Chao Liu

List of Publications by Year
in descending order

58 papers	2,272 citations	201658 27 h-index	223791 46 g-index
69 all docs	69 docs citations	69 times ranked	2220 citing authors

#	Article	IF	Citations
1	Visible Light Gold Nanocluster Photocatalyst: Selective Aerobic Oxidation of Amines to Imines. ACS Catalysis, 2017, 7, 3632-3638.	11.2	165
2	Observation of Bodyâ€Centered Cubic Gold Nanocluster. Angewandte Chemie - International Edition, 2015, 54, 9826-9829.	13.8	147
3	Câ€“O Functionalization of Î±-Oxyboronates: A Deoxygenative gem-Diborylation and gem-Silylborylation of Aldehydes and Ketones. Journal of the American Chemical Society, 2017, 139, 5257-5264.	13.7	142
4	Chiral Ag23 nanocluster with open shell electronic structure and helical face-centered cubic framework. Nature Communications, 2018, 9, 744.	12.8	132
5	Au₃₈S₂(SAdm)₂₀ Photocatalyst for One-Step Selective Aerobic Oxidations. ACS Catalysis, 2017, 7, 3368-3374.	11.2	106
6	Tailored and Integrated Production of Functional Cellulose Nanocrystals and Cellulose Nanofibrils via Sustainable Formic Acid Hydrolysis: Kinetic Study and Characterization. ACS Sustainable Chemistry and Engineering, 2019, 7, 9449-9463.	6.7	78
7	One-Pot Synthesis of Au₁₁(PPh₂Py)₇Br₃ for the Highly Chemoselective Hydrogenation of Nitrobenzaldehyde. ACS Catalysis, 2016, 6, 92-99.	11.2	75
8	Comparative Evaluation of the Efficient Conversion of Corn Husk Filament and Corn Husk Powder to Valuable Materials via a Sustainable and Clean Biorefinery Process. ACS Sustainable Chemistry and Engineering, 2019, 7, 1327-1336.	6.7	73
9	Pure cellulose lithium-ion battery separator with tunable pore size and improved working stability by cellulose nanofibrils. Carbohydrate Polymers, 2021, 251, 116975.	10.2	72
10	Dual Functionalization of Î±â€Monoboryl Carbanions through Deoxygenative Enolization with Carboxylic Acids. Angewandte Chemie - International Edition, 2018, 57, 5501-5505.	13.8	67
11	Efficient Aerobic Oxidation of Glucose to Gluconic Acid over Activated Carbonâ€Supported Gold Clusters. ChemSusChem, 2017, 10, 1976-1980.	6.8	63
12	Recent Advances in Homogeneous Carbonylation Using CO₂ as CO Surrogate. Chinese Journal of Chemistry, 2018, 36, 353-362.	4.9	63
13	Structure of the Au_{23â˜’x}Ag_x(Sâ€Adm)₁₅ Nanocluster and Its Application for Photocatalytic Degradation of Organic Pollutants. Angewandte Chemie - International Edition, 2019, 58, 11335-11339.	13.8	63
14	Catalytic CO Oxidation Using Bimetallic M_xAu_{25â€“x} Clusters: A Combined Experimental and Computational Study on Doping Effects. Journal of Physical Chemistry C, 2016, 120, 10261-10267.	3.1	58
15	Aminoazanium of DABCO: An Amination Reagent for Alkyl and Aryl Pinacol Boronates. Angewandte Chemie - International Edition, 2020, 59, 2745-2749.	13.8	53
16	Controlled growth of molecularly pure Au25(SR)18 and Au38(SR)24 nanoclusters from the same polydispersed crude product. Science China Chemistry, 2012, 55, 2359-2365.	8.2	52
17	Effect of regeneration solvent on the characteristics of regenerated cellulose from lithium bromide trihydrate molten salt. Cellulose, 2020, 27, 9243-9256.	4.9	48
18	Synthesis of Secondary and Tertiary Alkyl Boronic Esters by gemâ€Carboborylation: Carbonyl Compounds as Bis(electrophile) Equivalents. Angewandte Chemie - International Edition, 2018, 57, 10318-10322.	13.8	44

#	Article	IF	Citations
19	Chemodivergent transformations of amides using gem-diborylalkanes as pro-nucleophiles. Nature Communications, 2020, 11, 3113.	12.8	44
20	One-pot synthesis of Au₁₄₄(SCH₂Ph)₆₀ nanoclusters and their catalytic application. Journal of Materials Chemistry A, 2015, 3, 20167-20173.	10.3	43
21	Stereoselective Synthesis of Trisubstituted Vinylboronates from Ketone Enolates Triggered by 1,3â€Metalate Rearrangement of Lithium Enolates. Angewandte Chemie - International Edition, 2019, 58, 15813-15818.	13.8	38
22	Hydrothermal Synthesis of a CaNb₂O₆ Hierarchical Micro/Nanostructure and Its Enhanced Photocatalytic Activity. European Journal of Inorganic Chemistry, 2010, 2010, 1275-1282.	2.0	37
23	Selective hydrogenation of the Cî€C bond in Î±,Î²-unsaturated aldehydes and ketones over ultra-small Pdâ€“Au clusters. Nanoscale, 2016, 8, 18626-18629.	5.6	37
24	Structural isomer and high-yield of Pt1Ag28 nanocluster via one-pot chemical wet method. Nano Research, 2019, 12, 309-314.	10.4	36
25	[AuAg₂₆(SR)₁₈S]^{â^’} Nanocluster: Open Shell Structure and High Faradaic Efficiency in Electrochemical Reduction of CO₂ to CO. Journal of Physical Chemistry Letters, 2021, 12, 552-557.	4.6	36
26	Computational Investigation of the Role Played by Rhodium(V) in the Rhodium(III)â€Catalyzed orthoâ€Bromination of Arenes. Chemistry - A European Journal, 2017, 23, 2690-2699.	3.3	32
27	Cooperation between an alcoholic proton and boryl species in the catalytic gem-hydrodiborylation of carboxylic esters to access 1,1-diborylalkanes. Organic Chemistry Frontiers, 2019, 6, 900-907.	4.5	30
28	One-step rapid synthesis, crystal structure and 3.3 microseconds long excited-state lifetime of Pd1Ag28 nanocluster. Nano Research, 2020, 13, 366-372.	10.4	30
29	Extraction and Separation of Rare Earth Elements from Nitrate Medium with Mixtures ofsec-Octylphenoxyacetic Acid and 2,2â€²-Bipyridylâ€. Journal of Chemical & Engineering Data, 2010, 55, 4281-4284.	1.9	26
30	Surface modification of adamantane-terminated gold nanoclusters using cyclodextrins. Physical Chemistry Chemical Physics, 2016, 18, 23358-23364.	2.8	26
31	Toward understanding the growth mechanism of Aun(SR)m nanoclusters: effect of solvent on cluster size. RSC Advances, 2013, 3, 9778.	3.6	25
32	Synthesis of ultrasmall platinum nanoparticles and structural relaxation. Journal of Colloid and Interface Science, 2014, 423, 123-128.	9.4	24
33	Efficient synthesis of Au₉₉(SR)₄₂ nanoclusters. Nanoscale, 2015, 7, 5987-5990.	5.6	23
34	Cluster-to-cluster transformation among Au₆, Au₈ and Au₁₁ nanoclusters. Dalton Transactions, 2018, 47, 7487-7491.	3.3	22
35	Thermally robust silica-enclosed Au 25 nanocluster and its catalysis. Chinese Journal of Catalysis, 2016, 37, 1787-1793.	14.0	20
36	Efficient palladium-catalyzed C(sp²)â€“H activation towards the synthesis of fluorenes. New Journal of Chemistry, 2016, 40, 9030-9033.	2.8	19

#	Article	IF	Citations
37	Î±-Câ€“H borylation of secondary alcohols via Ru/Fe relay catalysis: building a platform for alcoholic Câ€“H/Câ€“O functionalizations. Chemical Communications, 2019, 55, 11884-11887.	4.1	18
38	Aminoazanium of DABCO: An Amination Reagent for Alkyl and Aryl Pinacol Boronates. Angewandte Chemie, 2020, 132, 2767-2771.	2.0	14
39	Halogenâ€Adjusted Chemoselective Synthesis of Fluorene Derivatives with Positionâ€Controlled Substituents. Chemistry - an Asian Journal, 2016, 11, 211-215.	3.3	13
40	Recent advances in the synthesis and transformation of gem-borylsilylalkanes. New Journal of Chemistry, 2021, 45, 14847-14854.	2.8	13
41	Structure of the Au_{23â^’x}Ag_x(Sâ€Adm)₁₅ Nanocluster and Its Application for Photocatalytic Degradation of Organic Pollutants. Angewandte Chemie, 2019, 131, 11457-11461.	2.0	10
42	Synthesis and structure of Au19Ag4(S-Adm)15 nanocluster: Polymorphs and optical properties. Chinese Chemical Letters, 2021, 32, 565-568.	9.0	10
43	Reversible conversion between phosphine protected Au₆and Au₈nanoclusters under oxidative/reductive conditions. Nanoscale, 2017, 9, 2424-2427.	5.6	9
44	Correlating Kernelâ€“Shell Structures with Optical Properties of Pt₁Ag₂₄ and Pt₁Ag₁₄ Nanoclusters. Journal of Physical Chemistry C, 2021, 125, 2194-2201.	3.1	9
45	Influence of drying methods on the structure and properties of cellulose formate and its application as a reducing agent. International Journal of Biological Macromolecules, 2021, 170, 397-405.	7.5	9
46	Double Carbonylation Using Glyoxal (HCOCOH): A Practical Copperâ€Promoted Synthesis of Isatins from Primary and Secondary Anilines. Advanced Synthesis and Catalysis, 2017, 359, 3484-3489.	4.3	7
47	Amelioration of Physical Properties and Printability of Paper Coated with N-methylated Chitosan. Scientific Reports, 2020, 10, 9936.	3.3	7
48	The doping engineering and crystal structure of rod-like Au8Ag17 nanoclusters. Journal of Chemical Physics, 2021, 155, 074301.	3.0	7
49	Deoxygenative Transformation of Carbonyl and Carboxyl Compounds Using gem-Diborylalkanes. Synlett, 2019, 30, 1105-1110.	1.8	6
50	A Pd-catalyzed optional approach for the synthesis of dibenzothiophenes. Organic and Biomolecular Chemistry, 2018, 16, 2083-2087.	2.8	5
51	Controlled synthesis of pure Au₂₅(2-Nap)₁₈ and Au₃₆(2-Nap)₂₄ nanoclusters from 2-(diphenylphosphino)pyridine protected Au nanoclusters. RSC Advances, 2016, 6, 105166-105170.	3.6	4
52	Cu 2+ â€induced Structural Isomers: Effect of Foreign Metal Ions on the Structure and Properties of Silver Nanoclusters. Chemistry - an Asian Journal, 2019, 14, 972-976.	3.3	4
53	Impact of ammonium sulfite-based sequential pretreatment combinations on two distinct saccharifications of wheat straw. RSC Advances, 2020, 10, 17129-17142.	3.6	4
54	Synthesis and Optical Properties of Unique Pt₁Ag₂₄ Nanoclusters with Mixed Exterior Motif Structures. Inorganic Chemistry, 2021, 60, 10167-10172.	4.0	4

#	Article	IF	Citations
55	Atomically precise structures of Pt₂(S-Adam)₄(PPh₃)₂ complexes and catalytic application in propane dehydrogenation. Nanoscale, 2022, 14, 2482-2489.	5.6	3
56	Highly Efficient Synthesis of Au130(SPh-Br)50 Nanocluster. Chemical Research in Chinese Universities, 2018, 34, 719-722.	2.6	2
57	The synthesis and structure of the [PdAu₁₃(PPh₃)₃(SR)₇]⁺ nanocluster. Nanoscale, 2020, 12, 11825-11829.	5.6	1
58	Location of Cu Atom in Auâ€Based Nanocluster and Its Optical Properties. European Journal of Inorganic Chemistry, 2021, 2021, 2281-2283.	2.0	1