

Hengjiang Cong

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/6809590/publications.pdf>

Version: 2024-02-01

92
papers

3,885
citations

101543

36
h-index

138484

58
g-index

96
all docs

96
docs citations

96
times ranked

5209
citing authors

#	ARTICLE	IF	CITATIONS
1	Thermosensitive crystallization-boosted liquid thermocells for low-grade heat harvesting. <i>Science</i> , 2020, 370, 342-346.	12.6	289
2	Principles of Designing Extra-Large Pore Openings and Cages in Zeolitic Imidazolate Frameworks. <i>Journal of the American Chemical Society</i> , 2017, 139, 6448-6455.	13.7	197
3	Deciphering the Spatial Arrangement of Metals and Correlation to Reactivity in Multivariate Metal-Organic Frameworks. <i>Journal of the American Chemical Society</i> , 2016, 138, 13822-13825.	13.7	187
4	Metal-organic frameworks for precise inclusion of single-stranded DNA and transfection in immune cells. <i>Nature Communications</i> , 2018, 9, 1293.	12.8	187
5	Electrochemical Oxidative C-H Amination of Phenols: Access to Triarylamine Derivatives. <i>Angewandte Chemie - International Edition</i> , 2018, 57, 4737-4741.	13.8	148
6	Extended Benzoporphyrin-Based Metal-Organic Framework for Inhibition of Tumor Metastasis. <i>ACS Nano</i> , 2018, 12, 4630-4640.	14.6	136
7	Mesoporous Cages in Chemically Robust MOFs Created by a Large Number of Vertices with Reduced Connectivity. <i>Journal of the American Chemical Society</i> , 2019, 141, 488-496.	13.7	126
8	Electrooxidative para-selective C-H/N-H cross-coupling with hydrogen evolution to synthesize triarylamine derivatives. <i>Nature Communications</i> , 2019, 10, 639.	12.8	123
9	Achieving a balance between small singlet-triplet energy splitting and high fluorescence radiative rate in a quinoxaline-based orange-red thermally activated delayed fluorescence emitter. <i>Chemical Communications</i> , 2016, 52, 11012-11015.	4.1	105
10	Hexagonal RuSe ₂ Nanosheets for Highly Efficient Hydrogen Evolution Electrocatalysis. <i>Angewandte Chemie - International Edition</i> , 2021, 60, 7013-7017.	13.8	88
11	Electrooxidation enables highly regioselective dearomative annulation of indole and benzofuran derivatives. <i>Nature Communications</i> , 2020, 11, 3.	12.8	81
12	Z-Selective Addition of Diaryl Phosphine Oxides to Alkynes via Photoredox Catalysis. <i>ACS Catalysis</i> , 2018, 8, 10599-10605.	11.2	74
13	Electrochemical oxidative C-H/S-H cross-coupling between enamines and thiophenols with H ₂ evolution. <i>Chemical Science</i> , 2019, 10, 2791-2795.	7.4	73
14	Structural and Biochemical Insight into the Mechanism of Rv2837c from <i>Mycobacterium tuberculosis</i> as a c-di-NMP Phosphodiesterase. <i>Journal of Biological Chemistry</i> , 2016, 291, 3668-3681.	3.4	67
15	Growth and Piezoelectric Properties of Melilite ABC ₃ O ₇ Crystals. <i>Crystal Growth and Design</i> , 2012, 12, 622-628.	3.0	66
16	Silver(I)-Catalyzed Atroposelective Desymmetrization of N-Arylmaleimide via 1,3-Dipolar Cycloaddition of Azomethine Ylides: Access to Octahydropyrrolo[3,4-c]pyrrole Derivatives. <i>Journal of Organic Chemistry</i> , 2016, 81, 3752-3760.	3.2	59
17	Mechanically Strong Multifilament Fibers Spun from Cellulose Solution via Inducing Formation of Nanofibers. <i>ACS Sustainable Chemistry and Engineering</i> , 2018, 6, 5314-5321.	6.7	56
18	Structural and thermal properties of the monoclinic Lu ₂ SiO ₅ single crystal: evaluation as a new laser matrix. <i>Journal of Applied Crystallography</i> , 2009, 42, 284-294.	4.5	54

#	ARTICLE	IF	CITATIONS
19	Highly Active Carbon Supported Pd–Ag Nanofacets Catalysts for Hydrogen Production from HCOOH. <i>ACS Applied Materials & Interfaces</i> , 2016, 8, 20839-20848.	8.0	53
20	An Amorphous Cobalt Borate Nanosheet-Coated Cobalt Boride Hybrid for Highly Efficient Alkaline Water Oxidation Reaction. <i>ACS Sustainable Chemistry and Engineering</i> , 2019, 7, 5620-5625.	6.7	51
21	Oxygen Vacancies and Stacking Faults Introduced by Low-Temperature Reduction Improve the Electrochemical Properties of Li_2MnO_3 Nanobelts as Lithium-Ion Battery Cathodes. <i>ACS Applied Materials & Interfaces</i> , 2017, 9, 38545-38555.	8.0	50
22	Enantioselective Assembly of Cycloenones with a Nitrile-Containing All-Carbon Quaternary Center from Malononitriles Enabled by Ni Catalysis. <i>Journal of the American Chemical Society</i> , 2020, 142, 7328-7333.	13.7	49
23	Catalytic Synthesis of Atropisomeric <i>o</i> -Terphenyls with 1,2-Diaxes via Axial-to-Axial Diastereinduction. <i>Journal of the American Chemical Society</i> , 2021, 143, 7253-7260.	13.7	49
24	Membrane association of SadC enhances its diguanylate cyclase activity to control exopolysaccharides synthesis and biofilm formation in <i>Pseudomonas aeruginosa</i> . <i>Environmental Microbiology</i> , 2016, 18, 3440-3452.	3.8	47
25	Dynamic Hosts for High-Performance Li–S Batteries Studied by Cryogenic Transmission Electron Microscopy and in Situ X-ray Diffraction. <i>ACS Energy Letters</i> , 2018, 3, 1325-1330.	17.4	47
26	Investigations on the thermal and piezoelectric properties of fresnoite $\text{Ba}_2\text{TiSi}_2\text{O}_8$ single crystals. <i>Journal of Applied Physics</i> , 2014, 116, .	2.5	46
27	Intramolecular electronic coupling for persistent room-temperature luminescence for smartphone based time-gated fingerprint detection. <i>Materials Horizons</i> , 2019, 6, 1215-1221.	12.2	45
28	Uniform Bi–Sb Alloy Nanoparticles Synthesized from MOFs by Laser Metallurgy for Sodium-Ion Batteries. <i>ACS Sustainable Chemistry and Engineering</i> , 2020, 8, 335-342.	6.7	43
29	Electrochemical Oxidative C–H Amination of Phenols: Access to Triarylamine Derivatives. <i>Angewandte Chemie</i> , 2018, 130, 4827-4831.	2.0	42
30	Crystal growth and thermal properties of single crystal monoclinic NdCOB ($\text{NdCa}_4\text{O}(\text{BO}_3)_3$). <i>Journal of Alloys and Compounds</i> , 2010, 507, 335-340.	5.5	41
31	Oxidation-Induced β -Selective C–H Bond Functionalization: Thiolation and Selenation of N-Heterocycles. <i>ACS Catalysis</i> , 2019, 9, 1888-1894.	11.2	41
32	ScVO_4 : Explorations of Novel Crystalline Inorganic Optical Materials in Rare-Earth Orthovanadate Systems. <i>Crystal Growth and Design</i> , 2010, 10, 4389-4400.	3.0	39
33	Discovery of a ^{19}F MRI sensitive salinomycin derivative with high cytotoxicity towards cancer cells. <i>Chemical Communications</i> , 2016, 52, 5136-5139.	4.1	39
34	Stereoselective Palladium-Catalyzed 1,3-Arylboration of Unconjugated Dienes for Expedient Synthesis of 1,3-Disubstituted Cyclohexanes. <i>ACS Catalysis</i> , 2019, 9, 8555-8560.	11.2	39
35	Intermolecular Energy Gap-Induced Formation of High-Valent Cobalt Species in CoOOH Surface Layer on Cobalt Sulfides for Efficient Water Oxidation. <i>Angewandte Chemie</i> , 2022, 134, .	2.0	39
36	Twist and sliding dynamics between interpenetrated frames in Ti-MOF revealing high proton conductivity. <i>Chemical Science</i> , 2020, 11, 3978-3985.	7.4	38

#	ARTICLE	IF	CITATIONS
37	Palladium-Catalyzed (4 + 4) Annulation of Silacyclobutanes and 2-Iodoboarenes to Eight-Membered Silacycles via C–H and C–Si Bond Activation. <i>ACS Catalysis</i> , 2021, 11, 5703-5708.	11.2	36
38	Spectroscopy and laser performance of Nd:Lu ₂ O ₃ crystal. <i>Optics Express</i> , 2011, 19, 17774.	3.4	35
39	Iron-Catalyzed Intramolecular Amination of Aliphatic C–H Bonds of Sulfamate Esters with High Reactivity and Chemoselectivity. <i>Organic Letters</i> , 2019, 21, 2673-2678.	4.6	35
40	Exfoliation of MoS ₂ Nanosheets Enabled by a Redox-Potential-Matched Chemical Lithiation Reaction. <i>Nano Letters</i> , 2022, 22, 2956-2963.	9.1	35
41	Top-Seeded Solution Growth, Structure, Morphology, and Functional Properties of a New Polar Crystal Cs ₂ TeW ₃ O ₁₂ . <i>Crystal Growth and Design</i> , 2015, 15, 4484-4489.	3.0	34
42	Î ² -Substituted Alkenyl Heteroarenes as Dipolarophiles in the Cu(I)-Catalyzed Asymmetric 1,3-Dipolar Cycloaddition of Azomethine Ylides Empowered by a Dual Activation Strategy: Stereoselectivity and Mechanistic Insight. <i>Journal of the American Chemical Society</i> , 2021, 143, 3519-3535.	13.7	34
43	One-step rapid synthesis, crystal structure and 3.3 microseconds long excited-state lifetime of PdAg ₂₈ nanocluster. <i>Nano Research</i> , 2020, 13, 366-372.	10.4	30
44	Growth, thermal properties and laser operation of Nd:Ca ₃ La ₂ (BO ₃) ₄ : A new disordered laser crystal. <i>Optics Express</i> , 2013, 21, 6091.	3.4	29
45	Oxidant-free synthesis of benzimidazoles from alcohols and aromatic diamines catalysed by new Ru(<i>η</i> -PNS(O)) pincer complexes. <i>Dalton Transactions</i> , 2017, 46, 15012-15022.	3.3	28
46	Spinel-layered integrate structured nanorods with both high capacity and superior high-rate capability as cathode material for lithium-ion batteries. <i>Nano Research</i> , 2017, 10, 556-569.	10.4	26
47	New Ru(<i>η</i> -NN ² -type pincer complexes: synthesis, characterization and the catalytic hydrogenation of CO ₂ or bicarbonates to formate salts. <i>New Journal of Chemistry</i> , 2017, 41, 3055-3060.	2.8	25
48	Isolated Î–Interaction Sites in Mesoporous MOF Backbone for Repetitive and Reversible Dynamics in Water. <i>ACS Applied Materials & Interfaces</i> , 2019, 11, 973-981.	8.0	25
49	Manganese-catalyzed chlorosulfonylation of terminal alkene and alkyne via convergent paired electrolysis. <i>Cell Reports Physical Science</i> , 2021, 2, 100476.	5.6	25
50	Iridium-Catalyzed Asymmetric Hydrogenation of Tetrasubstituted Î±-Fluoro-Î²-enamino Esters: Efficient Access to Chiral Î±-Fluoro-Î²-amino Esters with Two Adjacent Tertiary Stereocenters. <i>Organic Letters</i> , 2018, 20, 6349-6353.	4.6	24
51	Syntheses and photoluminescence of copper(<i>i</i>) halide complexes containing dimethylthiophene bidentate phosphine ligands. <i>New Journal of Chemistry</i> , 2019, 43, 13408-13417.	2.8	24
52	A palladium/norbornene cooperative catalysis to access N-containing bridged scaffolds. <i>Chemical Communications</i> , 2019, 55, 8816-8819.	4.1	24
53	Electrochemical dual-oxidation strategy enables access to Î±-chlorosulfoxides from sulfides. <i>Science Bulletin</i> , 2022, 67, 79-84.	9.0	24
54	Thermal and electromechanical properties of melilite-type piezoelectric single crystals. <i>Journal of Applied Physics</i> , 2015, 117, .	2.5	23

#	ARTICLE	IF	CITATIONS
55	Controlling disorder in host lattice by hetero-valence ion doping to manipulate luminescence in spinel solid solution phosphors. <i>Science China Chemistry</i> , 2018, 61, 1624-1629.	8.2	23
56	A new strategy to synthesize three-coordinate mononuclear copper(II) halide complexes containing a bulky terphenyl bidentate phosphine ligand and their luminescent properties. <i>New Journal of Chemistry</i> , 2019, 43, 3390-3399.	2.8	23
57	Nitridation-induced metal-organic framework nanosheet for enhanced water oxidation electrocatalysis. <i>Journal of Energy Chemistry</i> , 2022, 64, 531-537.	12.9	23
58	Enantioselective Nickel-Catalyzed Reductive Aryl/Alkenyl Cyano Cyclization Coupling to All-Carbon Quaternary Stereocenters. <i>Journal of the American Chemical Society</i> , 2022, 144, 4776-4782.	13.7	23
59	Polarized spectral properties and laser demonstration of Nd-doped Sr ₃ Y ₂ (BO ₃) ₄ crystal. <i>Applied Optics</i> , 2012, 51, 7144.	1.8	21
60	Enantioselective Access to β -All-Carbon Quaternary Center-Containing Cyclohexanones by Palladium-Catalyzed Desymmetrization. <i>ACS Catalysis</i> , 2020, 10, 216-224.	11.2	21
61	Sequence control of metals in MOF by coordination number precoding for electrocatalytic oxygen evolution. <i>Chem Catalysis</i> , 2022, 2, 84-101.	6.1	20
62	Synthesis of chiral β -substituted α -amino acid and amine derivatives through Ni-catalyzed asymmetric hydrogenation. <i>Chemical Communications</i> , 2020, 56, 4934-4937.	4.1	19
63	Electrochemical Oxidative Carbon-Atom Difunctionalization: Towards Multisubstituted Imino Sulfide Ethers. <i>Angewandte Chemie - International Edition</i> , 2021, 60, 1573-1577.	13.8	19
64	Growth, morphology and anisotropic thermal properties of Nd-doped Sr ₃ Y ₂ (BO ₃) ₄ crystal. <i>Journal of Crystal Growth</i> , 2013, 363, 176-184.	1.5	16
65	Ag(I)-Catalyzed Kinetic Resolution of Cyclopentene-1,3-diones. <i>Organic Letters</i> , 2018, 20, 3482-3486.	4.6	16
66	Boosting Hydrogen Oxidation Performance of Phase-Engineered Ni Electrocatalyst under Alkaline Media. <i>ACS Sustainable Chemistry and Engineering</i> , 2022, 10, 3682-3689.	6.7	16
67	Improved mechanical properties of poly (vinyl alcohol) films with glycerol plasticizer by uniaxial drawing. <i>Polymers for Advanced Technologies</i> , 2018, 29, 2612-2618.	3.2	15
68	Comparative Investigation into Formycin A and Pyrazofurin A Biosynthesis Reveals Branch Pathways for the Construction of C ⁵ -Nucleoside Scaffolds. <i>Applied and Environmental Microbiology</i> , 2020, 86, .	3.1	15
69	Mitigation of voltage decay in Li-rich layered oxides as cathode materials for lithium-ion batteries. <i>Nano Research</i> , 2020, 13, 151-159.	10.4	15
70	Electrochemical Oxidative [4+2] Annulation of Different Styrenes toward the Synthesis of 1,2-Dihydronaphthalenes. <i>CCS Chemistry</i> , 2022, 4, 1557-1564.	7.8	15
71	Synthesis of Enantioenriched Fluorinated Enol Silanes Enabled by Asymmetric Reductive Coupling of Fluoroalkylacylsilanes and 1,3-Enynes and Brook Rearrangement. <i>ACS Catalysis</i> , 2022, 12, 2150-2157.	11.2	15
72	Morphological study of Czochralski-grown lanthanide orthovanadate single crystals and implications on the mechanism of bulk spiral formation. <i>Journal of Applied Crystallography</i> , 2010, 43, 308-319.	4.5	13

#	ARTICLE	IF	CITATIONS
73	Electrochemically selective double C(sp ²)–X (X = S/Se, N) bond formation of isocyanides. <i>Chemical Science</i> , 2021, 12, 14121-14125.	7.4	12
74	Growth and characterization of Nd:Lu ₃ ScxGa ₅ ·xO ₁₂ series laser crystals. <i>Optics Communications</i> , 2011, 284, 5192-5198.	2.1	11
75	Enantioselective Construction of Bridgehead Quaternary Carbon Containing Bicyclo[3.3.1]nonanes by Palladium-Catalyzed Asymmetric Arylation. <i>Synthesis</i> , 2018, 50, 1661-1666.	2.3	11
76	Phase transfer catalyst supported, room-temperature biphasic synthesis: a facile approach to the synthesis of coordination polymers. <i>Dalton Transactions</i> , 2012, 41, 4320.	3.3	9
77	Flux growth, structure, and physical characterization of new disordered laser crystal LiNd(MoO ₄) ₂ . <i>Journal of Crystal Growth</i> , 2015, 423, 1-8.	1.5	9
78	Enhancing resistance to radiation hardening and radiation thermal conductivity degradation by tungsten/graphene interface engineering. <i>Journal of Nuclear Materials</i> , 2020, 539, 152348.	2.7	9
79	Growth and optical properties of Nd:LaVO ₄ monoclinic crystal. <i>Journal of Materials Research</i> , 2012, 27, 2528-2534.	2.6	8
80	Pd-catalyzed arylation/aza-Michael addition cascade to C ₂ -spiroindolines and azabicyclo[3.2.2]nonanones. <i>Chemical Communications</i> , 2020, 56, 12013-12016.	4.1	8
81	Multivariate MOF for optimizing atmospheric water harvesting. <i>Green Energy and Environment</i> , 2022, 7, 575-577.	8.7	7
82	First principles calculations of mechanical properties of the YVO ₄ single crystal. <i>Journal of Applied Physics</i> , 2007, 102, 023516.	2.5	6
83	Composition characterization in YSGG garnet single crystals for ytterbium laser. <i>Optical Materials Express</i> , 2013, 3, 1408.	3.0	6
84	Redox active ligand and metal cooperation for C(sp ²)–H oxidation: extension of the galactose oxidase mechanism in water-mediated amide formation. <i>Dalton Transactions</i> , 2018, 47, 15293-15297.	3.3	6
85	Selective radical cascade (4+2) annulation with olefins towards the synthesis of chroman derivatives via organo-photoredox catalysis. <i>Chemical Science</i> , 2022, 13, 6316-6321.	7.4	4
86	Effect of high bismuth deficiency on structure and oxide ion conductivity of a Bi _{0.55} MoO ₄ single crystal. <i>CrystEngComm</i> , 2015, 17, 8746-8751.	2.6	3
87	Preparation, crystal structure, spectrographic characterization, thermal and third-order nonlinear optical properties of benzyltriethylammonium bis(2-thioxo-1,3-dithiole-4,5-dithiolato)aurate(III) for all-optical switching applications. <i>Solid State Sciences</i> , 2011, 13, 896-903.	3.2	2
88	Electrochemical Oxidative Carbon–Atom Difunctionalization: Towards Multisubstituted Imino Sulfide Ethers. <i>Angewandte Chemie</i> , 2021, 133, 1597-1601.	2.0	2
89	Stereoselective synthesis of 3,3-dipyrrolidinyl-spirooxindoles via the Zn(OAc) ₂ -mediated asymmetric Mannich-type reaction. <i>Tetrahedron Letters</i> , 2021, 67, 152819.	1.4	2
90	Copper (II) synergistic AS1411 conjunction with chemical decaging reactions for selective fluorescence imaging and prodrug activation in living systems. <i>Sensors and Actuators B: Chemical</i> , 2021, 349, 130773.	7.8	0

#	ARTICLE	IF	CITATIONS
91	Morphological study of Czochralski-grown lanthanide orthovanadate single crystals and implications on the mechanism of spiral formation. <i>Acta Crystallographica Section A: Foundations and Advances</i> , 2011, 67, C459-C460.	0.3	0
92	Crystal structure and bonding analysis of the first dinuclear calcium(II)â€“proton-pump inhibitor (PPI) 'butterfly molecule': a combined microcrystal synchrotron and DFT study. <i>Acta Crystallographica Section C, Structural Chemistry</i> , 2016, 72, 326-336.	0.5	0