Katsumi Matsuura

List of Publications by Year
in descending order

103 papers	3,197 citations	126907 33 h-index	168389 53 g-index
105 all docs	105 docs citations	105 times ranked	1798 citing authors

#	Article	IF	Citations
1	Roseiflexus castenholzii gen. nov., sp. nov., a thermophilic, filamentous, photosynthetic bacterium that lacks chlorosomes.. International Journal of Systematic and Evolutionary Microbiology, 2002, 52, 187-193.	1.7	340
2	Horizontal transfer of genes coding for the photosynthetic reaction centers of purple bacteria. Journal of Molecular Evolution, 1997, 45, 131-136.	1.8	142
3	Horizontal Transfer of the Photosynthesis Gene Cluster and Operon Rearrangement in Purple Bacteria. Journal of Molecular Evolution, 2001, 52, 333-341.	1.8	132
4	Quinones in chlorosomes of green sulfur bacteria and their role in the redox-dependent fluorescence studied in chlorosome-like bacteriochlorophyll c aggregates. Archives of Microbiology, 1997, 167, 343-349.	2.2	123
5	Antenna Complexes from Green Photosynthetic Bacteria. Advances in Photosynthesis and Respiration, 2003, , 195-217.	1.0	109
6	SPECTRAL FORMS AND ORIENTATION OF BACTERIOCHLOROPHYLLS c AND Î± IN CHLOROSOMES OF THE GREEN PHOTOSYNTHETIC BACTERIUM Chloroflexus aurantiacus. Photochemistry and Photobiology, 1993, 57, 92-97.	2.5	91
7	Diversification of Bacterial Community Composition along a Temperature Gradient at a Thermal Spring. Microbes and Environments, 2012, 27, 374-381.	1.6	87
8	Sulfur-metabolizing bacterial populations in microbial mats of the Nakabusa hot spring, Japan. Systematic and Applied Microbiology, 2011, 34, 293-302.	2.8	84
9	High degree of organization of bacteriochlorophyll c in chlorosome-like aggregates spontaneously assembled in aqueous solution. Biochimica Et Biophysica Acta - Bioenergetics, 1992, 1099, 271-274.	1.0	79
10	Production and Consumption of Hydrogen in Hot Spring Microbial Mats Dominated by a Filamentous Anoxygenic Photosynthetic Bacterium. Microbes and Environments, 2012, 27, 293-299.	1.6	67
11	Stabilization of a semiquinone radical at the high-affinity quinone-binding site (QH) of theEscherichia coli bo-type ubiquinol oxidase. FEBS Letters, 1995, 374, 265-269.	2.8	63
12	Isolation of Chloroflexus aurantiacus and related thermophilic phototrophic bacteria from Japanese hot springs using an improved isolation procedure.. Journal of General and Applied Microbiology, 1995, 41, 119-130.	0.7	59
13	Assignment of ESR signals of Escherichia coli terminal oxidase complexes. Biochimica Et Biophysica Acta - Bioenergetics, 1985, 810, 62-72.	1.0	58
14	Association of bacteriochlorophyll a with the CsmA protein in chlorosomes of the photosynthetic green filamentous bacterium Chloroflexus aurantiacus. Biochimica Et Biophysica Acta - Bioenergetics, 1999, 1413, 172-180.	1.0	57
15	Structural and Spectroscopic Properties of a Reaction Center Complex from the Chlorosome-Lacking Filamentous Anoxygenic Phototrophic Bacterium Roseiflexus castenholzii. Journal of Bacteriology, 2005, 187, 1702-1709.	2.2	56
16	Reversible conversion of aggregated bacteriochlorophyll c to the monomeric form by 1-hexanol in chlorosomes from Chlorobium and Chloroflexus. Biochimica Et Biophysica Acta - Bioenergetics, 1990, 1019, 233-238.	1.0	53
17	Structural and Functional Analyses of Photosynthetic Regulatory Genes regA and regB from Rhodovulum sulfidophilum , Roseobacter denitrificans , and Rhodobacter capsulatus. Journal of Bacteriology, 1999, 181, 4205-4215.	2.2	53
18	Isolation of an Mn-carrying 33-kDa protein from an oxygen-evolving photosystem-II preparation by phase partitioning with butanol. FEBS Letters, 1984, 175, 429-432.	2.8	49

#	Article	IF	Citations
19	Reaction center-B870 pigment protein complexes with bound cytochromes c-555 and c-551 from Rhodocyclus gelatinosus. Biochimica Et Biophysica Acta - Bioenergetics, 1988, 933, 399-405.	1.0	47
20	A Monocyclic Carotenoid Glucoside Ester is a Major Carotenoid in the Green Filamentous Bacterium Chloroflexus aurantiacus. Plant and Cell Physiology, 1995, 36, 773-778.	3.1	47
21	Changes in Bacteriochlorophyll c Organization during Acid Treatment of Chlorosomes from Chlorobium tepidum. Photochemistry and Photobiology, 1997, 65, 129-134.	2.5	47
22	Phytoene Desaturase, CrtI, of the Purple Photosynthetic Bacterium, Rubrivivax gelatinosus, Produces both Neurosporene and Lycopene. Plant and Cell Physiology, 2001, 42, 1112-1118.	3.1	47
23	Title is missing!. Photosynthesis Research, 1998, 58, 81-90.	2.9	41
24	A New Cytochrome Subunit Bound to the Photosynthetic Reaction Center in the Purple Bacterium, Rhodovulum sulfidophilum. Journal of Biological Chemistry, 1999, 274, 10795-10801.	3.4	41
25	Sidedness of membrane structures in Rhodopseudomonas sphaeroides. Electrochemical titration of the spectrum changes of carotenoid in spheroplasts, spheroplast membrane vesicles and chromatophores. Biochimica Et Biophysica Acta - Bioenergetics, 1977, 459, 483-491.	1.0	39
26	Cytochromes functionally associated to photochemical reaction centers in Rhodopseudomonas palustris and Rhodopseudomonas acidophila. Biochimica Et Biophysica Acta - Bioenergetics, 1986, 852, 9-18.	1.0	38
27	Phylogenetic analysis of photosynthetic genes of Rhodocyclus gelatinosus: Possibility of horizontal gene transfer in purple bacteria. Photosynthesis Research, 1993, 36, 185-191.	2.9	38
28	Phylogenetic Distribution of Unusual Triheme to Tetraheme Cytochrome Subunit in the Reaction Center Complex of Purple Photosynthetic Bacteria. Photosynthesis Research, 2004, 79, 83-91.	2.9	38
29	Interaction Site for Soluble Cytochromes on the Tetraheme Cytochrome Subunit Bound to the Bacterial Photosynthetic Reaction Center Mapped by Site-Directed Mutagenesisâ€. Biochemistry, 1998, 37, 11732-11744.	2.5	37
30	Exogenous quinones inhibit photosynthetic electron transfer in Chloroflexus aurantiacus by specific quenching of the excited bacteriochlorophyll c antenna. Biochimica Et Biophysica Acta - Bioenergetics, 1999, 1413, 108-116.	1.0	36
31	Direct and indirect electron transfer from cytochromescandc2to the photosynthetic reaction center in pigment-protein complexes isolated fromRhodocyclus gelatinosus. FEBS Letters, 1988, 237, 21-25.	2.8	34
32	Molecular organization of bacteriochlorophyll in chlorosomes of the green photosynthetic bacteriumChloroflexus aurantiacus: Studies of fluorescence depolarization accompanied by energy transfer processes. Photosynthesis Research, 1994, 41, 181-191.	2.9	34
33	Photo-oxidation of membrane-bound and soluble cytochromec in the green sulfur bacteriumChlorobium tepidum. Photosynthesis Research, 1994, 41, 125-134.	2.9	33
34	Nitrogen Fixation in Thermophilic Chemosynthetic Microbial Communities Depending on Hydrogen, Sulfate, and Carbon Dioxide. Microbes and Environments, 2018, 33, 10-18.	1.6	30
35	The recognition and redox properties of a component, possibly a quinone, which determines electron transfer rate in ubiquinone-cytochrome c oxidoreductase of mitochondria. FEBS Letters, 1981, 131, 17-22.	2.8	28
36	Membrane-Bound c-Type Cytochromes in Heliobacillus mobilis. In Vivo Study of the Hemes Involved in Electron Donation to the Photosynthetic Reaction Center. Biochemistry, 1995, 34, 11831-11839.	2.5	28

#	Article	IF	Citations
37	Absence of Carotenes and Presence of a Tertiary Methoxy Group in a Carotenoid from a Thermophilic Filamentous Photosynthetic Bacterium Roseiflexus castenholzii. Plant and Cell Physiology, 2001, 42, 1355-1362.	3.1	28
38	Oxygen uncouples light absorption by the chlorosome antenna and photosynthetic electron transfer in the green sulfur bacterium Chlorobium tepidum. Biochimica Et Biophysica Acta - Bioenergetics, 1999, 1412, 108-117.	1.0	27
39	The structure of the aggregate form of bacteriochlorophyll c showing the Qy absorption above 740 nm: a 1H-NMR study. Chemical Physics Letters, 1996, 260, 153-158.	2.6	25
40	Interaction Site for High-Potential Ironâ˜’Sulfur Protein on the Tetraheme Cytochrome Subunit Bound to the Photosynthetic Reaction Center of Rubrivivax gelatinosus. Biochemistry, 1999, 38, 2861-2865.	2.5	25
41	Phylogenetic Diversity of Nitrogenase Reductase Genes and Possible Nitrogen-Fixing Bacteria in Thermophilic Chemosynthetic Microbial Communities in Nakabusa Hot Springs. Microbes and Environments, 2018, 33, 357-365.	1.6	25
42	Shortcut of the photosynthetic electron transfer in a mutant lacking the reaction center-bound cytochrome subunit by gene disruption in a purple bacterium,Rubrivivax gelatinosus. FEBS Letters, 1996, 385, 209-213.	2.8	24
43	Dark Aerobic Growth Conditions Induce the Synthesis of a High Midpoint Potential Cytochromec8in the Photosynthetic BacteriumRubrivivax gelatinosus. Biochemistry, 1999, 38, 15238-15244.	2.5	24
44	Comparison of the Binding Sites for High-Potential Ironâ˜’Sulfur Protein and Cytochromecon the Tetraheme Cytochrome Subunit Bound to the Bacterial Photosynthetic Reaction Centerâ€. Biochemistry, 1999, 38, 15779-15790.	2.5	23
45	Structural and Functional Characterization of the Unusual Triheme Cytochrome Bound to the Reaction Center of Rhodovulum sulfidophilum. Journal of Biological Chemistry, 2004, 279, 26090-26097.	3.4	23
46	Phylogenetically Diverse Aerobic Anoxygenic Phototrophic Bacteria Isolated from Epilithic Biofilms in Tama River, Japan. Microbes and Environments, 2016, 31, 299-306.	1.6	23
47	Excitation energy transfer in the green photosynthetic bacterium Chloroflexus aurantiacus: A specific effect of 1-hexanol on the optical properties of baseplate and energy transfer processes. Photosynthesis Research, 1996, 48, 263-270.	2.9	21
48	High-Potential Ironâ˜’Sulfur Protein (HiPIP) Is the Major Electron Donor to the Reaction Center Complex in Photosynthetically Growing Cells of the Purple Bacterium Rubrivivax gelatinosus. Biochemistry, 2002, 41, 14028-14032.	2.5	21
49	Nitrogenase Activity in Thermophilic Chemolithoautotrophic Bacteria in the Phylum <i>Aquificae</i> Isolated under Nitrogen-Fixing Conditions from Nakabusa Hot Springs. Microbes and Environments, 2018, 33, 394-401.	1.6	21
50	Evolutionary Relationships between Reaction Center Complexes with and without Cytochrome c Subunits in Purple Bacteria. , 1990, , 193-196.		21
51	Involvement of cytochromebc1complex and cytochromec2in the electron-transfer pathway for NO reduction in a photodenitrifier,Rhodobacter sphaeroidesf.s.denitrificans. FEBS Letters, 1989, 244, 81-84.	2.8	20
52	Effects of Surface Potential on the Equilibrium and Kinetics of Redox Reactions of Membrane Components with External Reagents in Chromatophores from Rhodopseudomonas sphaeroides1. Journal of Biochemistry, 1980, 87, 1431-1437.	1.7	19
53	Involvement of cytochromebc1complex in the electron transfer pathway for N2O reduction in a photodenitrifier,Rhodobacter sphaeroidesf. s.denitrificans. FEBS Letters, 1989, 251, 104-108.	2.8	19
54	Comparative and evolutionary aspects of the photosynthetic electron transfer system of purple bacteria. Journal of Plant Research, 1994, 107, 191-200.	2.4	18

#	Article	IF	Citations
55	Transcriptional Control of Expression of Genes for Photosynthetic Reaction Center and Light-Harvesting Proteins in the Purple Bacterium Rhodovulum sulfidophilum. Journal of Bacteriology, 2000, 182, 2778-2786.	2.2	17
56	Electron transfer from high-potential iron-sulfur protein and low-potential cytochrome c-551 to the primary donor of Rubrivivax gelatinosus reaction center mutationally devoid of the bound cytochrome subunit. Biochimica Et Biophysica Acta - Bioenergetics, 1997, 1321, 93-99.	1.0	15
57	Genes encoding light-harvesting and reaction center proteins from Chromatium vinosum. Photosynthesis Research, 1999, 59, 39-52.	2.9	15
58	Chimeric Photosynthetic Reaction Center Complex of Purple Bacteria Composed of the Core Subunits of Rubrivivax gelatinosus and the Cytochrome Subunit of Blastochloris viridis. Journal of Biological Chemistry, 2003, 278, 3921-3928.	3.4	15
59	Quenching of Bacteriochlorophyll Fluorescence in Chlorosomes from Chloroflexus aurantiacus by Exogenous QuinonesÂ¶. Photochemistry and Photobiology, 2000, 72, 345.	2.5	15
60	Membrane-potential- and surface-potential-induced absorbance changes of merocyanine dyes added to chromatophores from Rhodopseudomonas sphaeroides. Biochimica Et Biophysica Acta - Bioenergetics, 1981, 638, 108-115.	1.0	14
61	Surface Potential Dependence of the Distribution of Charged Dye Molecules onto Photosynthetic Membranes. Journal of Biochemistry, 1981, 89, 397-405.	1.7	14
62	[27] Construction of the photosynthetic reaction centerâ€"mitochondrial ubiquinolâ€"cytochrome-c oxidoreductase hybrid system. Methods in Enzymology, 1986, , 293-305.	1.0	14
63	Photo-oxidation of reaction center-bound cytochrome c and generation of membrane potential determined by carotenoid band shift in the purple photosynthetic bacterium, Rhodospirillum molischianum. Biochimica Et Biophysica Acta - Bioenergetics, 1993, 1140, 297-303.	1.0	14
64	The nucleotide sequence of the puf operon from the purple photosynthetic bacterium, Rhodospirillum molischianum: Comparative analyses of light-harvesting proteins and the cytochrome subunits associated with the reaction centers. Photosynthesis Research, 1996, 50, 61-70.	2.9	14
65	Characterization of a blue-copper protein, auracyanin, of the filamentous anoxygenic phototrophic bacterium Roseiflexus castenholzii. Archives of Biochemistry and Biophysics, 2009, 490, 57-62.	3.0	14
66	Mutational Analyses of the Photosynthetic Reaction Center-Bound Triheme Cytochrome Subunit and Cytochrome c2 in the Purple Bacterium Rhodovulum sulfidophilum. Biochemistry, 2002, 41, 11211-11217.	2.5	13
67	Active and energy-dependent rapid formation of cell aggregates in the thermophilic photosynthetic bacteriumChloroflexus aggregans. FEMS Microbiology Letters, 2002, 208, 275-279.	1.8	13
68	Cytochrome <i>c</i>₄ Can Be Involved in the Photosynthetic Electron Transfer System in the Purple Bacterium <i>Rubrivivax gelatinosus</i>. Biochemistry, 2009, 48, 9132-9139.	2.5	13
69	Electrochromic spectral band shift of carotenoids in the photosynthetic membranes of Rhodospirillum molischianum and Rhodospirillum photometricum. Biochimica Et Biophysica Acta - Bioenergetics, 1993, 1140, 293-296.	1.0	12
70	Title is missing!. Photosynthesis Research, 1998, 55, 349-355.	2.9	12
71	Energy migration in allophycocyanin-B trimer with a linker polypeptide: Analysis by the principal multi-component spectral estimation (PMSE) method. FEBS Letters, 1994, 353, 43-47.	2.8	11
72	Diversity of Purple Phototrophic Bacteria, Inferred from <i>pufM</i> Gene, within Epilithic Biofilm in Tama River, Japan. Microbes and Environments, 2012, 27, 327-329.	1.6	11

#	Article	IF	Citations
73	Gliding motility driven by individual cell-surface movements in a multicellular filamentous bacterium<i>Chloroflexus aggregans</i>. FEMS Microbiology Letters, 2016, 363, fnw056.	1.8	11
74	In vitro and in vivo electron transfer to the triheme cytochrome subunit bound to the photosynthetic reaction center complex in the purple bacterium Rhodovulum sulfidophilum. Biochimica Et Biophysica Acta - Bioenergetics, 2001, 1506, 23-30.	1.0	10
75	Transcription of three sets of genes coding for the core light-harvesting proteins in the purple sulfur bacterium, Allochromatium vinosum. Photosynthesis Research, 2002, 74, 269-280.	2.9	10
76	Different Mechanisms of the Binding of Soluble Electron Donors to the Photosynthetic Reaction Center ofRubrivivax gelatinosus and Blastochloris viridis. Journal of Biological Chemistry, 2001, 276, 24108-24112.	3.4	9
77	Differences in Survivability under Starvation Conditions Among Four Species of Purple Nonsulfur Phototrophic Bacteria. Microbes and Environments, 2014, 29, 326-328.	1.6	9
78	Symbiotic Growth of a Thermophilic Sulfide-Oxidizing Photoautotroph and an Elemental Sulfur-Disproportionating Chemolithoautotroph and Cooperative Dissimilatory Oxidation of Sulfide to Sulfate. Frontiers in Microbiology, 2019, 10, 1150.	3.5	9
79	Phylogenetic Analysis of Photosynthetic Reaction Centers of Purple Bacteria and Green Filamentous Bacteria. , 1995, , 975-978.		8
80	Heterogeneous Pools of Cytochrome c2 in Photo-Denitrifying Cells of Rhodobacter sphaeroides forma sp. denitrificans. Journal of Biochemistry, 1988, 104, 1016-1020.	1.7	7
81	A New Membrane-bound Cytochrome c Works as an Electron Donor to the Photosynthetic Reaction Center Complex in the Purple Bacterium, Rhodovulum sulfidophilum. Journal of Biological Chemistry, 2007, 282, 6463-6472.	3.4	7
82	Secreted protease mediates interspecies interaction and promotes cell aggregation of the photosynthetic bacterium Chloroflexus aggregans. FEMS Microbiology Letters, 2015, 362, 1-5.	1.8	7
83	Comparison between Electron Transfers through Plastocyanin in Spinach Chloroplasts and Cytocbrome C2 in Rhodopseudomonas sphaeroides. Plant and Cell Physiology, 1985, 26, 1057-1065.	3.1	6
84	Changes in the content of pigment-protein complexes in Rhodobacter sphaeroides forma sp. denitrificans grown under photosynthetic and photo-denitrifying conditions. Biochimica Et Biophysica Acta - Bioenergetics, 1988, 936, 332-338.	1.0	6
85	The Photo-Oxidation of Low-Potential Hemes in the Tetraheme Cytochrome Subunit of the Reaction Center in Whole Cells of Blastochloris viridis. Plant and Cell Physiology, 1999, 40, 192-197.	3.1	6
86	Pheophytinization of bacteriochlorophyll c and energy transfer in cells of Chlorobium tepidum. Archives of Microbiology, 1999, 172, 40-44.	2.2	6
87	Evidence that Altered Cis Element Spacing Affects PpsR Mediated Redox Control of Photosynthesis Gene Expression in Rubrivivax gelatinosus. PLoS ONE, 2015, 10, e0128446.	2.5	6
88	Increase of Salt Tolerance in Carbon-Starved Cells of Rhodopseudomonas palustris Depending on Photosynthesis or Respiration. Microorganisms, 2018, 6, 4.	3.6	6
89	Different Metabolomic Responses to Carbon Starvation between Light and Dark Conditions in the Purple Photosynthetic Bacterium, <i>Rhodopseudomonas palustris</i>. Microbes and Environments, 2018, 33, 83-88.	1.6	6
90	Diffusion-Potential-Induced Oxidation and Reduction of Cytochromes in Chromatophores from Rhodopseudomonas sphaeroides. Journal of Biochemistry, 1978, 84, 539-546.	1.7	3

#	Article	IF	Citations
91	Electrical potential changes in the surface and the central region of chromatophore membranes of photosynthetic bacteria detected by the absorbance changes of ethidium and carotenoid. Biochimica Et Biophysica Acta - Bioenergetics, 1986, 849, 141-149.	1.0	2
92	Quenching of Energy Transfer in Chlorosomes from Chloroflexus by the Addition of Synthetic Quinones. , 1998, , 157-160.		2
93	Microbes in Hydrothermal Environments. Photosynthetic Bacteria in High Temperature Environment and the Evolution of Photosynthesis.. Microbes and Environments, 1998, 13, 269-275.	1.6	1
94	Quenching of Bacteriochlorophyll Fluorescence in Chlorosomes from Chloroflexus aurantiacus by Exogenous Quinones Â¶. Photochemistry and Photobiology, 2000, 72, 345-350.	2.5	1
95	Spectroscopic Studies on Self-aggregation of Bacteriochlorophyll-e in Nonpolar Organic Solvents: Effects of Stereoisomeric Configuration at the 31-Position and Alkyl Substituents at the 81-PositionÂ¶. Photochemistry and Photobiology, 2007, 74, 72-80.	2.5	1
96	Professor Ken-ichiro Takamiya (1943â€"2005): gentleman and a scientist, a superb experimentalist and a visionary. Photosynthesis Research, 2008, 97, 115-119.	2.9	1
97	A novel and mild isolation procedure of chlorosomes from the green sulfur bacterium Chlorobaculum tepidum. Photosynthesis Research, 2011, 108, 183-190.	2.9	1
98	The Natural Defection of Two Hemes in the Tetraheme Cytochrome Subunit Bound to the Photosynthetic Reaction Center Complex in Purple Bacterium Rhodovulum Sulfidophilum. , 1998, , 897-900.		1
99	ESTIMATION OF THE SURFACE POTENTIAL IN PHOTOSYNTHETIC MEMBRANES. , 1979, , 229-242.		1
100	Effects of Inactivation of Genes Coding for the Reaction Center-Bound Cytochrome Subunit on Growth and Electron Transfer in Purple Photosynthetic Bacterium, Rubrivivax Gelatinosus. , 1995, , 1577-1580.		1
101	Characterization of Photosynthetic Regulatory Genes, regA and regB: Studies among Different Species. , 1998, , 2881-2884.		1
102	Aquisition, Diversification, and Loss of Photosynthesis and Speciation of Bacteria.. Microbes and Environments, 1999, 14, 37-40.	1.6	0
103	Genes Encoding Light-Harvesting, Reaction Center, and Cytochrome Biogenesis Proteins in Chromatium Vinosum. , 1999, , 165-168.		0