Yoshihito Kayaki

List of Publications by Year
in descending order

101	4,229	117625	114465
papers	citations	34 h-index	63 g-index

124	124	124	3452
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Nâ€Heterocyclic Carbenes as Efficient Organocatalysts for CO₂ Fixation Reactions. Angewandte Chemie - International Edition, 2009, 48, 4194-4197.	13.8	346
2	Oxo-Tethered Ruthenium(II) Complex as a Bifunctional Catalyst for Asymmetric Transfer Hydrogenation and H₂ Hydrogenation. Journal of the American Chemical Society, 2011, 133, 14960-14963.	13.7	295
3	Halide-Free Dehydrative Allylation Using Allylic Alcohols Promoted by a Palladiumâˆ'Triphenyl Phosphite Catalyst. Journal of Organic Chemistry, 2004, 69, 2595-2597.	3.2	182
4	Aerobic Oxidative Kinetic Resolution of Racemic Secondary Alcohols with Chiral Bifunctional Amido Complexes. Angewandte Chemie - International Edition, 2008, 47, 2447-2449.	13.8	160
5	Stereoselective Formation of Î±-Alkylidene Cyclic Carbonates via Carboxylative Cyclization of Propargyl Alcohols in Supercritical Carbon Dioxide. Journal of Organic Chemistry, 2007, 72, 647-649.	3.2	144
6	Synthesis of Thermoresponsive Polyurethane from 2-Methylaziridine and Supercritical Carbon Dioxide. Angewandte Chemie - International Edition, 2004, 43, 717-719.	13.8	129
7	Efficient Access to Chiral Benzhydrols via Asymmetric Transfer Hydrogenation of Unsymmetrical Benzophenones with Bifunctional Oxo-Tethered Ruthenium Catalysts. Journal of the American Chemical Society, 2016, 138, 10084-10087.	13.7	116
8	NHCâ€“Gold(I) Complexes as Effective Catalysts for the Carboxylative Cyclization of Propargylamines with Carbon Dioxide. Organometallics, 2013, 32, 5285-5288.	2.3	115
9	Remarkable Positive Effect of Silver Salts on Asymmetric Hydrogenation of Acyclic Imines with Cp*Ir Complexes Bearing Chiral N-Sulfonylated Diamine Ligands. Organometallics, 2009, 28, 802-809.	2.3	111
10	Synthesis and Reactivities of Cp*Ir Amide and Hydride Complexes Bearing Câˆ'N Chelate Ligands. Organometallics, 2008, 27, 2795-2802.	2.3	108
11	Carboxylative cyclization of propargylamines with supercritical carbon dioxide. Green Chemistry, 2006, 8, 1019.	9.0	104
12	Aliphatic Poly(urethaneâˆ'amine)s Synthesized by Copolymerization of Aziridines and Supercritical Carbon Dioxide. Macromolecules, 2005, 38, 6429-6434.	4.8	88
13	Aerobic Oxidation of Alcohols with Bifunctional Transitionâ€Metal Catalysts Bearing Câ€“N Chelate Ligands. Chemistry - an Asian Journal, 2008, 3, 1479-1485.	3.3	88
14	Mechanistic Aspects of the Carboxylative Cyclization of Propargylamines and Carbon Dioxide Catalyzed by Gold(I) Complexes Bearing an N-Heterocyclic Carbene Ligand. ACS Catalysis, 2015, 5, 5135-5140.	11.2	77
15	N-Monomethylation of Aromatic Amines with Methanol via PN^HP-Pincer Ru Catalysts. Organic Letters, 2018, 20, 3866-3870.	4.6	75
16	Hydrogenation of Carbon Dioxide to Formate Catalyzed by a Copper/1,8â€Diazabicyclo[5.4.0]undecâ€7â€ene System. Advanced Synthesis and Catalysis, 2015, 357, 1369-1373.	4.3	73
17	Upgrading and expanding the scope of homogeneous transfer hydrogenation. Tetrahedron Letters, 2018, 59, 504-513.	1.4	73
18	A Highly Effective (Triphenyl phosphite)palladium Catalyst for a Cross?Coupling Reaction of Allylic Alcohols with Organoboronic Acids. European Journal of Organic Chemistry, 2004, 2004, 4989-4993.	2.4	72

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19	Cycloaddition of tertiary aziridines and carbon dioxide using a recyclable organocatalyst, 1,3-di-tert-butylimidazolium-2-carboxylate: straightforward access to 3-substituted 2-oxazolidones. Green Chemistry, 2013, 15, 425-430.	9.0	71
20	Amphiphilic Resin-Supported Ruthenium(II) Complexes as Recyclable Catalysts for the Hydrogenation of Supercritical Carbon Dioxide. Advanced Synthesis and Catalysis, 2003, 345, 175-179.	4.3	63
21	Enhanced Hydrogen Generation from Formic Acid by Halfâ€Sandwich Iridium(III) Complexes with Metal/NH Bifunctionality: A Pronounced Switch from Transfer Hydrogenation. Chemistry - A European Journal, 2015, 21, 13513-13517.	3.3	63
22	Highly Selective Carboxylative Cyclization of Allenylmethylamines with Carbon Dioxide Using N-Heterocyclic Carbene-Silver(I) Catalysts. Organic Letters, 2015, 17, 2334-2337.	4.6	63
23	Efficient dynamic kinetic resolution of racemic secondary alcohols by a chemoenzymatic system using bifunctional iridium complexes with Câ€“N chelate amido ligands. Chemical Communications, 2012, 48, 3635.	4.1	55
24	Comparison of the Reactivities of Neutral and Cationic Organopalladium Complexes toward CO, Isocyanides, and Olefins. Bulletin of the Chemical Society of Japan, 1997, 70, 917-927.	3.2	53
25	Double stimuli-responsive behavior of aliphatic poly(urethane-amine)s derived from supercritical carbon dioxide. Chemical Communications, 2005, , 2268.	4.1	48
26	Mesoporous silica-catalysed continuous chemical fixation of CO2 with N,Nâ€²-dimethylethylenediamine in supercriticalCO2: the efficient synthesis of 1,3-dimethyl-2-imidazolidinone. Chemical Communications, 2009, , 349-351.	4.1	46
27	Palladium-catalyzed carboxylative cyclization of Î±-allenyl amines in dense carbon dioxide. Tetrahedron Letters, 2009, 50, 6491-6493.	1.4	45
28	Atmospheric Hydrogenation of Esters Catalyzed by PNP-Ruthenium Complexes with an N-Heterocyclic Carbene Ligand. Organic Letters, 2016, 18, 3894-3897.	4.6	45
29	A Bifunctional Iridium Catalyst Modified for Persistent Hydrogen Generation from Formic Acid: Understanding Deactivation via Cyclometalation of a 1,2-Diphenylethylenediamine Motif. ACS Catalysis, 2017, 7, 4479-4484.	11.2	44
30	Selective Oxidative Carbonylation of Amines to Oxamides and Ureas Catalyzed by Palladium Complexes. Bulletin of the Chemical Society of Japan, 2004, 77, 2237-2250.	3.2	41
31	Synthesis and Thermolysis Behavior of Monoethylpalladium Complexes, EtPd(X)(PMe3)2 (X =) Tj ETQq1 1 0.784314 rgBT /Overlock 1	2.3	39
32	An efficient carbonylation of aryl halides catalysed by palladium complexes with phosphite ligands in supercritical carbon dioxide. Chemical Communications, 1999, , 1235-1236.	4.1	38
33	Asymmetric Mukaiyama aldol reaction of a ketene silyl acetal of thioester catalyzed by a binaphtholâ€“titanium complex in supercritical fluoroform. Tetrahedron Letters, 2000, 41, 1931-1934.	1.4	36
34	Hydrodefluorination of Fluoroarenes Using Hydrogen Transfer Catalysts with a Bifunctional Iridium/NH Moiety. ACS Catalysis, 2016, 6, 5181-5185.	11.2	36
35	Reductive Amination of Ketonic Compounds Catalyzed by Cp*Ir(III) Complexes Bearing a Picolinamidato Ligand. Journal of Organic Chemistry, 2019, 84, 10962-10977.	3.2	35
36	Multiple Absolute Stereocontrol in Cascade Lactone Formation via Dynamic Kinetic Resolution Driven by the Asymmetric Transfer Hydrogenation of Keto Acids with Oxo-Tethered Ruthenium Catalysts. Journal of the American Chemical Society, 2019, 141, 16354-16361.	13.7	33

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37	Supercritical fluids as reaction media for molecular catalysis. Catalysis Surveys From Asia, 2000, 4, 39-50.	1.2	31
38	Utilization of N,Nâ€Dialkylcarbamic Acid Derived from Secondary Amines and Supercritical Carbon Dioxide: Stereoselective Synthesis of Zâ€…Alkenyl Carbamates with a CO₂â€Soluble Rutheniumâ€“P(OC₂H₅)₃ Catalyst. Chemistry - an Asian Journal, 2008, 3, 1865-1870.	3.3	31
39	Aerobic oxidation with bifunctional molecular catalysts. Pure and Applied Chemistry, 2010, 82, 1471-1483.	1.9	31
40	Accessible Bifunctional Oxy-Tethered Ruthenium(II) Catalysts for Asymmetric Transfer Hydrogenation. Organic Letters, 2018, 20, 5213-5218.	4.6	29
41	Analysis of nitric acid decomposition of epoxy resin network structures for chemical recycling. Polymer Degradation and Stability, 2021, 186, 109537.	5.8	29
42	13C NMR Spectroscopic Evaluation of the Affinity of Carbonyl Compounds for Carbon Dioxide under Supercritical Conditions. Angewandte Chemie - International Edition, 2004, 43, 3719-3722.	13.8	28
43	Asymmetric nitrile-hydration with bifunctional ruthenium catalysts bearing chiral N-sulfonyldiamine ligands. Tetrahedron: Asymmetry, 2010, 21, 1169-1172.	1.8	28
44	NMR Observation of Trialkylphosphite-Palladium(II) and Ruthenium(II) Complexes in Supercritical Carbon Dioxide. Chemistry Letters, 2002, 31, 424-425.	1.3	25
45	Protic NNN and NCN Pincerâ€Type Ruthenium Complexes Featuring (Trifluoromethyl)pyrazole Arms: Synthesis and Application to Catalytic Hydrogen Evolution from Formic Acid. Chemistry - an Asian Journal, 2018, 13, 73-80.	3.3	24
46	Water-Soluble Trialkylphosphine-Ruthenium(II) Complexes as Efficient Catalysts for Hydrogenation of Supercritical Carbon Dioxide. Chemistry Letters, 2001, 30, 1016-1017.	1.3	23
47	Experimental and theoretical studies on the course of CO insertion into Ptâ€“C and Pdâ€“C bonds in neutral and cationic complexes, [MR(Cl){P(CH3)3}2] and [MR{P(CH3)3}2(s)]+BF4â€“ (M=Pt, Pd, R=CH3,) Tj ETQq1 1 0.784314 rgBT /O	1.8	23
48	Cleavage of Nâ€“H Bond of Ammonia via Metalâ€“Ligand Cooperation Enables Rational Design of a Conceptually New Noyoriâ€“Ikariya Catalyst. Journal of the American Chemical Society, 2019, 141, 2661-2677.	13.7	23
49	Cationic Iridium and Rhodium Complexes with Câ€“N Chelating Primary Benzylic Amine Ligands as Potent Catalysts for Hydrogenation of Unsaturated Carbonâ€“Nitrogen Bonds. Organometallics, 2016, 35, 1257-1264.	2.3	22
50	Selective Asymmetric Transfer Hydrogenation of Î±â€Substituted Acetophenones with Bifunctional Oxoâ€Tethered Ruthenium(II) Catalysts. Advanced Synthesis and Catalysis, 2018, 360, 568-574.	4.3	22
51	Raman spectral shifts of CO2 as measure of CO2-philicity of solutes in supercritical carbon dioxide. Journal of Supercritical Fluids, 2007, 40, 20-26.	3.2	21
52	New Approach to Recycling of Epoxy Resins Using Nitric Acid: Regeneration of Decomposed Products through Hydrogenation. ACS Sustainable Chemistry and Engineering, 2021, 9, 12520-12529.	6.7	21
53	Enhanced product selectivity in the Mizorokiâ€“Heck reaction using a supercritical carbon dioxideâ€“liquid biphasic system. Chemical Communications, 2000, , 2245-2246.	4.1	20
54	Formation of a Palladalactone Complex by Câ€“O Bond Cleavage of Diketene Promoted by a Zerovalent Palladium Complex. Chemistry Letters, 1999, 28, 685-686.	1.3	19

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55	Hydrogenation of carboxylic acid derivatives with bifunctional ruthenium catalysts. Pure and Applied Chemistry, 2014, 86, 933-943.	1.9	19
56	Formal Deoxygenative Hydrogenation of Lactams Using PN^HP-Pincer Ruthenium Complexes under Nonacidic Conditions. Organic Letters, 2019, 21, 9954-9959.	4.6	19
57	1H, 13C, and 19F NMR Studies on Molecular Interactions of CO2 with Î²-Diketones and UO2(Î²-diketonato)2DMSO Complexes in Supercritical CO2. Journal of Physical Chemistry B, 2008, 112, 16445-16454.	2.6	18
58	Catalytic Behavior of Cationic Hydridoruthenium(II) Complex, [RuH(NH3)(PMe3)4]+, in H2-Hydrogenation and Transfer Hydrogenation of Imines. Bulletin of the Chemical Society of Japan, 2008, 81, 1053-1061.	3.2	18
59	Heterolysis of NH-Indoles by Bifunctional Amido Complexes and Applications to Carboxylation with Carbon Dioxide. Organometallics, 2014, 33, 4479-4485.	2.3	17
60	Poly(ethyleneimine)â€Mediated Consecutive Hydrogenation of Carbon Dioxide to Methanol with Ru Catalysts. European Journal of Inorganic Chemistry, 2019, 2019, 2375-2380.	2.0	17
61	Copper Catalysts Unleashing the Potential for Hydrogenation of Carbonâ^'Oxygen Bonds. Asian Journal of Organic Chemistry, 2018, 7, 2005-2014.	2.7	16
62	Synthesis of Ruthenium(II) Complexes Containing Hydroxymethylphosphines and Their Catalytic Activities for Hydrogenation of Supercritical Carbon Dioxide. Inorganic Chemistry, 2007, 46, 5791-5797.	4.0	15
63	Highly efficient carbonylation reactions of organic halides in supercritical carbon dioxide. Progress in Nuclear Energy, 2000, 37, 429-434.	2.9	14
64	Spectrophotometric study on solubility of UO2(Î²-diketonato)2dmso complexes (Î²-diketonate=acetylacetonate, trifluoroacetylacetonate, hexafluoroacetylacetonate; dmso=dimethyl) Tj ETQq0 0 0 rgBT /Overlock 10 T	3.2	14
65	Aerobic oxidative desymmetrization of meso-diols with bifunctional amidoiridium catalysts bearing chiral N-sulfonyldiamine ligands. Tetrahedron Letters, 2014, 55, 1188-1191.	1.4	14
66	Convincing Catalytic Performance of Oxo-Tethered Ruthenium Complexes for Asymmetric Transfer Hydrogenation of Cyclic Î±-Halogenated Ketones through Dynamic Kinetic Resolution. Organic Letters, 2021, 23, 3070-3075.	4.6	14
67	Nucleophilic Aromatic Substitution in Hydrodefluorination Exemplified by Hydridoiridium(III) Complexes with Fluorinated Phenylsulfonyl-1,2-diphenylethylenediamine Ligands. Organometallics, 2018, 37, 1958-1969.	2.3	13
68	Comparative Study of Bifunctional Mononuclear and Dinuclear Amidoiridium Complexes with Chiral Câ^'N Chelating Ligands for the Asymmetric Transfer Hydrogenation of Ketones. Chemistry - an Asian Journal, 2016, 11, 2924-2931.	3.3	12
69	Reactivities of Neutral and Cationic Organopalladium Complexes. Chemistry Letters, 1995, 24, 1089-1090.	1.3	11
70	Studies on solubility of uranyl complexes in supercritical carbon dioxide and its controlling factors using UV-visible and¹⁷O- and¹⁹F-NMR spectroscopy. Journal of Nuclear Science and Technology, 2012, 49, 37-46.	1.3	10
71	Removal of a Palladium-Bound Tertiary Phosphine Ligand with Silver(I) Salts to Generate Cationic Monoorganopalladium(II) Complexes Having One Trimethylphosphine Ligand. Bulletin of the Chemical Society of Japan, 1997, 70, 1135-1140.	3.2	9
72	Synthesis and Properties of Dimethyl- and Monomethylbis(phosphite)palladium(II) Complexes. Bulletin of the Chemical Society of Japan, 1997, 70, 1141-1147.	3.2	9

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73	Amidines as Effective Ancillary Ligands in Copper-catalyzed Hydrogenation of Carbon Dioxide. Chemistry Letters, 2020, 49, 252-254.	1.3	9
74	Advantageous asymmetric ketone reduction with a competitive hydrogenation/transfer hydrogenation system using chiral bifunctional iridium catalysts. RSC Advances, 2014, 4, 61001-61004.	3.6	8
75	Distinct Promotive Effects of 1,8â€Diazabicyclo[5.4.0]undecâ€7â€ene (DBU) on Polymer Supports in Copperâ€Catalyzed Hydrogenation of C=O Bonds. ChemCatChem, 2017, 9, 4501-4507.	3.7	8
76	Catalytic Hydrogenation of Carboxamides with a Bifunctional Cp*Ru Catalyst Bearing an Imidazol-2-ylidene with a Protic Aminoethyl Side Chain. Synthesis, 2019, 51, 2542-2547.	2.3	8
77	Remarkable Rate Enhancement in CO Insertion into Pd-C Bond by Generating Cationic Organopalladium Complexes [PdR(s)L2]+BF4â^'(R = Alkyl Group, s = Acetone, L = Phosphine Ligands) from Neutral Monoorganopalladium Complexes [PdR(X)L2] (X = Halide). Chemistry Letters, 1994, 23, 2171-2174.	1.3	7
78	1,1-Insertion into Metalâ€"Carbon Bond. Current Methods in Inorganic Chemistry, 2003, 3, 373-409.	0.9	7
79	Control of Thermoresponsive Behavior of Poly (urethane-amine)s Prepared by Copolymerization of Supercritical Carbon Dioxide and Aziridines. Kobunshi Ronbunshu, 2005, 62, 196-199.	0.2	7
80	Harmonious hydrogenation catalysts. Nature Catalysis, 2018, 1, 739-740.	34.4	5
81	Transfer hydrogenation of carbon dioxide via bicarbonate promoted by bifunctional Câ€"N chelating Cp*Ir complexes. Chemical Communications, 2020, 56, 10762-10765.	4.1	5
82	The activation of furfuryl alcohol polymerization by oxygen and its enhanced mechanical properties. Journal of Applied Polymer Science, 2021, 138, 50311.	2.6	5
83	Oxy-tethered Cp*Ir(<scp>iii</scp>) complex as a competent catalyst for selective dehydrogenation from formic acid. Chemical Communications, 2021, 57, 5534-5537.	4.1	5
84	Asymmetric Transfer Hydrogenative Amination of Benzylic Ketones Catalyzed by Cp*Ir(III) Complexes Bearing a Chiral N-(2-Picolyl)sulfonamidato Ligand. Journal of Organic Chemistry, 2022, 87, 8458-8468.	3.2	5
85	Comparative Studies on Exchange Reactions of Hexafluoroacetylacetonate in Bis(hexafluoroacetylacetonato)(dimethyl sulfoxide)dioxouranium(VI) in Nonaqueous Solvent and Supercritical CO2. Inorganic Chemistry, 2008, 47, 349-359.	4.0	4
86	Azametallametallocene Formation via Double sp3 Câ€"H Activation of 6-Substituted ortho-Toluidines by a Half-sandwich Acetatoiridium Complex. Chemistry Letters, 2015, 44, 188-190.	1.3	4
87	Development of Homogeneous Hydrogenation of Carbon Dioxide to Formate Catalyzed by Copper Complexes. Energy Procedia, 2017, 114, 7150-7153.	1.8	4
88	Synthesis and Reactivity of Cp*Ir^{III} Complexes with a Câ€"S Chelate Displaying Metal/Sulfur Bifunctionality. Organometallics, 2018, 37, 3342-3352.	2.3	3
89	New Bifunctional Bis(azairidacycle) with Axial Chirality via Double Cyclometalation of 2,2â€²-Bis(aminomethyl)-1,1â€²-binaphthyl. Molecules, 2021, 26, 1165.	3.8	3
90	Synthesis and Reactivities of Organopalladium Complexes as Models for Active Species in Catalytic Reactions.. Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 1998, 56, 96-106.	0.1	3

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91	Hydrogen Evolution from Formic Acid and Hydrodefluorination of Fluoroarenes by Bifunctional Iridium Catalystsâ€"Beyond the Transfer Hydrogenation. Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 2018, 76, 315-324.	0.1	3
92	A Pâ€"C Chelate, Protic 1,2-Dihydropyridin-2-ylidene Ruthenium Complex: Synthesis, Structure, and Reversible Deprotonation. Chemistry Letters, 2019, 48, 787-790.	1.3	2
93	Organic Syntheses in Supercritical Fluids Directed toward Green Chemistry. Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 2003, 61, 472-483.	0.1	2
94	Synthesis of a Half-Sandwich Hydroxidoiridium(III) Complex Bearing a Nonprotic N-Sulfonyldiamine Ligand and Its Transformations Triggered by the BrÃ¸nsted Basicity. Inorganics, 2019, 7, 125.	2.7	1
95	Regioselective Transfer Hydrogenative Defluorination of Polyfluoroarenes Catalyzed by Bifunctional Azairidacycle. Organics, 2022, 3, 150-160.	1.3	1
96	Organic Syntheses in Supercritical Fluids Directed Toward Green Chemistry. ChemInform, 2003, 34, no.	0.0	0
97	Halide-Free Dehydrative Allylation Using Allylic Alcohols Promoted by a Palladiumâ€"Triphenyl Phosphite Catalyst.. ChemInform, 2004, 35, no.	0.0	0
98	A Highly Effective (Triphenyl phosphite)palladium Catalyst for a Cross?Coupling Reaction of Allylic Alcohols with Organoboronic Acids.. ChemInform, 2005, 36, no.	0.0	0
99	Selective Oxidation Carbonylation of Amines to Oxamides and Ureas Catalyzed by Palladium Complexes.. ChemInform, 2005, 36, no.	0.0	0
100	Synthetic Chemistry of Alkenylgold Complexes Associated with Catalytic Intermediates. Bulletin of Japan Society of Coordination Chemistry, 2015, 66, 3-11.	0.2	0
101	Synthesis of N,O-Chelating Hydrazidopalladium Complexes from 1,2-Bis(trifluoroacetyl)hydrazine. Inorganics, 2021, 9, 76.	2.7	0