Takashi Hayashi

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/3456399/publications.pdf

Version: 2024-02-01

214 papers 6,376 citations

44 h-index

57758

98798 67 g-index

240 all docs

 $\begin{array}{c} 240 \\ \\ \text{docs citations} \end{array}$

times ranked

240

4193 citing authors

#	Article	IF	CITATIONS
1	Focusing on a nickel hydrocorphinoid in a protein matrix: methane generation by methyl-coenzyme M reductase with F430 cofactor and its models. Chemical Society Reviews, 2022, 51, 1629-1639.	38.1	11
2	DNAâ€Mediated Protein Shuttling between Coacervateâ€Based Artificial Cells. Angewandte Chemie, 2022, 134, .	2.0	2
3	DNAâ€Mediated Protein Shuttling between Coacervateâ€Based Artificial Cells. Angewandte Chemie - International Edition, 2022, 61, .	13.8	22
4	Reactivity of Myoglobin Reconstituted with Cobalt Corrole toward Hydrogen Peroxide. International Journal of Molecular Sciences, 2022, 23, 4829.	4.1	4
5	Directed Evolution of a Cp*Rh ^{III} â€Linked Biohybrid Catalyst Based on a Screening Platform with Affinity Purification. ChemBioChem, 2021, 22, 679-685.	2.6	10
6	Myoglobins engineered with artificial cofactors serve as artificial metalloenzymes and models of natural enzymes. Dalton Transactions, 2021, 50, 1940-1949.	3.3	32
7	Thermally Controlled Construction of Fe–N <i>_x</i> Active Sites on the Edge of a Graphene Nanoribbon for an Electrocatalytic Oxygen Reduction Reaction. ACS Applied Materials & Amp; Interfaces, 2021, 13, 15101-15112.	8.0	25
8	Construction of a whole-cell biohybrid catalyst using a Cp*Rh(III)-dithiophosphate complex as a precursor of a metal cofactor. Journal of Inorganic Biochemistry, 2021, 216, 111352.	3.5	8
9	Dynamic Protease Activation on a Multimeric Synthetic Protein Scaffold via Adaptable DNAâ€Based Recruitment Domains. Angewandte Chemie, 2021, 133, 11362-11366.	2.0	2
10	Dynamic Protease Activation on a Multimeric Synthetic Protein Scaffold via Adaptable DNAâ€Based Recruitment Domains. Angewandte Chemie - International Edition, 2021, 60, 11262-11266.	13.8	5
11	Functional Myoglobin Model Composed of a Strapped Porphyrin/Cyclodextrin Supramolecular Complex with an Overhanging COOH That Increases O ₂ /CO Binding Selectivity in Aqueous Solution. Inorganic Chemistry, 2021, 60, 12392-12404.	4.0	4
12	A Supramolecular Assembly of Hemoproteins Formed in a Star-Shaped Structure via Heme–Heme Pocket Interactions. International Journal of Molecular Sciences, 2021, 22, 1012.	4.1	3
13	Electrocatalytic Hydrogen Evolution Reaction Promoted by Co/N/C Catalysts with Co–N <i>x</i> Active Sites Derived from Precursors Forming N-Doped Graphene Nanoribbons. Bulletin of the Chemical Society of Japan, 2021, 94, 2898-2905.	3.2	3
14	Oneâ€step Preparation of Fe/N/C Singleâ€atom Catalysts Containing Feâ^'N4 Sites from an Iron Complex Precursor with 5,6,7,8â€Tetraphenylâ€1,12â€diazatriphenylene Ligands. Chemistry - A European Journal, 2021, , .	3.3	2
15	Supramolecular dimerization of a hexameric hemoprotein <i>via</i> multiple pyrene-pyrene interactions. Journal of Porphyrins and Phthalocyanines, 2020, 24, 259-267.	0.8	7
16	Thermoresponsive Micellar Assembly Constructed from a Hexameric Hemoprotein Modified with $Poly(x_i) - x_i = 1$ Foly(x_i) System. Journal of the American Chemical Society, 2020, 142, 1822-1831.	13.7	57
17	Triazolecarbaldehyde Reagents for Oneâ€6tep Nâ€Terminal Protein Modification. ChemBioChem, 2020, 21, 1274-1278.	2.6	15
18	Construction of a Hexameric Hemoprotein Sheet and Direct Observation of Dynamic Processes of Its Formation. Chemistry Letters, 2020, 49, 186-190.	1.3	7

#	Article	IF	Citations
19	Chiral paddle-wheel diruthenium complexes for asymmetric catalysis. Nature Catalysis, 2020, 3, 851-858.	34.4	47
20	Effect of Molecule–Substrate Interactions on the Adsorption of <i>meso</i> -Dibenzoporphycene Tautomers Studied by Scanning Probe Microscopy and First-Principles Calculations. Journal of Physical Chemistry C, 2020, 124, 26759-26768.	3.1	6
21	Methane Generation and Reductive Debromination of Benzylic Position by Reconstituted Myoglobin Containing Nickel Tetradehydrocorrin as a Model of Methyl-coenzyme M Reductase. Inorganic Chemistry, 2020, 59, 11995-12004.	4.0	13
22	Incorporation of a Cp*Rh(III)-dithiophosphate Cofactor with Latent Activity into a Protein Scaffold Generates a Biohybrid Catalyst Promoting C(sp $<$ sup $>2<$ sup $>$) $\hat{a}\in$ "H Bond Functionalization. Inorganic Chemistry, 2020, 59, 14457-14463.	4.0	12
23	Myoglobin Reconstituted with Ni Tetradehydrocorrin as a Methaneâ€Generating Model of Methylâ€coenzyme M Reductase. Angewandte Chemie - International Edition, 2019, 58, 13813-13817.	13.8	22
24	Myoglobin Reconstituted with Ni Tetradehydrocorrin as a Methaneâ€Generating Model of Methylâ€coenzyme M Reductase. Angewandte Chemie, 2019, 131, 13951-13955.	2.0	5
25	Methane generation via intraprotein C–S bond cleavage in cytochrome b562 reconstituted with nickel didehydrocorrin. Journal of Organometallic Chemistry, 2019, 901, 120945.	1.8	13
26	Site-Specific Modification of Proteins through N-Terminal Azide Labeling and a Chelation-Assisted CuAAC Reaction. Bioconjugate Chemistry, 2019, 30, 2427-2434.	3.6	16
27	Electrochemical CO ₂ reduction by a cobalt bipyricorrole complex: decrease of an overpotential value derived from monoanionic ligand character of the porphyrinoid species. Chemical Communications, 2019, 55, 493-496.	4.1	17
28	Photoinduced electron transfer within supramolecular hemoprotein co-assemblies and heterodimers containing Fe and Zn porphyrins. Journal of Inorganic Biochemistry, 2019, 193, 42-51.	3.5	8
29	A ring-shaped hemoprotein trimer thermodynamically controlled by the supramolecular heme–heme pocket interaction. Chemical Communications, 2019, 55, 1544-1547.	4.1	13
30	Hemoproteins Reconstituted with Artificial Metal Complexes as Biohybrid Catalysts. Accounts of Chemical Research, 2019, 52, 945-954.	15.6	118
31	Artificially Created Metalloenzyme Consisting of an Organometallic Complex Immobilized to a Protein Matrix. , 2019, , 307-328.		0
32	Light triggers molecular shuttling in rotaxanes: control over proximity and charge recombination. Chemical Science, 2019, 10, 3846-3853.	7.4	19
33	Arginine Residues Provide a Multivalent Effect for Cellular Uptake of a Hemoprotein Assembly. Chemistry Letters, 2019, 48, 295-298.	1.3	7
34	Artificial Hemoprotein Assemblies in Development of Nanobiomaterials. Series on Chemistry, Energy and the Environment, 2019, , 71-88.	0.3	0
35	Nonpreciousâ€metal Fe/N/C Catalysts Prepared from Ï€â€Expanded Fe Salen Precursors toward an Efficient Oxygen Reduction Reaction. ChemCatChem, 2018, 10, 653-653.	3.7	2
36	Cavity Size Engineering of a $\hat{1}^2$ -Barrel Protein Generates Efficient Biohybrid Catalysts for Olefin Metathesis. ACS Catalysis, 2018, 8, 3358-3364.	11.2	39

3

#	Article	IF	CITATIONS
37	A Whole Cell <i>E. coli</i> Display Platform for Artificial Metalloenzymes: Poly(phenylacetylene) Production with a Rhodium–Nitrobindin Metalloprotein. ACS Catalysis, 2018, 8, 2611-2614.	11.2	71
38	Bimetallic M/N/C catalysts prepared from ¨i€-expanded metal salen precursors toward an efficient oxygen reduction reaction. RSC Advances, 2018, 8, 2892-2899.	3.6	15
39	A water-soluble supramolecular complex that mimics the heme/copper hetero-binuclear site of cytochrome <i>c</i> oxidase. Chemical Science, 2018, 9, 1989-1995.	7.4	29
40	Preparation and characterization of myoglobin reconstituted with Fe(II) oxaporphyrin: The monoanionic macrocycle provides unique cyanide binding behavior for the ferrous species. Inorganica Chimica Acta, 2018, 472, 184-191.	2.4	3
41	Successive energy transfer within multiple photosensitizers assembled in a hexameric hemoprotein scaffold. Physical Chemistry Chemical Physics, 2018, 20, 3200-3209.	2.8	11
42	Mitochondriaâ€Targeting Polyamineâ€"Protoporphyrin Conjugates for Photodynamic Therapy. ChemMedChem, 2018, 13, 15-19.	3.2	19
43	Nonpreciousâ€metal Fe/N/C Catalysts Prepared from Ï€â€Expanded Fe Salen Precursors toward an Efficient Oxygen Reduction Reaction. ChemCatChem, 2018, 10, 743-750.	3.7	17
44	Roles of N- and C-terminal domains in the ligand-binding properties of cytoglobin. Journal of Inorganic Biochemistry, 2018, 179, 1-9.	3.5	15
45	Synthesis and Characterization of <i>meso</i> -Substituted Cobalt Tetradehydrocorrin and Evaluation of Its Electrocatalytic Behavior Toward CO ₂ Reduction and H ₂ Evolution. Inorganic Chemistry, 2018, 57, 14644-14652.	4.0	13
46	Olefin metathesis catalysts embedded in \hat{l}^2 -barrel proteins: creating artificial metalloproteins for olefin metathesis. Beilstein Journal of Organic Chemistry, 2018, 14, 2861-2871.	2.2	16
47	A Heterogeneous Hydrogenâ€Evolution Catalyst Based on a Mesoporous Organosilica with a Diiron Catalytic Center Modelling [FeFe]â€Hydrogenase. ChemCatChem, 2018, 10, 4894-4899.	3.7	10
48	Supramolecular Hemoprotein Assembly with a Periodic Structure Showing Heme–Heme Exciton Coupling. Journal of the American Chemical Society, 2018, 140, 10145-10148.	13.7	30
49	Myoglobin Derivatives Reconstituted with Modified Metal Porphyrinoids as Structural and Functional Models of the Cytochrome P450 Enzymes. 2-Oxoglutarate-Dependent Oxygenases, 2018, , 63-78.	0.8	0
50	Redox Potentials of Cobalt Corrinoids with Axial Ligands Correlate with Heterolytic Co–C Bond Dissociation Energies. Inorganic Chemistry, 2017, 56, 1950-1955.	4.0	22
51	Rab5-regulated endocytosis plays a crucial role in apical extrusion of transformed cells. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, E2327-E2336.	7.1	40
52	Cobalt tetradehydrocorrins coordinated by imidazolate-like histidine in the heme pocket of horseradish peroxidase. Journal of Biological Inorganic Chemistry, 2017, 22, 695-703.	2.6	6
53	Enhanced visible light response of a WO ₃ photoelectrode with an immobilized fibrous gold nanoparticle assembly using an amyloid-β peptide. RSC Advances, 2017, 7, 1089-1092.	3.6	2
54	A supramolecular assembly based on an engineered hemoprotein exhibiting a thermal stimulus-driven conversion to a new distinct supramolecular structure. Chemical Communications, 2017, 53, 6879-6882.	4.1	17

#	Article	IF	Citations
55	Iron-Strapped Porphyrins with Carboxylic Acid Groups Hanging over the Coordination Site: Synthesis, X-ray Characterization, and Dioxygen Binding. Inorganic Chemistry, 2017, 56, 7373-7383.	4.0	9
56	CuAAC in a Distal Pocket: Metal Active-Template Synthesis of Strapped-Porphyrin [2]Rotaxanes. Chemistry - A European Journal, 2017, 23, 13537-13537.	3.3	0
57	<i>meso</i> -Tetraaryl(porphyrinato)cobalt(III)-catalyzed Oxygenation of Disilanes under Aerobic Conditions. Chemistry Letters, 2017, 46, 1807-1809.	1.3	4
58	A Pyreneâ€Linked Cavity within a βâ€Barrel Protein Promotes an Asymmetric Diels–Alder Reaction. Angewandte Chemie, 2017, 129, 13806-13810.	2.0	9
59	Titelbild: A Pyreneâ€Linked Cavity within a βâ€Barrel Protein Promotes an Asymmetric Diels–Alder Reaction (Angew. Chem. 44/2017). Angewandte Chemie, 2017, 129, 13719-13719.	2.0	0
60	CuAAC in a Distal Pocket: Metal Activeâ€Template Synthesis of Strappedâ€Porphyrin [2]Rotaxanes. Chemistry - A European Journal, 2017, 23, 13579-13582.	3.3	15
61	A Pyreneâ€Linked Cavity within a βâ€Barrel Protein Promotes an Asymmetric Diels–Alder Reaction. Angewandte Chemie - International Edition, 2017, 56, 13618-13622.	13.8	26
62	Interdomain flip-flop motion visualized in flavocytochrome cellobiose dehydrogenase using high-speed atomic force microscopy during catalysis. Chemical Science, 2017, 8, 6561-6565.	7.4	26
63	Manganese(V) Porphycene Complex Responsible for Inert C–H Bond Hydroxylation in a Myoglobin Matrix. Journal of the American Chemical Society, 2017, 139, 18460-18463.	13.7	60
64	Catalytic Cyclopropanation by Myoglobin Reconstituted with Iron Porphycene: Acceleration of Catalysis due to Rapid Formation of the Carbene Species. Journal of the American Chemical Society, 2017, 139, 17265-17268.	13.7	110
65	Substitution of an amino acid residue axially coordinating to the heme molecule in hexameric tyrosine-coordinated hemoprotein to enhance peroxidase activity. Journal of Porphyrins and Phthalocyanines, 2017, 21, 824-831.	0.8	3
66	Cofactor-specific Anchoring of Horseradish Peroxidase onto a Polythiophene-modified Electrode. Chemistry Letters, 2017, 46, 1818-1821.	1.3	0
67	Artificial Diels–Alderase based on the transmembrane protein FhuA. Beilstein Journal of Organic Chemistry, 2016, 12, 1314-1321.	2.2	33
68	Anchoring Cytochrome <i>b</i> ₅₆₂ on a Gold Nanoparticle by a Heme–Heme Pocket Interaction. European Journal of Inorganic Chemistry, 2016, 2016, 3454-3459.	2.0	3
69	Cofactor-specific covalent anchoring of cytochrome b562on a single-walled carbon nanotube by click chemistry. RSC Advances, 2016, 6, 65936-65940.	3.6	9
70	<i>In Situ</i> Observation of Enhanced Photoinduced Charge Separation in a Gold Nanoparticle Assembly Immobilized on TiO ₂ . ChemistrySelect, 2016, 1, 5666-5670.	1.5	1
71	Photocatalytic Properties of TiO ₂ Composites Immobilized with Gold Nanoparticle Assemblies Using the Streptavidin–Biotin Interaction. Langmuir, 2016, 32, 6459-6467.	3.5	14
72	Oxygenâ€binding Protein Fiber and Microgel: Supramolecular Myoglobin–Poly(acrylate) Conjugates. Chemistry - an Asian Journal, 2016, 11, 1036-1042.	3.3	10

5

#	Article	IF	CITATIONS
73	Crystal Structures and Coordination Behavior of Aqua- and Cyano-Co(III) Tetradehydrocorrins in the Heme Pocket of Myoglobin. Inorganic Chemistry, 2016, 55, 1287-1295.	4.0	16
74	Intraprotein transmethylation via a CH ₃ â€"Co(<scp>iii</scp>) species in myoglobin reconstituted with a cobalt corrinoid complex. Dalton Transactions, 2016, 45, 3277-3284.	3.3	31
75	Construction of a hybrid biocatalyst containing a covalently-linked terpyridine metal complex within a cavity of aponitrobindin. Journal of Inorganic Biochemistry, 2016, 158, 55-61.	3.5	34
76	Energy migration within hexameric hemoprotein reconstituted with Zn porphyrinoid molecules. Chemical Communications, 2015, 51, 11138-11140.	4.1	30
77	Artificial hydrogenase: biomimetic approaches controlling active molecular catalysts. Current Opinion in Chemical Biology, 2015, 25, 133-140.	6.1	36
78	Generation of New Artificial Metalloproteins by Cofactor Modification of Native Hemoproteins. Israel Journal of Chemistry, 2015, 55, 76-84.	2.3	32
79	<i>meso</i> â€Ðibenzoporphycene has a Large Bathochromic Shift and a Porphycene Framework with an Unusual <i>cis</i> fi> Tautomeric Form. Angewandte Chemie - International Edition, 2015, 54, 6227-6230.	13.8	46
80	Myoglobin-based non-precious metal carbon catalysts for an oxygen reduction reaction. Journal of Porphyrins and Phthalocyanines, 2015, 19, 510-516.	0.8	7
81	A Highly Active Biohybrid Catalyst for Olefin Metathesis in Water: Impact of a Hydrophobic Cavity in a \hat{I}^2 -Barrel Protein. ACS Catalysis, 2015, 5, 7519-7522.	11.2	68
82	Fabrication of enzyme-degradable and size-controlled protein nanowires using single particle nano-fabrication technique. Nature Communications, 2014, 5, 3718.	12.8	38
83	Rhodium-Complex-Linked Hybrid Biocatalyst: Stereo-Controlled Phenylacetylene Polymerization within an Engineered Protein Cavity. ChemCatChem, 2014, 6, 1123-1123.	3.7	4
84	Rhodiumâ€Complexâ€Linked Hybrid Biocatalyst: Stereoâ€Controlled Phenylacetylene Polymerization within an Engineered Protein Cavity. ChemCatChem, 2014, 6, 1229-1235.	3.7	32
85	Enzyme–substrate complex structures of CYP154C5 shed light on its mode of highly selective steroid hydroxylation. Acta Crystallographica Section D: Biological Crystallography, 2014, 70, 2875-2889.	2.5	19
86	H ₂ O ₂ -dependent substrate oxidation by an engineered diiron site in a bacterial hemerythrin. Chemical Communications, 2014, 50, 3421-3423.	4.1	9
87	Co(<scp>ii</scp>)/Co(<scp>i</scp>) reduction-induced axial histidine-flipping in myoglobin reconstituted with a cobalt tetradehydrocorrin as a methionine synthase model. Chemical Communications, 2014, 50, 12560-12563.	4.1	39
88	Photoinduced Hydrogen Evolution Catalyzed by a Synthetic Diiron Dithiolate Complex Embedded within a Protein Matrix. ACS Catalysis, 2014, 4, 2645-2648.	11.2	92
89	Hemoprotein-based supramolecular assembling systems. Current Opinion in Chemical Biology, 2014, 19, 154-161.	6.1	76
90	Heme-Binding Properties of HupD Functioning as a Substrate-Binding Protein in a Heme-Uptake ABC-Transporter System in <i>Listeria monocytogenes</i> . Bulletin of the Chemical Society of Japan, 2014, 87, 1140-1146.	3.2	2

#	Article	IF	Citations
91	Photochemical Property of a Myoglobin–CdTe Quantum Dot Conjugate Formed by Supramolecular Host–Guest Interactions. Chemistry Letters, 2014, 43, 1152-1154.	1.3	7
92	Incorporation of Modified and Artificial Cofactors into Naturally Occurring Protein Scaffolds. Methods in Molecular Biology, 2014, 1216, 251-263.	0.9	2
93	Photoinduced Electron Transfer of ZnS–AgInS2 Solid-Solution Semiconductor Nanoparticles: Emission Quenching and Photocatalytic Reactions Controlled by Electrostatic Forces. Journal of Physical Chemistry C, 2013, 117, 15667-15676.	3.1	18
94	Crystal Structure, Exogenous Ligand Binding, and Redox Properties of an Engineered Diiron Active Site in a Bacterial Hemerythrin. Inorganic Chemistry, 2013, 52, 13014-13020.	4.0	10
95	C(sp ³)â€"H Bond Hydroxylation Catalyzed by Myoglobin Reconstituted with Manganese Porphycene. Journal of the American Chemical Society, 2013, 135, 17282-17285.	13.7	140
96	Cathodic photocurrent generation from zinc-substituted cytochrome b562 assemblies immobilized on an apocytochrome b562-modified gold electrode. Dalton Transactions, 2013, 42, 16102.	3.3	12
97	Supramolecular Linear Assemblies of Cytochrome b 562 Immobilized on a Gold Electrode. Journal of Inorganic and Organometallic Polymers and Materials, 2013, 23, 172-179.	3.7	9
98	(Invited) Supramolecular Porphyrin Arrays Mediated by Hemoprotein Matrix. ECS Meeting Abstracts, 2013, , .	0.0	0
99	Complimenting a Metal Complex with Protein Environment toward a New Hybrid Biocatalyst. Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 2013, 71, 452-460.	0.1	0
100	Reaction of cobalt porphycene with hydride reagents: spectroscopic detection of Co–H porphycene species and formation of Co–SnR₃ porphycene species. Journal of Porphyrins and Phthalocyanines, 2012, 16, 616-625.	0.8	4
101	Photochemical properties of a myoglobin–CdTe quantum dot conjugate. Chemical Communications, 2012, 48, 8054.	4.1	13
102	Reaction Pathway and Free Energy Profile for Conversion of π-Conjugation Modes in Porphyrin Isomer. Journal of Organic Chemistry, 2012, 77, 8946-8955.	3.2	2
103	A rhodium complex-linked \hat{i}^2 -barrel protein as a hybrid biocatalyst for phenylacetylene polymerization. Chemical Communications, 2012, 48, 9756.	4.1	78
104	Creation of an artificial metalloprotein with a Hoveyda–Grubbs catalyst moiety through the intrinsic inhibition mechanism of α-chymotrypsin. Chemical Communications, 2012, 48, 1662.	4.1	75
105	Fibrous Supramolecular Hemoprotein Assemblies Connected with Synthetic Heme Dimer and Apohemoprotein Dimer. Chemistry and Biodiversity, 2012, 9, 1684-1692.	2.1	11
106	Supramolecular assembling systems formed by heme–heme pocket interactions in hemoproteins. Chemical Communications, 2012, 48, 11714.	4.1	68
107	Photocurrent Generation from Hierarchical Zincâ€Substituted Hemoprotein Assemblies Immobilized on a Gold Electrode. Angewandte Chemie - International Edition, 2012, 51, 2628-2631.	13.8	45
108	Chemically Programmed Supramolecular Assembly of Hemoprotein and Streptavidin with Alternating Alignment. Angewandte Chemie - International Edition, 2012, 51, 3818-3821.	13.8	72

7

#	Article	IF	Citations
109	Photocatalytic hydrogen evolution by a diiron hydrogenase model based on a peptide fragment of cytochrome c556 with an attached diiron carbonyl cluster and an attached ruthenium photosensitizer. Journal of Inorganic Biochemistry, 2012, 108, 159-162.	3.5	63
110	A hydrogenase model system based on the sequence of cytochrome c: photochemical hydrogen evolution in aqueous media. Chemical Communications, 2011, 47, 8229.	4.1	121
111	A chemically-controlled supramolecular protein polymer formed by a myoglobin-based self-assembly system. Chemical Science, 2011, 2, 1033.	7.4	52
112	Crystal Structure and Spectroscopic Studies of a Stable Mixed-Valent State of the Hemerythrin-like Domain of a Bacterial Chemotaxis Protein. Inorganic Chemistry, 2011, 50, 4892-4899.	4.0	20
113	Thermal Isomerization of N-Bridged Cobalt Corrole Complexes through a Transiently Formed Axial Carbenoid. Organometallics, 2011, 30, 1869-1873.	2.3	18
114	Precise Design of Artificial Cofactors for Enhancing Peroxidase Activity of Myoglobin: Myoglobin Mutant H64D Reconstituted with a "Singleâ€Winged Cofactor―Is Equivalent to Native Horseradish Peroxidase in Oxidation Activity. Chemistry - an Asian Journal, 2011, 6, 2491-2499.	3.3	48
115	Investigation of Aromaticity and Photophysical Properties in [18]/[20]Ï€ Porphycene Derivatives. Chemistry - A European Journal, 2011, 17, 7882-7889.	3.3	23
116	Preparation and reactivity of a tetranuclear Fe(II) core in the metallothionein \hat{l}_{\pm} -domain. Journal of Inorganic Biochemistry, 2011, 105, 702-708.	3.5	9
117	DNA-Binding Hemoproteins Tethering Polyamine Interface. Bulletin of the Chemical Society of Japan, 2010, 83, 375-377.	3.2	3
118	1SE0920 Molecular Mechanism of Water Expelling System in the Initial Step of Cytochrome P450cam Catalytic Cycle(1SE Recent Advances in Structural Analyses of Funcitonal Mechanisms Based on) Tj ETQq0 0 0 rg Seibutsu Butsuri, 2010, 50, S3.	BT/Overlo	ock 10 Tf 50
119	3P113 Substrate binding excludes water cluster from active site of cytochrome P450cam - mutation analysis of water expelling system(Heme proteins,The 48th Annual Meeting of the Biophysical Society) Tj ETQq1	1 0.7 8431	14 o gBT/Ove
120	Supramolecular protein–protein complexation via specific interaction between glycosylated myoglobin and sugar-binding protein. Supramolecular Chemistry, 2010, 22, 57-64.	1.2	3
121	Supramolecular hemoprotein–gold nanoparticle conjugates. Chemical Communications, 2010, 46, 9107.	4.1	28
122	Electron transfer and oxidase activities in reconstituted hemoproteins with chemically modified cofactors. Journal of Porphyrins and Phthalocyanines, 2009, 13, 1082-1089.	0.8	9
123	Selfâ€Assembly of One―and Twoâ€Dimensional Hemoprotein Systems by Polymerization through Heme–Heme Pocket Interactions. Angewandte Chemie - International Edition, 2009, 48, 1271-1274.	13.8	66
124	Thermodynamically controlled supramolecular polymerization of cytochrome <i>b</i> 562. Biopolymers, 2009, 91, 194-200.	2.4	26
125	Substrate binding induces structural changes in cytochrome P450cam. Acta Crystallographica Section F: Structural Biology Communications, 2009, 65, 80-83.	0.7	11
126	Meso-Unsubstituted Iron Corrole in Hemoproteins: Remarkable Differences in Effects on Peroxidase Activities between Myoglobin and Horseradish Peroxidase. Journal of the American Chemical Society, 2009, 131, 15124-15125.	13.7	69

#	Article	IF	CITATIONS
127	A Role of the Heme-7-Propionate Side Chain in Cytochrome P450cam as a Gate for Regulating the Access of Water Molecules to the Substrate-Binding Site. Journal of the American Chemical Society, 2009, 131, 1398-1400.	13.7	44
128	3P-076 Mechanism of the water exclusion from the active site of cytochrome P450cam(Heme) Tj ETQq0 0 0 rgBT S163-S164.	/Overlock 0.1	10 Tf 50 70 0
129	3P-075 Substrate d-camphor binding induces structural change of cytochrome P450cam(Heme) Tj ETQq1 1 0.784	314 rgBT 0.1	 Overlock
130	Effect of peripheral trifluoromethyl groups in artificial iron porphycene cofactor on ligand binding properties of myoglobin. Journal of Inorganic Biochemistry, 2008, 102, 166-173.	3.5	23
131	Evaluation of the Functional Role of the Heme-6-propionate Side Chain in Cytochrome P450cam. Journal of the American Chemical Society, 2008, 130, 432-433.	13.7	20
132	Photocatalytic hydrogen generation using a protein-coated photosensitizer with anionic patches and a monocationic electron mediator. Chemical Communications, 2008, , 3684.	4.1	27
133	A Supramolecular Receptor of Diatomic Molecules (O ₂ , CO, NO) in Aqueous Solution. Journal of the American Chemical Society, 2008, 130, 8006-8015.	13.7	45
134	Isolable Iron(II)–Porphycene Derivative Stabilized by Introduction of Trifluoromethyl Groups on the Ligand Framework. Bulletin of the Chemical Society of Japan, 2008, 81, 76-83.	3.2	9
135	1P-121 Roles of Asp297 in the vicinity of the active site of cytochrome P450cam in substrate binding(The) Tj ETQo	16.1 0.784	 314 rgBT 0
136	Structure and Ligand Binding Properties of Myoglobins Reconstituted with Monodepropionated Heme:  Functional Role of Each Heme Propionate Side Chain,. Biochemistry, 2007, 46, 9406-9416.	2.5	42
137	Porphyrinoid Chemistry in Hemoprotein Matrix:  Detection and Reactivities of Iron(IV)-Oxo Species of Porphycene Incorporated into Horseradish Peroxidase. Journal of the American Chemical Society, 2007, 129, 12906-12907.	13.7	66
138	Supramolecular Hemoprotein Linear Assembly by Successive Interprotein Hemeâ ^{**} Heme Pocket Interactions. Journal of the American Chemical Society, 2007, 129, 10326-10327.	13.7	115
139	A Structural Isomer of Nonaromatic Porphyrin:  Preparation of 20π-Conjugated Porphycene Based on Electronic Perturbation. Organic Letters, 2007, 9, 5303-5306.	4.6	27
140	Exo-selective formation of bicyclic oxetanes in the photocycloaddition reaction of carbonyl compounds with vinylene carbonate: the important role of intermediary triplet diradicals in the stereoselectivity. Arkivoc, 2007, 2007, 58-65.	0.5	4
141	Construction of glycosylated myoglobin by reconstitutional method. Chemical Communications, 2006, , 3131.	4.1	12
142	Crystal Structure and Peroxidase Activity of Myoglobin Reconstituted with Iron Porphycene. Inorganic Chemistry, 2006, 45, 10530-10536.	4.0	89
143	A Matrix Isolation Study of 2-Isopropylidenecyclopentane-1,3-diyl (Berson-Type Diradical). Journal of Organic Chemistry, 2006, 71, 6607-6610.	3.2	11
144	Iron Porphyrinâ´'Cyclodextrin Supramolecular Complex as a Functional Model of Myoglobin in Aqueous Solution. Inorganic Chemistry, 2006, 45, 4448-4460.	4.0	84

#	Article	IF	CITATIONS
145	Experimental Probe for Hyperconjugative Resonance Contribution in Stabilizing the Singlet State of 2,2-Dialkoxy-1,3-diyls:Â Regioselective 1,2-Oxygen Migration. Journal of the American Chemical Society, 2006, 128, 8008-8014.	13.7	34
146	Time-resolved Raman evidence for energy †funneling' through propionate side chains in heme †cooling†upon photolysis of carbonmonoxy myoglobin. Chemical Physics Letters, 2006, 429, 239-243.	гм 2.6	34
147	Ligand binding properties of two kinds of reconstituted myoglobins with iron porphycene having propionates: Effect of \hat{l}^2 -pyrrolic position of two propionate side chains in porphycene framework. Journal of Inorganic Biochemistry, 2006, 100, 1265-1271.	3.5	28
148	Organic/inorganic hybrid nanomaterials with vitamin B12functions. Science and Technology of Advanced Materials, 2006, 7, 655-661.	6.1	11
149	Notable temperature effect on the stereoselectivity in the photochemical [2+2] cycloaddition reaction (Paternòâ \in "Býchi reaction) of 2,3-dihydrofuran-3-ol derivatives with benzophenone. Tetrahedron Letters, 2006, 47, 2527-2530.	1.4	23
150	An Extremely Long-Lived Singlet 4,4-Dimethoxy-3,5-diphenylpyrazolidine-3,5-diyl Derivative: A Notable Nitrogen-Atom Effect on Intra- and Intermolecular Reactivity. Angewandte Chemie - International Edition, 2006, 45, 7828-7831.	13.8	44
151	Pathway of Information Transmission from Heme to Protein upon Ligand Binding/Dissociation in Myoglobin Revealed by UV Resonance Raman Spectroscopy. Journal of Biological Chemistry, 2006, 281, 24637-24646.	3.4	17
152	Unusual Ligand Discrimination by a Myoglobin Reconstituted with a Hydrophobic Domain-Linked Heme. Journal of the American Chemical Society, 2005, 127, 56-57.	13.7	39
153	Functionalization of Myoglobin. Progress in Inorganic Chemistry, 2005, , 449-493.	3.0	12
154	Preparation and O2Binding Study of Myoglobin Having a Cobalt Porphycene. Inorganic Chemistry, 2005, 44, 9391-9396.	4.0	40
155	Residues in the Distal Heme Pocket of Neuroglobin. Journal of Biological Chemistry, 2004, 279, 5886-5893.	3.4	55
156	Enhancement of enzymatic activity for myoglobins by modification of heme-propionate side chains. Journal of Porphyrins and Phthalocyanines, 2004, 08, 255-264.	0.8	7
157	Hybridization of Modified-Heme Reconstitution and Distal Histidine Mutation to Functionalize Sperm Whale Myoglobin. Journal of the American Chemical Society, 2004, 126, 436-437.	13.7	79
158	Ligand Binding Properties of Myoglobin Reconstituted with Iron Porphycene:Â Unusual O2Binding Selectivity against CO Binding1. Journal of the American Chemical Society, 2004, 126, 16007-16017.	13.7	94
159	Chemical Properties of Sperm Whale Myoglobins Reconstituted with Monopropionate Hemins. Chemistry Letters, 2004, 33, 1512-1513.	1.3	10
160	Iron Twin-Coronet Porphyrins as Models of Myoglobin and Hemoglobin: Amphibious Electrostatic Effects of Overhanging Hydroxyl Groups for Successful CO/O2 Discrimination. Chemistry - A European Journal, 2003, 9, 862-870.	3.3	43
161	Role of heme-propionate side chains in myoglobin function. Journal of Inorganic Biochemistry, 2003, 96, 50.	3.5	2
162	Synthesis, Structure, and Chemical Property of the First Fluorine-Containing Porphycene. Organic Letters, 2003, 5, 2845-2848.	4.6	53

#	Article	IF	Citations
163	Synthesis, Characterization, and Autoreduction of a Highly Electron-Deficient Porphycenatoiron(III) with Trifluoromethyl Substituents. Inorganic Chemistry, 2003, 42, 7345-7347.	4.0	28
164	Enhancement of Peroxygenase Activity of Horse Heart Myoglobin by Modification of Heme-propionate Side Chains. Chemistry Letters, 2003, 32, 496-497.	1.3	16
165	Laser Heating Dynamics of Poly(methyl methacrylate) Films Doped with Aromatic Molecules as Revealed by Analysis of Diffusion of Triplet States. Bulletin of the Chemical Society of Japan, 2003, 76, 1075-1085.	3.2	5
166	Reductive Activation of Dioxygen by a Myoglobin Reconstituted with a Flavohemin. Journal of the American Chemical Society, 2002, 124, 11234-11235.	13.7	47
167	Blue Myoglobin Reconstituted with an Iron Porphycene Shows Extremely High Oxygen Affinity. Journal of the American Chemical Society, 2002, 124, 11226-11227.	13.7	128
168	New Functionalization of Myoglobin by Chemical Modification of Heme-Propionates. Accounts of Chemical Research, 2002, 35, 35-43.	15.6	200
169	Chiral recognition and chiral sensing using zinc porphyrin dimers. Tetrahedron, 2002, 58, 2803-2811.	1.9	64
170	Contribution of heme-propionate side chains to structure and function of myoglobin: chemical approach by artificially created prosthetic groups. Journal of Inorganic Biochemistry, 2002, 91, 94-100.	3.5	30
171	Conversion of Hemoprotein Function by Chemical Modification Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 2002, 60, 573-580.	0.1	2
172	Cobaltporphycenes as Catalysts. The Oxidation of Vinyl Ethers via the Formation and Dissociation of Cobaltâ°'Carbon Bonds. Organometallics, 2001, 20, 3074-3078.	2.3	69
173	Formation and Cleavage of a Dicobalt Complex Bridged with a Pentamethylene Group. Chemistry Letters, 2001, 30, 346-347.	1.3	1
174	Interprotein Electron Transfer Reaction Regulated by an Artificial Interface. Angewandte Chemie - International Edition, 2001, 40, 1098-1101.	13.8	31
175	Electroorganic syntheses of macrocyclic lactones mediated by vitamin B12 model complexes. Journal of Electroanalytical Chemistry, 2001, 507, 170-176.	3.8	28
176	Synthesis and Properties of Alkylperoxocobalt(III) Porphyrin and Porphycene. Chemistry Letters, 2000, 29, 90-91.	1.3	6
177	Electrochemical reactions mediated by vitamin B12 derivatives in organic solvents. Coordination Chemistry Reviews, 2000, 198, 21-37.	18.8	71
178	Introduction of a specific binding domain on myoglobin surface by new chemical modification. Journal of Inorganic Biochemistry, 2000, 82, 133-139.	3.5	24
179	New approach to the construction of an artificial hemoprotein complex. Coordination Chemistry Reviews, 1999, 190-192, 961-974.	18.8	20
180	Synthesis and structure of tetraols with convergent and divergent arrays of hydroxy groups. Journal of the Chemical Society Perkin Transactions 1, 1999, , 1885-1892.	0.9	4

#	Article	IF	Citations
181	Peroxidase Activity of Myoglobin Is Enhanced by Chemical Mutation of Heme-Propionates. Journal of the American Chemical Society, 1999, 121, 7747-7750.	13.7	103
182	Structure and reactivity of reconstituted myoglobins: interaction between protein and polar side chain of chemically modified hemin. Inorganica Chimica Acta, 1998, 275-276, 159-167.	2.4	9
183	Kinetic and Thermodynamic Analysis of Induced-Fit Molecular Recognition between Tetraarylporphyrin and Ubiquinone Analogues. Chemistry - A European Journal, 1998, 4, 1266-1274.	3.3	18
184	Artificial Proteinâ^Protein Complexation between a Reconstituted Myoglobin and Cytochromec. Journal of the American Chemical Society, 1998, 120, 4910-4915.	13.7	61
185	Interfacial Recognition between Reconstituted Myoglobin Having Charged Binding Domain and Electron Acceptor via Electrostatic Interaction. Chemistry Letters, 1998, 27, 1229-1230.	1.3	10
186	Molecular Recognition by Novel Macrotetracyclic Cyclophanes Having Dipeptide Segments. Chemistry Letters, 1998, 27, 1109-1110.	1.3	1
187	Molecular Modeling of Biological Electron Transfer via Molecular Recognition. Synthetic Receptor for Ubiquinone and Cytochrome c Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 1998, 56, 745-754.	0.1	2
188	Molecular modelling of electron transfer systems by noncovalently linked porphyrin–acceptor pairing. Chemical Society Reviews, 1997, 26, 355-364.	38.1	186
189	Solvent effects on thermodynamic parameters for porphyrin–quinone interaction through multiple hydrogen bonding. Chemical Communications, 1997, , 1865.	4.1	9
190	Molecular Recognition of Ubiquinone Analogues. Specific Interaction between Quinone and Functional Porphyrin via Multiple Hydrogen Bonds. Journal of the American Chemical Society, 1997, 119, 7281-7290.	13.7	61
191	Molecular recognition of $\hat{l}\pm, \hat{l}$ %-diamines by metalloporphyrin dimer. Tetrahedron Letters, 1997, 38, 1603-1606.	1.4	58
192	Conformational Analysis of \hat{l}^2 -Turn Structure in Tetrapeptides Containing Proline or Proline Analogs. Tetrahedron Letters, 1997, 38, 3039-3042.	1.4	27
193	Synthesis of Ring-Fluorinated Porphyrins and Reconstitutional Myoglobins with Their Iron Complexes. Bulletin of the Chemical Society of Japan, 1996, 69, 2923-2933.	3.2	15
194	Photoinduzierter Elektronentransfer zwischen multifunktionellen, über mehrere Hâ€Brücken verknüpften Porphyrin―und Ubichinonâ€Analoga. Angewandte Chemie, 1996, 108, 2096-2098.	2.0	5
195	Photoinduced Electron Transfer between Multifunctional Porphyrin and Ubiquinone Analogues Linked by Several Hydrogen-Bonding Interactions. Angewandte Chemie International Edition in English, 1996, 35, 1964-1966.	4.4	35
196	Anion complexation by bidentate Lewis acidic hosts, ortho-bis(fluorosilyl) benzenes. Journal of Organometallic Chemistry, 1996, 506, 85-91.	1.8	66
197	Molecular Recognition of Horse Heart Apomyoglobin to Monopropionate Hemin: Thermodynamic Determination of Two Orientational Isomers by 1H NMR Spectra. Chemistry Letters, 1995, 24, 911-912.	1.3	7
198	Photoinduced Singlet Electron Transfer in a Complex Formed from Zinc Myoglobin and Methyl Viologen: Artificial Recognition by a Chemically Modified Porphyrin. Journal of the American Chemical Society, 1995, 117, 11606-11607.	13.7	59

#	Article	IF	CITATIONS
199	Relationship between electron transfer and the structure of a quinone-linked zinc porphyrin with a flexible peptide spacer. Journal of the Chemical Society Chemical Communications, 1995, , 545.	2.0	5
200	Photoinduced electron transfer from zinc porphyrin to a linked quinone in myoglobin. Journal of the Chemical Society Chemical Communications, 1995, , 2503.	2.0	19
201	Carbene insertion into oxygenî—,hydrogen bonds by metalloporphyrin catalysts. Journal of Organometallic Chemistry, 1994, 473, 323-327.	1.8	13
202	Preparation and Binding Affinity of New Porphyrin Host Molecule for Ubiquinone Analogues. Chemistry Letters, 1994, 23, 1749-1752.	1.3	10
203	Synthesis and structure of a new cis-1,3-dihydroxycyclohexane derivative having four convergent hydroxy groups. Journal of the Chemical Society Chemical Communications, 1993, , 364.	2.0	2
204	Dynamic molecular recognition in a multifunctional porphyrin and a ubiquinone analog. Journal of the American Chemical Society, 1993, 115, 12210-12211.	13.7	55
205	Specific molecular recognition via multipoint hydrogen bonding ubiquinone analogs - porphyrin having four convergent hydroxyl groups pairing. Journal of the American Chemical Society, 1993, 115, 2049-2051.	13.7	67
206	Electronic and steric effects in pentacoordinate anionic diorganotrifluorosilicates: x-ray structures and carbon-13 NMR studies for evaluation of charge distribution in aryl groups on silicon. Organometallics, 1992, 11, 182-191.	2.3	36
207	Pentacoordinate anionic bis(siliconates) containing a fluorine bridge between two silicon atoms. Synthesis, solid-state structures, and dynamic behavior in solution. Organometallics, 1992, 11, 2099-2114.	2.3	183
208	Ortho lithiation directed by amino groups on silicon in phenylsilane derivatives. Tetrahedron Letters, 1990, 31, 2925-2928.	1.4	23
209	Novel pentacoordinate anionic silicate, [o-C6H4(SiPhF2)2F]-K+.cntdot.18-crown-6, containing a bent fluoride bridge between two silicon atoms [Erratum to document cited in CA112(15):139129y]. Journal of the American Chemical Society, 1990, 112, 5679-5679.	13.7	1
210	Novel pentacoordinate anionic silicate, [o-C6H4(SiPhF2)2F]-K+.cntdot.18-crown-6, containing a bent fluoride bridge between two silicon atoms. Journal of the American Chemical Society, 1990, 112, 2422-2424.	13.7	73
211	Special articles on new aspects of silicon chemistry. Structure and reactivity of hypercoordinate silicon compounds. Mechanism of hydrogen peroxide oxidation of silicon-carbon bonds Nippon Kagaku Kaishi / Chemical Society of Japan - Chemistry and Industrial Chemistry Journal, 1990, , 509-515.	0.1	2
212	An efficient oxidative cleavage of carbon-silicon bonds by a dioxygen/hydroquinone system. Tetrahedron Letters, 1989, 30, 6533-6536.	1.4	11
213	Electroorganic chemistry. 118. Electroreductive intermolecular coupling of ketones with olefins. Journal of Organic Chemistry, 1989, 54, 6001-6003.	3.2	37
214	Oxidative cleavage of carbon–silicon bonds by dioxygen: catalysis by a flavin–dihydronicotinamide redox system. Journal of the Chemical Society Chemical Communications, 1988, , 795-797.	2.0	10