 2018 , 516, 138-144	10
4 ¹³	Graphdiyne-hybridized N-doped TiO ₂ nanosheets for enhanced visible light photocatalytic activity. 2018 , 53, 8921-8932	29
4 ¹²	PAMAM templated N,Pt co-doped TiO for visible light photodegradation of brilliant black. 2018 , 25, 15146-15168	
4 ¹¹	Fe ₂ O ₃ /ZnO/ZnFe ₂ O ₄ composites for the efficient photocatalytic degradation of organic dyes under visible light. 2018 , 80, 6-14	19
4 ¹⁰	Sustainable photocatalytic activities of visible-light sensitive N-doped TiO ₂ microspheres with permeable silica shells. 2018 , 558, 9-17	8
4 ⁰⁹	Rice spike-like g-C ₃ N ₄ /TiO ₂ heterojunctions with tight-binding interface by using sodium titanate ultralong nanotube as precursor and template. 2018 , 44, 8125-8132	15
4 ⁰⁸	The synergistic effect of nitrogen-doped titanium dioxide/mercaptobenzoic acid/silver nanocomplexes for surface-enhanced Raman scattering. 2018 , 20, 1	1
4 ⁰⁷	High Electrochemical Sensitivity of TiO Nanosheets and an Electron-Induced Mutual Interference Effect toward Heavy Metal Ions Demonstrated Using X-ray Absorption Fine Structure Spectra. 2018 , 90, 4328-4337	34
4 ⁰⁶	Impact of cobalt as dopant on surface morphologies of undoped ZnO nanostructured thin films. 2018 , 13, e2183	
4 ⁰⁵	Potassium ions intercalated into g-CN-modified TiO nanobelts for the enhancement of photocatalytic hydrogen evolution activity under visible-light irradiation. 2018 , 29, 215706	9
4 ⁰⁴	TiO ₂ -Graphene-Based Composites: Synthesis, Characterization, and Application in Photocatalysis of Organic Pollutants. 2018 , 95-122	1
4 ⁰³	Synthesis of hierarchical ZnO&Graphene composites with enhanced photocatalytic activity. 2018 , 44, 849-856	37
4 ⁰²	Nanostructured photocatalysis in the visible spectrum for the decontamination of air and water. 2018 , 63, 257-282	30

401	Synthesis and enhanced visible-light activity of N-doped TiO ₂ nano-additives applied over cotton textiles. 2018 , 7, 204-211	15
400	Nitrogen-doped simple and complex oxides for photocatalysis: A review. 2018 , 92, 33-63	189
399	Effect of doping on the properties and photocatalytic performance of titania thin films on glass substrates: Single-ion doping with Cobalt or Molybdenum. 2018 , 205, 334-346	25
398	Tungsten and nitrogen co-doped TiO ₂ nanobelts with significant visible light photoactivity. 2018 , 50, 146-153	1
397	Species, engineering and characterizations of defects in TiO ₂ -based photocatalyst. 2018 , 29, 671-680	45
396	Direct growth of Cr-doped TiO ₂ nanosheet arrays on stainless steel substrates with visible-light photoelectrochemical properties. 2018 , 42, 1309-1315	11
395	Enhanced optical and photoelectrochemical performance of single-crystalline TiO ₂ nanorod arrays with exposed {001} facets sensitized with CdS nanosheets. 2018 , 24, 1537-1544	2
394	Self-cleaning and spectral attributes of erbium doped sodium-zinc-tellurite glass: Role of titania nanoparticles. 2018 , 481, 225-238	9
393	Preparation of p-type GaN-doped SnO ₂ thin films by e-beam evaporation and their applications in p-n junction. 2018 , 427, 64-68	13
392	A study on selective surface nitridation of TiO ₂ nanocrystals in the afterglows of N ₂ and N ₂ -O ₂ microwave plasmas. 2018 , 432, 163-169	4
391	Visible-light-driven oxygen vacancies and Ti ³⁺ co-doped TiO ₂ coatings prepared by mechanical coating and carbon reduction. 2018 , 97, 13-18	37
390	Ag-Cu nanoparticles supported on N-doped TiO ₂ nanowire arrays for efficient photocatalytic CO ₂ reduction. 2018 , 31, 695-700	2
389	Comparing the Efficiency of N-Doped TiO ₂ and N-Doped Bi ₂ MoO ₆ Photo Catalysts for MB and Lignin Photodegradation. 2018 , 8, 668	7
388	Energy band engineering of metal oxide for enhanced visible light absorption. 2018 , 49-78	7
387	Nanoplasmon Semiconductor Hybrid for Interface Catalysis. 2018 , 8, 429	1
386	Nano gold-coated surface patterned mesoporous titanium tin oxide sol-gel thin film: fabrication, optical and photoelectrochemical properties. 2018 , 88, 359-370	3
385	A Novel Synthetic Method for N Doped TiO Nanoparticles Through Plasma-Assisted Electrolysis and Photocatalytic Activity in the Visible Region. 2018 , 6, 458	20
384	Fabrication of Hollow Mesoporous @Au Microspheres with High Photocatalytic Activity for Hydrogen Evolution from Water under Visible Light. 2018 , 6, 13766-13777	32

383	N-doped TiO ₂ /sepiolite nanocomposites with enhanced visible-light catalysis: Role of N precursors. 2018 , 166, 9-17	36
382	Enhanced photocatalytic hydrogen evolution activity of carbon and nitrogen self-doped TiO ₂ hollow sphere with the creation of oxygen vacancy and Ti ³⁺ . 2018 , 10, 132-140	56
381	Defect engineering in photocatalytic materials. 2018 , 53, 296-336	417
380	Doping bismuth oxyhalides with Indium: A DFT calculations on tuning electronic and optical properties. 2018 , 705, 31-37	13
379	Enhanced light trapping and high charge transmission capacities of novel structures for efficient photoelectrochemical water splitting. 2018 , 10, 11881-11893	44
378	Irreversible surface changes upon n-type doping [A photoelectrochemical study on rutile single crystals. 2018 , 280, 278-289	4
377	Solar light active plasmonic Au@TiO ₂ nanocomposite with superior photocatalytic performance for H ₂ production and pollutant degradation. 2018 , 42, 10958-10968	47
376	Novel one-step synthesis of nitrogen-doped TiO ₂ by flame aerosol technique for visible-light photocatalysis: Effect of synthesis parameters and secondary nitrogen (N) source. 2018 , 350, 324-334	51
375	First-Principles Calculations on the Group-IIIA Elements X-Doped (X = Ga, In, Tl) VO ₂ . 2018 , 255, 1800138	1
374	In situ infrared study of photo-generated electrons and adsorbed species on nitrogen-doped TiO in dye-sensitized solar cells. 2018 , 20, 19572-19580	3
373	Structural and Electronic Properties of Na ₂ Ti ₃ O ₇ and H ₂ Ti ₃ O ₇ . 2018 , 255, 1700612	6
372	Lanthanide Doped Near Infrared Active Upconversion Nanophosphors: Fundamental Concepts, Synthesis Strategies, and Technological Applications. 2018 , 14, e1801304	62
371	Few-layers MoS ₂ sensitized Ag ₃ TiO ₂ nanocomposite thin film for enhancing photocatalytic activity. 2018 , 29, 16282-16288	13
370	Photocatalytic Degradation of Tetracycline Hydrochloride via a CdS-TiO ₂ Heterostructure Composite under Visible Light Irradiation. 2018 , 8,	17
369	Diagnostics of Plasma Behavior and TiO ₂ Properties Based on DBD/TiO ₂ Hybrid System. 2018 , 38, 1239-1258	11
368	Titanium dioxide nanostructures for photoelectrochemical applications. 2018 , 98, 299-385	148
367	Nitrogen-doped graphene and graphene quantum dots: A review on synthesis and applications in energy, sensors and environment. 2018 , 259, 44-64	196
366	Manipulation of surface plasmon resonance of sputtered gold-nanoparticles on TiO ₂ nanostructured films for enhanced photoelectrochemical water splitting efficiency. 2018 , 661, 32-39	4

- 365 In Situ Doping System To Improve the Electric-Field-Induced Fluorescence Properties of CdZnS/ZnS Quantum Rods for Light-Emitting Devices. **2018**, 1, 4278-4282
- 364 Density Functional Theory Investigation of the Role of Cocatalytic Water in the Water Gas Shift Reaction over Anatase TiO₂ (101). **2018**, 57, 6830-6841 4
- 363 Black TiO₂ synthesized via magnesiothermic reduction for enhanced photocatalytic activity. **2018**, 20, 1 11
- 362 Single-step rapid aerosol synthesis of N-doped TiO₂ for enhanced visible light photocatalytic activity. **2018**, 113, 1-5 40
- 361 TiO/TiN core/shell nanobelts for efficient solar hydrogen generation. **2018**, 54, 6056-6059 26
- 360 Dye-Sensitized Solar Cells Based on an N-Doped TiO₂ and TiO₂-Graphene Composite Electrode. **2018**, 47, 6241-6250 7
- 359 Effects of alloying elements on the stability of TiO₂ and their diffusion properties studied by first principles calculations. **2018**, 17, 40-45 3
- 358 Solar photocatalysis with modified TiO₂ photocatalysts: effects on NOM and disinfection byproduct formation potential. **2018**, 4, 1361-1376 14
- 357 Chemometrical analysis of proteomics data obtained from three cell types treated with multi-walled carbon nanotubes and TiO nanobelts. **2018**, 29, 567-577 3
- 356 Anthocyanin-Sensitized TiO₂ Nanoparticles for Phenazopyridine Photodegradation under Solar Simulated Light. **2018**, 2018, 1-14 15
- 355 In Situ Formation of Pyridine-Type Carbonitrides-Modified Disorder-Engineered C-TiO₂ Used for Enhanced Visible-Light-Driven Photocatalytic Hydrogen Evolution. **2018**, 122, 18870-18879 13
- 354 Combining nanostructuring with boron doping to alter sub band gap acceptor states in diamond materials. **2018**, 6, 16645-16654 9
- 353 Wet-chemical synthesis and characterization of nitrogen-doped CeO₂ powders for oxygen storage capacity. **2018**, 455, 997-1004 7
- 352 Up-conversion processes in Ln(III)-doped luminescent materials for photovoltaics and photocatalysis. **2018**, 291-333 1
- 351 Porous N-doped TiO₂ nanotubes arrays by reverse oxidation of TiN and their visible-light photocatalytic activity. **2019**, 365, 237-241 15
- 350 Alkali Metal Chloride Flux Growth of Ilmenite-Type ZnTiO₃ and Subsequent Nitrogen Doping for Visible-Light-Driven Water Oxidation Catalysis. **2019**, 2, 7762-7771 5
- 349 Ferroelectric Polarization-Enhanced Photocatalysis in BaTiO-TiO Core-Shell Heterostructures. **2019**, 9, 19
- 348 Green synthesized carbon quantum dots as TiO₂ sensitizers for photocatalytic hydrogen evolution. **2019**, 44, 21781-21789 37

347	Construction of covalently integrated core-shell TiO ₂ nanobelts@COF hybrids for highly selective oxidation of alcohols under visible light. 2019 , 493, 551-560	32
346	Evidence for plasmonic hot electron injection induced superior visible light photocatalysis by g-C ₃ N ₄ nanosheets decorated with Ag ⁺ /TiO ₂ (B) and Au ⁺ /TiO ₂ (B) nanorods. 2019 , 201, 110053	21
345	Capturing the Long-Lived Photogenerated Electrons in Au/TiO ₂ upon UV or Visible Irradiation by Time-Resolved Infrared Spectroscopy. 2019 , 123, 20325-20332	7
344	Supersensitive Photoelectrochemical Aptasensor Based on Br,N-Codoped TiO Sensitized by Quantum Dots. 2019 , 91, 10864-10869	34
343	Facile synthesis of Ti ³⁺ self-doped and sulfur-doped TiO ₂ nanotube arrays with enhanced visible-light photoelectrochemical performance. 2019 , 804, 10-17	21
342	Tuning Intercrystalline Void-like Defects in Nanowire Clusters to TiO ₂ Quantum Wires with Enhanced Photocatalytic Performance. 2019 , 2, 5643-5655	1
341	A wide visible light active photocatalyst Mg ₅ Ta ₄ O _{15-x} N _y for water oxidation and reduction. 2019 , 44, 28173-28183	1
340	Semiconductor Photocatalyst Interfacial Electron Transfer Dominates Photocatalytic Reaction. 2019 , 123, 24404-24408	13
339	Synthesis of Bi/BiOCl/PVP hybrids with efficient photocatalytic activity. 2019 , 6, 105078	1
338	Tunable Visible-Light Surface Plasmon Resonance of Molybdenum Oxide Thin Films Fabricated by E-beam Evaporation. 2019 , 1, 2389-2395	16
337	One-pot synthesis of Au/N-TiO ₂ photocatalysts for environmental applications: Enhancement of dyes and NO _x photodegradation. 2019 , 355, 793-807	28
336	Understanding Reaction Kinetics by Tailoring Metal Co-catalysts of the BiVO Photocatalyst. 2019 , 4, 16597-16603	3
335	Photocatalytic water splitting by N-TiO on MgO (111) with exceptional quantum efficiencies at elevated temperatures. 2019 , 10, 4421	76
334	Effective Antibacterial Glass Fiber Membrane Prepared by Plasma-Enhanced Chemical Grafting. 2019 , 4, 16591-16596	9
333	Significant band gap narrowing of reduced monoclinic TiO ₂ -B porous nanowire decorated by ternary hybrid of Cu/Cu ₂ O-nanoparticle for efficient visible light absorption. 2019 , 18, 1430-1434	1
332	The formation and detection techniques of oxygen vacancies in titanium oxide-based nanostructures. 2019 , 11, 3414-3444	179
331	Visible light photocatalysis of pristine anatase TiO ₂ mesocrystals induced by largely exposed and stepped {001} surface. 2019 , 21, 483-490	13
330	Boosting the Yield of MXene 2D Sheets via a Facile Hydrothermal-Assisted Intercalation. 2019 , 11, 8443-8452	95

329	Plasmonic TiN boosting nitrogen-doped TiO ₂ for ultrahigh efficient photoelectrochemical oxygen evolution. 2019 , 246, 21-29	36
328	Nanostructuring Confinement for Controllable Interfacial Charge Transfer. 2019 , 15, e1804391	10
327	Investigation of TiO ₂ doped with nitrogen and vanadium using hydrothermal/Sol-Gel method and its application for dyes photodegradation. 2019 , 26, 242-253	4
326	Photocatalytic H ₂ generation from aqueous ammonia solution using TiO ₂ nanowires-intercalated reduced graphene oxide composite membrane under low power UV light. 2019 , 2, 303-311	18
325	Theory assisted design of N-doped tin oxides for enhanced electrochemical CO ₂ activation and reduction. 2019 , 62, 1030-1036	17
324	High yield synthesis of homogeneous boron doping C ₃ N ₄ nanocrystals with enhanced photocatalytic property. 2019 , 489, 631-638	17
323	Facile surface modification of immobilized rutile nanoparticles by non-thermal glow discharge plasma: Effect of treatment gases on photocatalytic process. 2019 , 490, 266-277	21
322	Novel Tm ³⁺ and Yb ³⁺ co-doped bismuth tungstate up-conversion photocatalyst with greatly improved photocatalytic properties. 2019 , 380, 111864	17
321	Bioprocess-inspired fabrication of materials with new structures and functions. 2019 , 105, 100571	45
320	Critical Aspects and Recent Advances in Structural Engineering of Photocatalysts for Sunlight-Driven Photocatalytic Reduction of CO ₂ into Fuels. 2019 , 29, 1901825	173
319	Perylene-3,4,9,10-tetracarboxylic acid accelerated light-driven water oxidation on ultrathin indium oxide porous sheets. 2019 , 254, 667-676	9
318	N-Doped TiO Photocatalyst Coatings Synthesized by a Cold Atmospheric Plasma. 2019 , 35, 7161-7168	20
317	Efficient Charge Carrier Separation in l-Alanine Acids Derived N-TiO Nanospheres: The Role of Oxygen Vacancies in Tetrahedral Ti Sites. 2019 , 9,	8
316	Defect Chemistry of Er ³⁺ -Doped TiO ₂ and Its Photocatalytic Activity for the Degradation of Flowing Gas-Phase VOCs. 2019 , 123, 12321-12334	39
315	A highly efficient TiOX (X = N and P) photocatalyst for inactivation of <i>Microcystis aeruginosa</i> under visible light irradiation. 2019 , 222, 99-108	23
314	Correlation between the H ₂ response and its oxidation over TiO ₂ and N doped TiO ₂ under UV irradiation induced by Fermi level. 2019 , 250, 89-98	32
313	Exciton-Plasmon Interactions in Noble Metal-Semiconductor Oxide Hybrid Nanostructures. 2019 , 157-178	
312	Mechanistic understanding of enhanced photocatalytic activity of N-doped BiVO ₄ towards degradation of ibuprofen: An experimental and theoretical approach. 2019 , 470, 8-18	15

311	C,N-Codoped TiO ₂ with a Nitrogen-Doped Carbon Coating Derived from 2,6-Diaminopyridine for Visible Light-Induced Photocatalytic Hydrogen Evolution. 2019 , 123, 9702-9712	18
310	The role of hydrogen in the nitriding of anatase TiO ₂ films in the N ₂ -H ₂ microwave afterglows. 2019 , 364, 341-346	4
309	Ab initio nonadiabatic molecular dynamics investigations on the excited carriers in condensed matter systems. 2019 , 9, e1411	80
308	Photoelectrocatalytic Hydrogen Generation Enabled by CdS Passivated ZnCuInSe Quantum Dot-Sensitized TiO ₂ Decorated with Ag Nanoparticles. 2019 , 9,	7
307	Ultrathin FeOOH nanosheets as an efficient cocatalyst for photocatalytic water oxidation. 2019 , 7, 9222-9229	63
306	A facile design of nucleocapsid-like Au@NiO@CuO nanocomposites with MWCNT for glucose sensing. 2019 , 841, 36-44	11
305	Recent Advances in the Disinfection of Water Using Nanoscale Antimicrobial Materials. 2019 , 4, 1800213	16
304	Microwave induced surface enhanced pollutant adsorption and photocatalytic degradation on Ag/TiO ₂ . 2019 , 483, 772-778	80
303	Modulation of terahertz properties of 3D ceramic photonic crystals via post-creation non-metal anion doping treatment. 2019 , 102, 4688-4697	3
302	Low-Temperature In Situ Amino Functionalization of TiO Nanoparticles Sharpens Electron Management Achieving over 21% Efficient Planar Perovskite Solar Cells. 2019 , 31, e1806095	136
301	Surface nitrogen-modified 2D titanium carbide (MXene) with high energy density for aqueous supercapacitor applications. 2019 , 7, 5416-5425	80
300	Radiative and Non-Radiative Recombination Pathways in Mixed-Phase TiO ₂ Nanotubes for PEC Water-Splitting. 2019 , 9, 204	25
299	Construction of Fe ₂ O ₃ and Fe/Co-N ₄ structures with faceted TiO ₂ nanocrystals for highly efficient degradation of sulfathiazole in water. 2019 , 220, 668-676	12
298	Development of novel TiO ₂ -Cu ₂ (OH)PO ₄ heterojunction as nanophotocatalyst for improved Cr (VI) reduction. 2019 , 7, 102968	12
297	Titanium Dioxide: From Engineering to Applications. 2019 , 9, 191	162
296	Application of silver phosphate-based photocatalysts: Barriers and solutions. 2019 , 366, 339-357	61
295	Defect processes in F and Cl doped anatase TiO. 2019 , 9, 19970	18
294	Visible light photocatalytic water oxidation over complex perovskites Sr ₃ Bn ₂ O ₉ (B = Mg, Ca and Sr) doped with nitrogen. 2019 , 6, 3569-3576	3

- 293 Catalytic enhancement on TiZr complex oxide particles for electrochemical hydrogenation of oxalic acid to produce an alcoholic compound by controlling electronic states and oxide structures. **2019**, 9, 6561-6565 15
- 292 Green synthesis of f-CdWO₄ for photocatalytic degradation and adsorptive removal of Bismarck Brown R dye from water. **2019**, 22, 100119 29
- 291 Semiconductor Nanocomposites for Visible Light Photocatalysis of Water Pollutants. **2019**, 8
- 290 Ti³⁺ Defective SnS₂/TiO₂ Heterojunction Photocatalyst for Visible-Light Driven Reduction of CO₂ to CO with High Selectivity. **2019**, 9, 927 18
- 289 Synchronous regulation of morphology and crystal phase of TiO₂ via a facile green hydrothermal approach and their photocatalytic activity. **2019**, 109, 90-97 6
- 288 Design of a simple and novel photoelectrochemical aptasensor for detection of 3,3',4,4'-tetrachlorobiphenyl. **2019**, 124-125, 8-14 26
- 287 Influence of noble metal loading and effect of temperature on the hydrogen sensing behavior of the platinum sensitized titania nanotubes. **2019**, 6, 015006 5
- 286 Light-Driven Sustainable Hydrogen Production Utilizing TiO₂ Nanostructures: A Review. **2019**, 3, 1800184 91
- 285 Harnessing designer biotemplates for biomineralization of TiO₂ with tunable photocatalytic activity. **2019**, 45, 6467-6476 1
- 284 Understanding the Lithium Storage Mechanism of Ti₃C₂T_x MXene. **2019**, 123, 1099-1109 71
- 283 Ti-Based Catalysts and Photocatalysts: Characterization and Modeling. **2019**, 19, 1319-1336 4
- 282 The influence of nitrogen doping on the electronic structure of the valence and conduction band in TiO. **2019**, 26, 145-151 7
- 281 Recent advances in photoinduced catalysis for water splitting and environmental applications. **2019**, 72, 31-49 34
- 280 Photocatalytic Degradation Kinetics of Gaseous Formaldehyde Flow Using TiO₂ Nanowires. **2019**, 7, 4456-4465 41
- 279 Construction of mesoporous g-C₃N₄/TiO₂ nanocrystals with enhanced photonic efficiency. **2019**, 45, 1265-1272 46
- 278 Photoassisted CO₂ Conversion to Fuels. **2019**, 11, 342-356 32
- 277 Synthesis, optical characterization, and environmental applications of Ga₂O₃ nanowires. **2019**, 67-90 3
- 276 Design of graphitic carbon nitride supported Ag₂O composites with hierarchical structures for enhanced photocatalytic properties. **2019**, 471, 714-725 25

275	Fabrication of Gd-La codoped TiO ₂ composite via a liquid phase plasma method and its application as visible-light photocatalysts. 2019 , 471, 893-899	20
274	Experimental and DFT insights of the Zn-doping effects on the visible-light photocatalytic water splitting and dye decomposition over Zn-doped BiOBr photocatalysts. 2019 , 243, 502-512	106
273	Influence of calcination temperature on the photocatalytic performance of the hierarchical TiO ₂ pinecone-like structure decorated with CdS nanoparticles. 2019 , 45, 767-776	13
272	Visible light-induced photocatalytic and antibacterial activity of N-doped TiO. 2020 , 108, 451-459	17
271	Effect of nitrogen-doping and post annealing on wettability and band gap energy of TiO ₂ thin film. 2020 , 500, 144048	18
270	Existence form of lathanum and its improving mechanism of visible-light-driven La-F co-doped TiO ₂ . 2020 , 38, 39-45	3
269	A heterogeneous Fenton reaction system of N-doped TiO ₂ anchored on sepiolite activates peroxymonosulfate under visible light irradiation. 2020 , 383, 123142	32
268	Efficient solar hydrogen production coupled with organics degradation by a hybrid tandem photocatalytic fuel cell using a silicon-doped TiO nanorod array with enhanced electronic properties. 2020 , 394, 121425	14
267	Assessment of photocatalytic performance of Fe/N-TiO ₂ photocatalysts prepared by liquid phase plasma process. 2020 , 355, 435-442	5
266	Polymer-supported graphene//TiO ₂ doped with nonmetallic elements with enhanced photocatalytic reaction under visible light. 2020 , 55, 1577-1591	13
265	Rigorous design of outermost surface of TiO ₂ via one-step single-mode magnetic microwave field toward highly efficient visible-light photocatalyst. 2020 , 55, 1692-1701	1
264	Nature of Nitrogen Incorporation in BiVO ₄ Photoanodes through Chemical and Physical Methods. 2020 , 4, 1900290	14
263	Fabrication of TiO ₂ embedded ZnIn ₂ S ₄ nanosheets for efficient Cr(VI) reduction. 2020 , 122, 110671	27
262	Two types of cooperative nitrogen vacancies in polymeric carbon nitride for efficient solar-driven H ₂ O ₂ evolution. 2020 , 265, 118581	56
261	Interlayer engineering of TiCT MXenes towards high capacitance supercapacitors. 2020 , 12, 763-771	51
260	Highly Efficient Hydrogen and Electricity Production Combined with Degradation of Organics Based on a Novel Solar Water-Energy Nexus System. 2020 , 12, 2505-2515	8
259	Tailored fabrication of iridium nanoparticle-sensitized titanium oxynitride nanotubes for solar-driven water splitting: experimental insights on the photocatalytic activity-defects relationship. 2020 , 10, 801-809	14
258	N-doped graphene-wrapped TiO ₂ nanotubes with stable surface Ti ³⁺ for visible-light photocatalysis. 2020 , 512, 144549	19

257	Nonaqueous synthesis of TiO ₂ nanorods using inductively coupled plasma. 2020 , 46, 8615-8624	
256	Toward the Intrinsic Superiority of Aligned One-Dimensional TiO ₂ Nanostructures: the Role of Defect States in Electron Transport Process. 2020 , 7, 4390-4397	4
255	Effects of operational parameters on bacterial inactivation in Vis-LEDs illuminated N-doped TiO ₂ based photoreactor. 2020 , 8, 104374	8
254	Well-designed efficient charge separation in 2D/2D N doped La ₂ Ti ₂ O ₇ /ZnIn ₂ S ₄ heterojunction through band structure/morphology regulation synergistic effect. 2020 , 78, 105401	36
253	Photocatalytic removal of 2,4-Dichlorophenoxyacetic acid from aqueous solution using tungsten oxide doped zinc oxide nanoparticles immobilised on glass beads. 2020 , 1-15	4
252	Noble-metal free photocatalytic hydrogen generation of CuPc/TiO ₂ nanoparticles under visible-light irradiation. 2020 , 530, 147215	19
251	Probing the facet-dependent intermediate in the visible-light degradation of RhB by carbon-coated anatase TiO ₂ nanoparticles. 2020 , 846, 156335	12
250	Photonic-Plasmonic Nanostructures for Solar Energy Utilization and Emerging Biosensors. 2020 , 10,	1
249	Influence of N sources on the photocatalytic activity of N-doped TiO ₂ . 2020 , 13, 7637-7651	7
248	Photocatalytic CO ₂ Reduction: A Review of Ab Initio Mechanism, Kinetics, and Multiscale Modeling Simulations. 2020 , 10, 14984-15007	55
247	Preparation of phosphorus-modified BiO _x as versatile catalyst for enhanced photo-reduction of Cr(VI) and oxidation of organic dyes. 2020 , 207, 1282-1299	6
246	Origin of photocatalytic activity enhancement in Pd/Pt-deposited anatase N-TiO ₂ - experimental insights and DFT study of the (001) surface. 2020 , 22, 18536-18547	0
245	Structural, Morphological, Optical and Photocatalytic Properties of Os and N Co-Doped TiO ₂ Films. 2020 , 853, 235-242	
244	2D photocatalysts with tuneable supports for enhanced photocatalytic water splitting. 2020 , 41, 34-43	16
243	Color Centers on Hydrogenated TiO Facets Unlock Fluorescence Imaging. 2020 , 11, 9485-9492	1
242	Rich surface hydroxyl design for nanostructured TiO ₂ and its hole-trapping effect. 2020 , 400, 125909	19
241	Nanoporous TaN electrochemical anodization followed by nitridation for solar water oxidation. 2020 , 49, 15023-15033	2
240	Visible-light-driven photocatalytic selective organic oxidation reactions. 2020 , 8, 20897-20924	28

- 239 Photocatalytic Decomposition of Water on S,N-Doped Semiconductor NiO/TiO₂ Oxides. **2020**, 42, 150-156
- 238 Morphology and Optical Properties of Spatially-Ordered Copper- and Fluorine-Doped Titanium-Dioxide Films. **2020**, 77, 231-235
- 237 Nitrogen modified titanium dioxide (N-TiO₂) promotes carbon monoxide oxidation over copper catalysts. **2020**, 44, 14781-14785 2
- 236 Oxygen vacancies in metal oxides: recent progress towards advanced catalyst design. **2020**, 63, 2089-2118 81
- 235 Towards the Enhancement in Photocatalytic Performance of AgPO Nanoparticles through Sulfate Doping and Anchoring on Electrospun Nanofibers. **2020**, 10, 8
- 234 Comprehensive review and future perspectives of efficient N-doped, Fe-doped and (N,Fe)-co-doped titania as visible light active photocatalysts. **2020**, 178, 109429 18
- 233 Efficient visible light photocatalysis enabled by the interaction between dual cooperative defect sites. **2020**, 274, 119099 16
- 232 In-situ nitrogen-doped black TiO₂ with enhanced visible-light-driven photocatalytic inactivation of *Microcystis aeruginosa* cells: Synthesis, performance and mechanism. **2020**, 272, 119019 34
- 231 Photoelectrochemical System for Unassisted High-Efficiency Water-Splitting Reactions Using N-Doped TiO₂ Nanotubes. **2020**, 34, 9030-9036 13
- 230 Nanostructuring Bridges Semiconductor-Cocatalyst Interfacial Electron Transfer: Realizing Light-Intensity-Independent Energy Utilization and Efficient Sunlight-Driven Photocatalysis. **2020**, 11, 4644-4648 5
- 229 Effects of Elemental Chemical State in NiFe₂O₄@TiO₂ on the Photocatalytic Performance. **2020**, 35, 320-326 1
- 228 Titania nanoparticles embedded Er³⁺-Sm³⁺ co-doped sulfophosphate glass: Judd-Ofelt parameters and spectroscopic properties enhancement. **2020**, 843, 155982 12
- 227 One-step synthesis of P-doped poly(triazine imide) nanotubes with hybrid 1D/1D architecture and high-efficiency photocatalytic performance. **2020**, 55, 13675-13686 5
- 226 Visible photocatalysis of Cr(VI) at g/L level in Si/N-TiO₂ nanocrystals synthesized by one-step co-hydrolysis method. **2020**, 398, 125641 11
- 225 Assessing the photocatalytic activity of europium doped TiO₂ using liquid phase plasma process on acetylsalicylic acid. **2020**, 2
- 224 CuO nanoparticles sensitize TiO₂/CdS nanowire arrays to prolong charge carrier lifetime and highly enhance unassisted photoelectrochemical hydrogen generation with 4.3% efficiency. **2020**, 49, 9282-9293 4
- 223 Ru Species Supported on MOF-Derived N-Doped TiO₂/C Hybrids as Efficient Electrocatalytic/Photocatalytic Hydrogen Evolution Reaction Catalysts. **2020**, 30, 2003007 49
- 222 Oxygen Vacancy Engineering in Photocatalysis. **2020**, 4, 2000037 68

221	Boosting Visible-Light Photocatalytic Performance for CO ₂ Reduction via Hydroxylated Graphene Quantum Dots Sensitized MIL-101(Fe). 2020 , 7, 2000468	7
220	Donor-acceptor codoping effects on tuned visible light response of TiO ₂ . 2020 , 8, 104168	6
219	Carbon nitride quantum dots (CNQDs)/TiO ₂ nanoparticle heterojunction photocatalysts for enhanced ultraviolet-visible-light-driven bisphenol a degradation and H ₂ production. 2020 , 45, 22534-22544	13
218	Distribution and concentration of surface oxygen vacancy of TiO ₂ and its photocatalytic activity. 2020 , 53, 424001	3
217	Improving the photocatalytic activity of nitrogen-doped surface defect TiO ₂ -x nanobelts for degradation of organic pollutants. 2020 , 174751982093867	
216	Photocatalytic degradation of RhB from an aqueous solution using Ag ₃ PO ₄ /N-TiO ₂ heterostructure. 2020 , 313, 113522	21
215	Hydrothermal synthesis and characterization of carbon-doped TiO ₂ nanoparticles. 2020 , 29, 118102	1
214	Defect engineering of the protection layer for photoelectrochemical devices. 2020 , 2, 100039	6
213	Synthesis of Ti ³⁺ self-doped mesoporous TiO ₂ cube with enhanced visible-light photoactivity by a simple reduction method. 2020 , 845, 156138	16
212	One-Step Incorporation of Nitrogen and Vanadium between Ti ₃ C ₂ T _x MXene Interlayers Enhances Lithium Ion Storage Capability. 2020 , 124, 6012-6021	15
211	Determining the role of oxygen vacancies in the photoelectrocatalytic performance of WO for water oxidation. 2020 , 11, 2907-2914	57
210	Influence of nitrogen doping on visible light photocatalytic activity of TiO ₂ nanowires with anatase-rutile junction. 2020 , 744, 137217	8
209	Defect Engineering in Titanium-Based Oxides for Electrochemical Energy Storage Devices. 2020 , 3, 286-343	34
208	Recent progress and strategies for enhancing photocatalytic water splitting. 2020 , 9, 100032	18
207	CdS-decorated surface-coarsened TiO ₂ nanobelts with enhanced visible-light photocatalytic performances. 2020 , 31, 4931-4942	1
206	Defective TiO ₂ for Propane Dehydrogenation. 2020 , 59, 4377-4387	30
205	Nanocatalysts and other nanomaterials for water remediation from organic pollutants. 2020 , 408, 213180	197
204	Graphene-supported TiO ₂ : study of promotion of charge carrier in photocatalytic water splitting and methylene blue dye degradation. 2020 , 3, 127-140	54

203	Regulate the crystal and optoelectronic properties of Bi ₂ WO ₆ nanosheet crystals by Sm ³⁺ doping for superior visible-light-driven photocatalytic performance. 2020 , 508, 145309	20
202	Effective electron-hole separation over N-doped TiO ₂ materials for improved photocatalytic reduction of 4-nitrophenol using visible light. 2020 , 95, 2694	4
201	Induced antibacterial capability of TiO ₂ coatings in visible light via nitrogen ion implantation. 2020 , 30, 171-180	15
200	Spatial Heterojunction in Nanostructured TiO and Its Cascade Effect for Efficient Photocatalysis. 2020 , 20, 3122-3129	38
199	The formation and effect of O-vacancies in doped TiO ₂ . 2020 , 44, 8559-8571	5
198	Designing a high-performance nitrogen-doped titanium dioxide anode material for lithium-ion batteries by unravelling the nitrogen doping effect. 2020 , 74, 104829	19
197	HF promoted increased nitrogen doping in TiO(B) photocatalyst. 2020 , 56, 5609-5612	5
196	The controllable synthesis of substitutional and interstitial nitrogen-doped manganese dioxide: the effects of doping sites on enhancing the catalytic activity. 2020 , 8, 8383-8396	26
195	Two-Stage Ultraviolet Degradation of Perovskite Solar Cells Induced by the Oxygen Vacancy-Ti States. 2020 , 23, 101013	34
194	Unraveling the promoted nitrogen dioxide detection performance of N-doped SnO ₂ microspheres at low temperature. 2020 , 834, 155209	13
193	Nitrogen doping of TiO ₂ and annealing treatment of photoanode for enhanced solar cell performance. 2020 , 832, 154880	4
192	Effects of Ti-precursor concentration and annealing temperature on structural and morphological properties of TiO ₂ nano-aerogels synthesized in supercritical ethanol. 2020 , 2, 1	4
191	Robust photocatalytic benzene degradation using mesoporous disk-like N-TiO ₂ derived from MIL-125(Ti). 2020 , 41, 1186-1197	33
190	Recent advances in titanium metal-organic frameworks and their derived materials: Features, fabrication, and photocatalytic applications. 2020 , 395, 125080	48
189	A novel strategy for the design of Au@CdS yolk-shell nanostructures and their photocatalytic properties. 2020 , 834, 155051	11
188	High photoelectrochemical performance of reduced graphene oxide wrapped, CdS functionalized, TiO multi-leg nanotubes. 2020 , 31, 275701	7
187	Inside-and-Out Semiconductor Engineering for CO ₂ Photoreduction: From Recent Advances to New Trends. 2021 , 2, 2000061	194
186	Nitrogen doping-mediated oxygen vacancies enhancing co-catalyst-free solar photocatalytic H ₂ production activity in anatase TiO ₂ nanosheet assembly. 2021 , 285, 119755	37

185	Insights into spectroscopic aspects of Er ³⁺ doped sulfophosphate glass embedded with titania nanoparticles. 2021 , 111, 110650	3
184	Facile preparation of bifunctional adsorbents for efficiently enriching N-glycopeptides and phosphopeptides. 2021 , 1144, 111-120	10
183	Electric field-driven one-step formation of vertical p-n junction TiO ₂ nanotubes exhibiting strong photocatalytic hydrogen production. 2021 , 9, 2239-2247	6
182	Carbon monoxide oxidation over copper and nitrogen modified titanium dioxide?. 2021 , 285, 119748	5
181	The synergistic effects of acid treatment and silver (Ag) loading for substantial improvement of photoelectrochemical and photocatalytic activity of Na ₂ Ti ₃ O ₇ /TiO ₂ nanocomposite. 2021 , 540, 148359	15
180	Improved pseudocapacitances of supercapacitors based on electrodes of nitrogen-doped Ti ₃ C ₂ T _x nanosheets with in-situ growth of carbon nanotubes. 2021 , 859, 158347	3
179	Solar Photocatalytic and Antimicrobial Activity of Porous Indium-Doped TiO ₂ Nanostructure. 2021 , 46, 5505-5522	2
178	Interfacial Charge Transport in 1D TiO Based Photoelectrodes for Photoelectrochemical Water Splitting. 2021 , 17, e1903378	48
177	Alternative synthesis of nitrogen and carbon co-doped TiO ₂ for removing fluoroquinolone antibiotics in water under visible light. 2021 , 361, 11-16	14
176	Regulating oxygen vacancies in ultrathin MnO ₂ nanosheets with superior activity for gaseous ozone decomposition. 2021 , 8, 1628-1641	3
175	Site-dependent photoinduced charge carrier dynamics in nitrogen/fluorine doped TiO ₂ nanoparticles. 2021 , 9, 1992-2000	
174	Thermodynamic criterions of the thermoelectric performance enhancement in Mg ₂ Sn through the self-compensation vacancy. 2021 , 16, 100327	13
173	Yolk@Shell Materials for CO ₂ Conversion: Chemical and Photochemical Applications. 2021 , 361-383	
172	Modified TiO ₂ Structures with Enhanced Photoluminescence and Photocatalytic Activity. 2021 , 13, 331-341	1
171	Structural, Electronic, and Optical Properties of Group 6 Doped Anatase TiO ₂ : A Theoretical Approach. 2021 , 11, 1657	0
170	Preparation of pure PbTiO ₃ and (Ag/Fe) codoped PbTiO ₃ perovskite nanoparticles and their enhanced photocatalytic activity. 2021 , 327, 114232	3
169	Unusual photodegradation reactions of Asteraceae and Poaceae grass pollen enzymatic extracts on P25 photocatalyst. 2021 , 28, 24206-24215	1
168	Enhanced photocatalytic decomposition of NO on portland cement concrete pavement using nano-TiO ₂ suspension. 2021 , 275, 122135	8

167	Ag and Cu Nanoparticles Synergistically Enhance Photocatalytic CO ₂ Reduction Activity of B Phase TiO ₂ . 1	1
166	Nickel aluminum layered double hydroxide nanosheets grown on oxygen vacancy-rich TiO ₂ nanobelts for enhanced photodegradation of an antibiotic. 2021 , 411, 113209	2
165	Preparation and Visible Photocatalytic Properties of N-Doped TiO ₂ /Muscovite Nanocomposites. 2021 , 69, 254-262	1
164	Natural Fresh Proteins Directed Hierarchically Porous Nitrogen-doped TiO ₂ as with High Performance as Photocatalysts and Electrode Materials. 2021 , 36, 183-188	1
163	CuO-ZnO-CdWO: a sustainable and environmentally benign photocatalytic system for water cleansing. 2021 , 28, 53793-53803	1
162	The impact of Au nanoparticles and lanthanide-doped NaYF ₄ on the photocatalytic activity of titania photocatalyst. 2021 , 547, 149123	3
161	Sub-level engineering strategy of nitrogen-induced BiO/g-CN: a versatile photocatalyst for oxidation and reduction. 2021 , 28, 50747-50766	3
160	Amino-rich surface-modified MXene as anode for hybrid aqueous proton supercapacitors with superior volumetric capacity. 2021 , 495, 229790	6
159	High-rate and high conductivity mesoporous TiO ₂ nano hollow spheres: Synergetic effect of structure and oxygen vacancies. 2021 , 47, 13572-13581	5
158	A review of spectral controlling for renewable energy harvesting and conserving. 2021 , 18, 100388	13
157	BiOBr/PBCD-B-D dual-function catalyst with oxygen vacancies for Acid Orange 7 removal: Evaluation of adsorption-photocatalysis performance and synergy mechanism. 2021 , 411, 128456	14
156	Role of surface oxygen vacancies in zinc oxide/graphitic carbon nitride composite for adjusting energy band structure to promote visible-light-driven photocatalytic activity. 2021 , 562, 150106	10
155	Polymer-ceramic composite electrolytes for all-solid-state lithium batteries: Ionic conductivity and chemical interaction enhanced by oxygen vacancy in ceramic nanofibers. 2021 , 495, 229796	12
154	Fe on molecular-layer MoS ₂ as inorganic Fe-S ₂ -Mo motifs for light-driven nitrogen fixation to ammonia at elevated temperatures. 2021 , 1, 162-182	11
153	Effects of Bi-dopant and co-catalysts upon hole surface trapping on La ₂ Ti ₂ O ₇ nanosheet photocatalysts in overall solar water splitting. 2022 , 15, 438	3
152	Structural Behavior and Spin-State Features of BaAlO Scaled through Tuned Co Doping. 2021 , 60, 8475-8488	
151	Constructing charge transfer channel between dopants and oxygen vacancies for enhanced visible-light-driven water oxidation. 2021 , 14, 3365-3371	4
150	Modulation of interfacial charge dynamics of semiconductor heterostructures for advanced photocatalytic applications. 2021 , 438, 213876	33

149	Visible Light-Responsive N-Doped TiO ₂ Photocatalysis: Synthesis, Characterizations, and Applications. 1	7
148	Investigation of the metal-to-insulator transition of N-doped VO ₂ (M1) thin films. 2021 , 554, 149661	7
147	Interface engineering of N-doped Ni ₃ S ₂ /CoS ₂ heterostructures as efficient bifunctional catalysts for overall water splitting. 2021 , 895, 115516	2
146	Revealing and Facilitating the Rate-Determining Step for Efficient Sunlight-Driven Photocatalysis. 2021 , 12, 7665-7670	5
145	Rare Earth Doped Luminescent Materials as Photocatalysts for Enhanced Photocatalytic Reactions. 2022 , 259-279	
144	Joint Influence of Nitrogen Doping and Oxygen Vacancy on Manganese Dioxide as a High-Capacity Cathode for Zinc-Ion Batteries. 2021 , 125, 20195-20203	4
143	Metal-organic frameworks based photocatalysts: Architecture strategies for efficient solar energy conversion. 2021 , 419, 129459	27
142	Pitting behavior of Ti-15-3 titanium alloy with different surface in salt spray studied using electrochemical noise. 2021 , 14, 2865-2883	4
141	Properties, synthesis, and recent advancement in photocatalytic applications of graphdiyne: A review. 2021 , 281, 119825	6
140	Supported TiO in Ceramic Materials for the Photocatalytic Degradation of Contaminants of Emerging Concern in Liquid Effluents: A Review. 2021 , 26,	3
139	On-Demand Regulation of Photoreversible Color Switching for Rewritable Paper and Transient Information Encryption. 2021 , 13, 44797-44805	4
138	Controlled Impurity Admixture: From Doped Systems to Composites. 2021 , 151-183	
137	A novel research on the positive effects of oxygen vacancies for interstitial N-doped MnO ₂ on lithium-ion diffusion. 2021 , 301, 130259	1
136	High-concentration N-doped La ₂ Ti ₂ O ₇ nanocrystals: Effects of nano-structuration and doping sites on enhancing the photocatalytic activity. 2021 , 423, 130220	2
135	Conversion of CO ₂ to formic acid by integrated all-solar-driven artificial photosynthetic system. 2021 , 512, 230532	7
134	N ₂ plasma treatment TiO ₂ nanosheets for enhanced visible light-driven photocatalysis. 2021 , 881, 160509	3
133	Direct Z-scheme ZnIn ₂ S ₄ @MoO ₃ heterojunction for efficient photodegradation of tetracycline hydrochloride under visible light irradiation. 2021 , 424, 130510	25
132	The influence of nitrogen partial pressure on visible-light-driven photocatalytic activity of sputtered titanium oxynitride thin films. 2021 , 193, 110540	0

131	State-of-the-art progress in the selective photo-oxidation of alcohols. 2021 , 62, 338-350	20
130	Highly efficient and stable g-C ₃ N ₄ decorated Ta ₃ N ₅ nanotube on n-Si substrate for solar water oxidation. 2021 , 565, 150456	3
129	Recent advances in non-metal doped titania for solar-driven photocatalytic/photoelectrochemical water-splitting. 2022 , 66, 529-559	8
128	Construction of ternary hollow TiO ₂ -ZnS@ZnO heterostructure with enhanced visible-light photoactivity. 2022 , 1248, 131493	3
127	Characterisation of oxygen defects and nitrogen impurities in TiO photocatalysts using variable-temperature X-ray powder diffraction. 2021 , 12, 661	34
126	Applications of quantum dots in batteries. 2021 , 287-318	0
125	Investigation of the properties of oxide-based multilayer thin films and their use in the photocatalytic applications. 2021 , 697-715	
124	Synergistic Effect of Nitrogen and Sulfur Dual-Doping Endows TiO ₂ with Exceptional Sodium Storage Performance. 2021 , 11, 2003037	42
123	In-situ decoration of metallic Bi on BiOBr with exposed (110) facets and surface oxygen vacancy for enhanced solar light photocatalytic degradation of gaseous n-hexane. 2020 , 41, 1603-1612	33
122	Mg _{0.8} Zn _{0.2} O microspheres: preparation, characterization and application for degrading organic dyes. 2020 , 22, 1273-1285	5
121	NH ₃ on anatase TiO ₂ (101): Diffusion mechanisms and the effect of intermolecular repulsion. 2020 , 4,	1
120	Photoelectrochemical Performance of S,N-Codoped TiO ₂ Films Supported on Ti and their Enhanced Photoelectrocatalytic Activity in the Generation of Hydroxyl Radicals. 2020 , 167, 166514	2
119	Synthesis of Nitrogen Doped Titanium Dioxide (TiO ₂) and its Photocatalytic Performance for the Degradation of Indigo Carmine Dye. 2013 , 2, 28-31	3
118	X-ray Photoelectron Spectroscopy Analysis of Nitrogen-Doped TiO ₂ Films Prepared by Reactive-Ion-Beam Sputtering with Various NH ₃ /O ₂ Gas Mixture Ratios. 2020 , 10, 47	14
117	Green Synthetic Fuels: Renewable Routes for the Conversion of Non-Fossil Feedstocks into Gaseous Fuels and Their End Uses. 2020 , 13, 420	32
116	Ultrasonic Synthesis of CoSe ₂ -Graphene-TiO ₂ Ternary Composites for High Photocatalytic Degradation Performance. 2017 , 54, 205-210	12
115	Nitrogen-Doped Lithium Lanthanum Titanate Nanofiber-Polymer Composite Electrolytes for All-Solid-State Lithium Batteries.	1
114	Semiconductive-Ferroelectric-Enhanced Photo-Electrochemistry with Collective Improvements on Light Absorption, Charge Separation, and Carrier Transportation. 2021 , 8, 2101227	0

113	Synthesis, Characterization and Photocatalytic Behavior of SiO ₂ @nitrided-TiO ₂ Nanocomposites Obtained by a Straightforward Novel Approach. 2021 , 10, 1033-1040	0
112	Enhanced bezafibrate degradation and power generation via the simultaneous PMS activation in visible light photocatalytic fuel cell. 2021 , 207, 117800	5
111	Wetting and Photoactive Properties of Laser Irradiated Zinc Oxide /Graphene Oxide Nanocomposite Layers. 2015 , 119-125	
110	Titania Nano-architectures for Energy. 2015 , 129-165	
109	The Nature of Electron Transport and Visible Light Absorption in Strontium Niobate / Plasmonic Water Splitter. 2017 , 41-62	
108	Developing Novel Photocatalytic Cementitious Permeable Pavements for Depollution of Contaminants and Impurities in Urban Cities.	1
107	Photochemical reflective optical fiber sensor for selective detection of phenol in aqueous solutions. 2019 , 58, 2091-2099	2
106	The physico-chemical properties of /containing stainless steel composites and its photoactivity. 2019 , 10, 410-418	
105	Defect Engineering in Photocatalytic Methane Conversion. 2100147	8
104	Boosting the photocatalytic H ₂ evolution activity of a CdS/N-doped ZnIn ₂ S ₄ direct Z-scheme heterostructure using a band alignment regulation strategy.	0
103	Fabrication and Photocatalytic Activity of TiO ₂ Hollow Structures using One-pot Wet Chemical Process. 2020 , 27, 132-138	
102	NH ₃ Modified /Na _{0.33} V ₂ O ₅ with High Capacity for Aqueous Zinc Ion Battery Cathode. 2021 , 162615	1
101	Gas-Phase Nitrogen Doping of Monolithic TiO ₂ Nanoparticle-Based Aerogels for Efficient Visible Light-Driven Photocatalytic H ₂ Production. 2021 , 13, 53691-53701	6
100	Scheelite-Type Wide-Bandgap ABO ₄ Compounds (A = Ca, Sr, and Ba; B = Mo and W) as Potential Photocatalysts for Water Treatment. 2021 , 125, 25497-25513	0
99	Research Progress of Adsorption and Photocatalysis of Formaldehyde on TiO ₂ /AC. 2021 , 2021, 1-16	0
98	Bronze titanium dioxide nanowires with N-rich pseudocapacitive surfaces toward improved lithium kinetics and charge storage.	0
97	Engineering oxygen vacancies in CoO@CoO/C nanocomposites for enhanced electrochemical performances. 2021 , 13, 19518-19526	3
96	Interface modification by formamidine acetate for efficient perovskite solar cells. 2022 , 232, 304-311	0

95	A Z-scheme Pd modified ZnIn ₂ S ₄ /P25 heterojunction for enhanced photocatalytic hydrogen evolution. 2022 , 579, 152003	2
94	Tuning the local electronic structure of SrTiO catalysts to boost plasma-catalytic interfacial synergy.. 2021 , 428, 128172	1
93	Simultaneous increase of conductivity, active sites and structural strain by nitrogen injection for high-yield CO ₂ electro-hydrogenation to liquid fuel. 2022 , 305, 121080	5
92	Photocatalytic Oxygen Evolution. 2022 , 485-519	
91	In situ synthesis of N-doped TiO ₂ on Ti ₃ C ₂ MXene with enhanced photocatalytic activity in the selective reduction of nitrate to N ₂ .	0
90	An Effective Photocatalytic Degradation of Industrial Pollutants through Converting Titanium Oxide to Magnetic Nanotubes and Hollow Nanorods by Kirkendall Effect.. 2022 , 12,	1
89	Synthesis of diketopyrrolopyrrole and anthraquinone-based polymers of D-A1-D-A2 architecture by direct arylation polycondensation and designing inorganic/organic nano-heterostructured photoanodes for visible light water splitting.	2
88	Weak-Visible-Light-Driven Fe Doped TiO ₂ Photocatalyst Prepared by Coprecipitation Method.	
87	Preparation of Ni-loaded oxygen-enriched vacancy TiO ₂ hierarchical micro-nanospheres and the study of their photocatalytic hydrogen evolution performance.	2
86	Revealing the Role of Electronic Doping for Developing Cocatalyst-Free Semiconducting Photocatalysts.. 2022 , 13, 2039-2045	2
85	Oxygen vacancies in nanostructured hetero-interfacial oxides: a review. 2022 , 24, 1	0
84	B, N Co-Doping Sequence: An Efficient Electronic Modulation of the Pd/MXene Interface with Enhanced Electrocatalytic Properties for Ethanol Electrooxidation.. 2022 ,	1
83	Highly active [NaYF ₄ :Yb/Er-N-TiO ₂ nanoparticles for NIR light driven Rhodamine B degradation. 2022 ,	
82	Amending charge separation and migration in TiO ₂ nanosheet via Au nanoparticles ensemble and its synergy in photoelectrocatalytic methanol oxidation. 2022 ,	0
81	Preparation of N and Eu doped TiO ₂ using plasma in liquid process and its photocatalytic degradation activity for diclofenac. 1	1
80	A Review on Optical Bandgap Engineering in TiO ₂ Nanostructures via Doping and Intrinsic Vacancy Modulation Towards Visible Light Applications.	3
79	3D N-doped Li ₄ Ti ₅ O ₁₂ nanoribbon networks self-supported on Ti foils as advanced anode for high-performance flexible lithium-ion batteries. 2022 , 910, 164873	0
78	Accurate structural descriptor enabled screening for nitrogen and oxygen vacancy codoped TiO ₂ with a large bandgap narrowing. 2022 , 122, 84-90	0

77	Ferroelectric polarization-enhanced photocatalytic performance of heterostructured BaTiO ₃ @TiO ₂ via interface engineering. 2021 , 28, 3778-3789	3
76	First-Principles Design and Preparation of Ag ₃ PO ₄ Materials and Their Photocatalytic Properties. 2021 , 95, 2675-2682	
75	Inter-facet junction effects on particulate photoelectrodes.. 2021 ,	6
74	Revealing the Role of Surface Elementary Doping in Photocatalysis.	2
73	Image_1.TIF. 2018 ,	
72	Image_2.TIF. 2018 ,	
71	Progressively Stimulating Carrier Motion Over Transient Metal Chalcogenides Quantum Dots Towards Solar-to-Hydrogen Conversion.	2
70	N-Rich Doped Anatase TiO with Smart Defect Engineering as Efficient Photocatalysts for Acetaldehyde Degradation.. 2022 , 12,	0
69	Photon-induced water splitting experimental and kinetic studies with a hydrothermally prepared TiO ₂ -doped rGO photocatalyst. 2022 , 109546	0
68	High-loaded nanobelt-array/nanobelt-microsphere multilayer Li ₄ Ti ₅ O ₁₂ self-supported on Ti foils for high-performance lithium ion battery. 2022 , 419, 140407	0
67	Degradation of cefadroxil by photoelectrocatalytic ozonation under visible-light irradiation and single processes. 2022 , 431, 113995	
66	One-step synthesis of N-doped porous wall TiO ₂ nanotube arrays for efficient removal of dibutyl phthalate under visible light. 2022 , 430, 113975	0
65	Synthesis of Cu _x /TiO ₂ Photocatalysts with Enhanced Photocatalytic Performance.	1
64	High-performance photocatalytic nonoxidative conversion of methane to ethane and hydrogen by heteroatoms-engineered TiO ₂ . 2022 , 13, 2806	7
63	Weak-visible-light-driven Fe doped TiO ₂ photocatalyst prepared by coprecipitation method and degradation of methyl orange. 2022 , 129, 112522	1
62	Photocatalytic Reduction of CO ₂ with N-Doped TiO ₂ -Based Photocatalysts Obtained in One-Pot Supercritical Synthesis. 2022 , 12, 1793	1
61	Modulating the Oxidation State of Titanium via Dual Anions Substitution for Efficient N ₂ Electroreduction. 2201343	3
60	Revealing different depth boron substitution on interfacial charge transfer in TiO ₂ for enhanced visible-light H ₂ production. 2022 , 121570	0

59	Understanding the fundamentals of TiO ₂ surfaces. Part I. The influence of defect states on the correlation between crystallographic structure, electronic structure and physical properties of single-crystal surfaces. 2022 , 38, 91-149	3
58	Nitrogen-doped titanium dioxide films fabricated via magnetron sputtering for vascular stent biocompatibility improvement. 2022 ,	1
57	Site-Selective Nitrogen-Doped γ -MnO ₂ for Catalytic Oxidation of Carcinogenic HCHO in Indoor Air.	0
56	Review Understanding and Controlling Charge Functions in Materials for Electrochemically Mediated Water Treatment.	
55	Morphology and facet tailoring of CaSnO ₃ assembled in molten salt with defect-mediated photocatalytic activity. 2022 , 10, 108169	
54	Sustainable photoanode for water oxidation reactions: from metal-based to metal-free materials.	2
53	Insight into the Light-Driven Hydrogen Production over Pure and Rh-Doped Rutile in the Presence of Ascorbic Acid: Impact of Interfacial Chemistry on Photocatalysts. 2022 , 14, 34656-34664	0
52	Ion-Implantation in Titania-Based Plasmonic Photo-anodes: A Review. 2022 , 9, 2200085	0
51	Creation of Sn _x Nb _{1-x} O ₂ solid solution through heavy Nb-doping in SnO ₂ to boost its photocatalytic CO ₂ reduction to C ₂ ⁺ products under simulated solar illumination.	1
50	CuWO ₄ as a novel Z-scheme partner to construct TiO ₂ based stable and efficient heterojunction for photocatalytic hydrogen generation. 2022 ,	0
49	Enhanced charge transfer and reaction kinetics of vanadium pentoxide for zinc storage via nitrogen interstitial doping. 2022 , 138770	0
48	Tuning the Surface Wettability of a BiVO ₄ Photoanode for Kinetically Modulating Water Oxidative H ₂ O ₂ Accumulation. 3024-3031	0
47	Enhanced photocatalytic hydrogen evolution under visible-light using C, N co-doped mesoporous TiO ₂ nanocrystals templated by ionic liquids. 2023 , 451, 138670	2
46	Recent progress in NO _x photocatalytic removal: Surface/interface engineering and mechanistic understanding. 2022 , 10, 108566	0
45	Design and preparation of highly active TiO ₂ photocatalysts by modulating their band structure. 2023 , 629, 336-344	3
44	Remarkably improved photocatalytic hydrogen evolution performance of crystalline TiO ₂ nanobelts hydrogenated at atmospheric pressure with the assistance of hydrogen spillover. 2022 , 12, 5575-5585	1
43	Abatement of dichloromethane with high selectivity over defect-rich MOF-derived Ru/TiO ₂ catalysts.	0
42	Conjugated Porous Polymers for Photocatalysis: The Road From Catalytic Mechanism, Molecular Structure to Advanced Applications. 2022 , 100094	1

- 41 Ni-doped TiO₂ nanocubes wrapped by CNTs for synergic photocatalytic CH₄ conversion. **2022**, 10, 108652 0
- 40 Enhanced interaction between Ru nanoparticles and N, C-modified mesoporous TiO₂ for efficient electrocatalytic hydrogen evolution at all pH values. 0
- 39 Construction of metallic nanocrystalline TaB₂ coupled with TiO₂ for enhanced photocatalytic degradation. **2022**, 0
- 38 Facile Fabrication of N-Doped K₂Nb₂O₆ Nanocrystals with Defective Pyrochlore Structure for Improved Visible-Light Photocatalytic Hydrogen Production. 2200105 1
- 37 An in-situ transient photo-induced voltage method to understand the PEC efficiency of C, N co-doped TiO₂ photoanode. **2023**, 608, 155282 0
- 36 Photocatalytic removal of organic dye using green synthesized zinc oxide coupled cadmium tungstate nanocomposite under natural solar light irradiation. **2023**, 216, 114534 0
- 35 3D printed bionic self-powered sensing device based on fern-shaped nitrogen doped BiVO₄ photoanode with enriched oxygen vacancies. **2023**, 220, 114817 0
- 34 Role of oxygen vacancy in metal oxides for photocatalytic CO₂ reduction. **2023**, 321, 122079 3
- 33 Controllable synthesis of substitutional and interstitial nitrogen-doped ceria: The effects of doping sites on enhanced catalytic ozonation of organic pollutants. **2023**, 321, 122040 0
- 32 Non-toxic fluorine-doped TiO₂ nanocrystals from TiOF₂ for facet-dependent naproxen degradation. **2022**, 1
- 31 Doping sites modulation of T-Nb₂O₅ to achieve ultrafast lithium storage. **2022**, 1
- 30 Engineering oxygen vacancy in (001)-dominated TiO₂ for enhanced CH₄ photocatalytic conversion. **2022**, 29, 101690 0
- 29 Design and Synthesis of Multifaceted Dicyanomethylene Rhodanine Linked Thiophene: A SnO_x/Perovskite Dual Interface Modifier Facilitating Enhanced Device Performance Through Improved Fermi Level Alignment, Defect Passivation and Reduced Energy Loss. 0
- 28 A band-to-band transition visible-light-responsive anatase titania photocatalyst by N,F-codoping for water splitting and CO₂ reduction. **2022**, 11, 141-148 0
- 27 Ce-Co Co-doped PbTiO₃ (Ce-Co-PTO) with state-of-the-art photocatalytic efficiency for dyes treatment. **2023**, 936, 168204 0
- 26 Visible-light active S-scheme heterojunction photocatalyst based on nanosized anatase TiO₂ and octahedral iodide molybdenum clusters. **2023**, 612, 155738 0
- 25 The Preparation of N-Doped Titanium Dioxide Films and Their Degradation of Organic Pollutants. **2022**, 19, 15721 0
- 24 Fundamental Limit of Selectivity in Photocatalytic Denitrification over Titania. **2022**, 13, 11051-11058 0

- 23 Modulation of Structure and Optical Property of Nitrogen-Incorporated VO₂ (M1) Thin Films by Polyvinyl Pyrrolidone. **2023**, 16, 208 ○
- 22 Recent Advances in Ternary Metal Oxides Modified by N Atom for Photocatalysis. **2022**, 12, 1568 ○
- 21 Unraveling Polysulfide's Adsorption and Electrocatalytic Conversion on Metal Oxides for Li-S Batteries. 2204930 1
- 20 Switching On/Off molybdenum nitride catalytic activity in ammonia synthesis through modulating metal support interaction. ○
- 19 Nitrogen and Sulphur co-doped Graphene: A Robust Material for Methylene Blue Removal. **2023**, 100248 ○
- 18 Synthesis of CuO_x/TiO₂ Photocatalysts with Enhanced Photocatalytic Performance. **2023**, 8, 2723-2732 ○
- 17 Modulation of the Work Function of TiO₂ Nanotubes by Nitrogen Doping: Implications for the Photocatalytic Degradation of Dyes. **2023**, 6, 50-60 ○
- 16 Facile Synthesis of Gram-Scale Mesoporous Ag/TiO₂ Photocatalysts for Pharmaceutical Water Pollutant Removal and Green Hydrogen Generation. **2023**, 8, 1249-1261 ○
- 15 Volatile organic compound removal by post plasma-catalysis over porous TiO₂ with enriched oxygen vacancies in a dielectric barrier discharge reactor. **2023**, 15, 5909-5918 ○
- 14 Enhancing oxygen reduction activity of β -MnO₂ by defect-engineering and N doping through plasma treatments. **2023**, 58, 3066-3077 ○
- 13 Controllable synthesis of CuPc/N-rich doped (0 0 1) TiO₂ S-scheme nanosheet heterojunctions for efficiently wide-visible light-driven CO₂ reduction. **2023**, 623, 157066 ○
- 12 Promoting amorphization of commercial TiO₂ upon sodiation to boost the sodium storage performance. **2023**, 81, 379-388 ○
- 11 Red anatase TiO₂ microspheres with exposed major {0 0 1} facets and boron-stabilized hydrogen-occupied oxygen vacancies for visible-light-responsive water oxidation. **2023**, 640, 211-219 ○
- 10 Sputter -coated N-enriched mixed metal oxides (Ta₂O₅-Nb₂O₅-N) composite: A resilient solar driven photocatalyst for water purification. **2023**, 452, 131283 ○
- 9 Modular calcination strategy to construct defect-rich nitrogen-doped Nb₂O₅ for boosting photocatalytic oxidation of cyclohexane to cyclohexanone in solvent-free conditions. **2023**, 617, 156600 ○
- 8 Electronic structure analysis of light-element-doped anatase TiO₂ using all-electron GW approach. **2023**, 220, 112059 ○
- 7 Nitrogen-doped TiO₂/Graphene Composites Synthesized via the Vapour-thermal Method. **2022**, 37, 1105-1113 ○
- 6 Influence of Nitrogen Substitution on the Electronic Structure of Ti₂O₃: Insights into the Doping-Induced Insulator-to-Metal Transition. 2200495 ○

- 5 Direct quantification of oxygen vacancy on the TiO₂ surface by ³¹P solid-state NMR. **2023**, 3, 100556 ○
- 4 Boosting the high-rate performance and cycling life of NaTi₂(PO₄)₃ anode by forming N-doped carbon coating derived from polyacrylonitrile. **2023**, ○
- 3 Metal Oxide-Supported Metal Catalysts for Electrocatalytic Oxygen Reduction Reaction: Characterization Methods, Modulation Strategies, and Recent Progress. ○
- 2 Mild nitridation of perovskite manganite: Synthesis, structure and magnetism. **2023**, 323, 124044 ○
- 1 Nitrogen doping mediated oxygen vacancy and Ti valence regulation to enhance photocatalytic H₂ generation. **2023**, ○