

# Cheryl A Kerfeld

## List of Publications by Citations

**Source:** <https://exaly.com/author-pdf/7170482/cheryl-a-kerfeld-publications-by-citations.pdf>

**Version:** 2024-04-23

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

144  
papers

10,473  
citations

55  
h-index

100  
g-index

154  
ext. papers

12,939  
ext. citations

9  
avg, IF

6.54  
L-index

#	Paper	IF	Citations
144	Frontiers, opportunities, and challenges in biochemical and chemical catalysis of CO <sub>2</sub> fixation. <i>Chemical Reviews</i> , <b>2013</b> , 113, 6621-58	68.1	1415
143	Improving the coverage of the cyanobacterial phylum using diversity-driven genome sequencing. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2013</b> , 110, 1053-8	11.5	566
142	Protein structures forming the shell of primitive bacterial organelles. <i>Science</i> , <b>2005</b> , 309, 936-8	33.3	354
141	A soluble carotenoid protein involved in phycobilisome-related energy dissipation in cyanobacteria. <i>Plant Cell</i> , <b>2006</b> , 18, 992-1007	11.6	342
140	Protein-based organelles in bacteria: carboxysomes and related microcompartments. <i>Nature Reviews Microbiology</i> , <b>2008</b> , 6, 681-91	22.2	338
139	Atomic-level models of the bacterial carboxysome shell. <i>Science</i> , <b>2008</b> , 319, 1083-6	33.3	310
138	Bacterial microcompartments. <i>Annual Review of Microbiology</i> , <b>2010</b> , 64, 391-408	17.5	255
137	A photoactive carotenoid protein acting as light intensity sensor. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2008</b> , 105, 12075-80	11.5	255
136	Biogenesis of a bacterial organelle: the carboxysome assembly pathway. <i>Cell</i> , <b>2013</b> , 155, 1131-40	56.2	192
135	The crystal structure of a cyanobacterial water-soluble carotenoid binding protein. <i>Structure</i> , <b>2003</b> , 11, 55-65	5.2	191
134	Bacterial microcompartments. <i>Nature Reviews Microbiology</i> , <b>2018</b> , 16, 277-290	22.2	188
133	A taxonomy of bacterial microcompartment loci constructed by a novel scoring method. <i>PLoS Computational Biology</i> , <b>2014</b> , 10, e1003898	5	170
132	Identification and structural analysis of a novel carboxysome shell protein with implications for metabolite transport. <i>Journal of Molecular Biology</i> , <b>2009</b> , 392, 319-33	6.5	161
131	Dynamic cyanobacterial response to hydration and dehydration in a desert biological soil crust. <i>ISME Journal</i> , <b>2013</b> , 7, 2178-91	11.9	156
130	The orange carotenoid protein in photoprotection of photosystem II in cyanobacteria. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , <b>2012</b> , 1817, 158-66	4.6	140
129	Assembly, function and evolution of cyanobacterial carboxysomes. <i>Current Opinion in Plant Biology</i> , <b>2016</b> , 31, 66-75	9.9	136
128	The structure of beta-carbonic anhydrase from the carboxysomal shell reveals a distinct subclass with one active site for the price of two. <i>Journal of Biological Chemistry</i> , <b>2006</b> , 281, 7546-55	5.4	133

127	PHOTOSYNTHESIS. A 12 $\beta$ -carotenoid translocation in a photoswitch associated with cyanobacterial photoprotection. <i>Science</i> , <b>2015</b> , 348, 1463-6	33.3	131
126	Bacterial microcompartments and the modular construction of microbial metabolism. <i>Trends in Microbiology</i> , <b>2015</b> , 23, 22-34	12.4	124
125	Assembly principles and structure of a 6.5-MDa bacterial microcompartment shell. <i>Science</i> , <b>2017</b> , 356, 1293-1297	33.3	121
124	The Orange Carotenoid Protein: a blue-green light photoactive protein. <i>Photochemical and Photobiological Sciences</i> , <b>2013</b> , 12, 1135-43	4.2	120
123	A genomic catalog of Earth's microbiomes. <i>Nature Biotechnology</i> , <b>2021</b> , 39, 499-509	44.5	120
122	Elucidating essential role of conserved carboxysomal protein CcmN reveals common feature of bacterial microcompartment assembly. <i>Journal of Biological Chemistry</i> , <b>2012</b> , 287, 17729-17736	5.4	119
121	Light-induced energy dissipation in iron-starved cyanobacteria: roles of OCP and IsiA proteins. <i>Plant Cell</i> , <b>2007</b> , 19, 656-72	11.6	119
120	Structural analysis of CsoS1A and the protein shell of the Halothiobacillus neapolitanus carboxysome. <i>PLoS Biology</i> , <b>2007</b> , 5, e144	9.7	118
119	Connecting Earth observation to high-throughput biodiversity data. <i>Nature Ecology and Evolution</i> , <b>2017</b> , 1, 176	12.3	117
118	Spectroscopic properties of the carotenoid 3-Hydroxyechinenone in the orange carotenoid protein from the cyanobacterium Arthrospira maxima. <i>Biochemistry</i> , <b>2005</b> , 44, 3994-4003	3.2	116
117	Structural determinants underlying photoprotection in the photoactive orange carotenoid protein of cyanobacteria. <i>Journal of Biological Chemistry</i> , <b>2010</b> , 285, 18364-75	5.4	114
116	The genome of deep-sea vent chemolithoautotroph Thiomicrospira crunogena XCL-2. <i>PLoS Biology</i> , <b>2006</b> , 4, e383	9.7	112
115	Cyanobacterial photoprotection by the orange carotenoid protein. <i>Nature Plants</i> , <b>2016</b> , 2, 16180	11.5	111
114	Phylum-wide comparative genomics unravel the diversity of secondary metabolism in Cyanobacteria. <i>BMC Genomics</i> , <b>2014</b> , 15, 977	4.5	103
113	Cyanobacterial-based approaches to improving photosynthesis in plants. <i>Journal of Experimental Botany</i> , <b>2013</b> , 64, 787-98	7	101
112	Comparative analysis of carboxysome shell proteins. <i>Photosynthesis Research</i> , <b>2011</b> , 109, 21-32	3.7	97
111	Carboxysomal carbonic anhydrases: Structure and role in microbial CO <sub>2</sub> fixation. <i>Biochimica Et Biophysica Acta - Proteins and Proteomics</i> , <b>2010</b> , 1804, 382-92	4	94
110	Characterization of a planctomycetal organelle: a novel bacterial microcompartment for the aerobic degradation of plant saccharides. <i>Applied and Environmental Microbiology</i> , <b>2014</b> , 80, 2193-205	4.8	93

109	Local and global structural drivers for the photoactivation of the orange carotenoid protein. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2015</b> , 112, E5567-74	11.5	86
108	The structure of CcmP, a tandem bacterial microcompartment domain protein from the $\beta$ -carboxysome, forms a subcompartment within a microcompartment. <i>Journal of Biological Chemistry</i> , <b>2013</b> , 288, 16055-63	5.4	82
107	PHOTOSYNTHETIC CYTOCHROMES c IN CYANOBACTERIA, ALGAE, AND PLANTS. <i>Annual Review of Plant Biology</i> , <b>1998</b> , 49, 397-425		82
106	Structural and functional modularity of the orange carotenoid protein: distinct roles for the N- and C-terminal domains in cyanobacterial photoprotection. <i>Plant Cell</i> , <b>2014</b> , 26, 426-37	11.6	81
105	Crystal structure of the FRP and identification of the active site for modulation of OCP-mediated photoprotection in cyanobacteria. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2013</b> , 110, 10022-7	11.5	79
104	Visualization of Bacterial Microcompartment Facet Assembly Using High-Speed Atomic Force Microscopy. <i>Nano Letters</i> , <b>2016</b> , 16, 1590-5	11.5	77
103	Introduction of a synthetic CO <sub>2</sub> -fixing photorespiratory bypass into a cyanobacterium. <i>Journal of Biological Chemistry</i> , <b>2014</b> , 289, 9493-500	5.4	77
102	Assembly of robust bacterial microcompartment shells using building blocks from an organelle of unknown function. <i>Journal of Molecular Biology</i> , <b>2014</b> , 426, 2217-28	6.5	73
101	Engineering bacterial microcompartment shells: chimeric shell proteins and chimeric carboxysome shells. <i>ACS Synthetic Biology</i> , <b>2015</b> , 4, 444-53	5.7	72
100	Biochemical characterization of predicted Precambrian RuBisCO. <i>Nature Communications</i> , <b>2016</b> , 7, 10382	7.4	72
99	Genome mining expands the chemical diversity of the cyanobactin family to include highly modified linear peptides. <i>Chemistry and Biology</i> , <b>2013</b> , 20, 1033-43		71
98	Structure and function of the water-soluble carotenoid-binding proteins of cyanobacteria. <i>Photosynthesis Research</i> , <b>2004</b> , 81, 215-25	3.7	64
97	Water-soluble carotenoid proteins of cyanobacteria. <i>Archives of Biochemistry and Biophysics</i> , <b>2004</b> , 430, 2-9	4.1	64
96	Programmed loading and rapid purification of engineered bacterial microcompartment shells. <i>Nature Communications</i> , <b>2018</b> , 9, 2881	17.4	62
95	The essential role of the N-terminal domain of the orange carotenoid protein in cyanobacterial photoprotection: importance of a positive charge for phycobilisome binding. <i>Plant Cell</i> , <b>2012</b> , 24, 1972-83	11.6	61
94	Evidence for the widespread distribution of CRISPR-Cas system in the Phylum Cyanobacteria. <i>RNA Biology</i> , <b>2013</b> , 10, 687-93	4.8	61
93	Structures of cytochrome c-549 and cytochrome c6 from the cyanobacterium <i>Arthrospira maxima</i> . <i>Biochemistry</i> , <b>2001</b> , 40, 9215-25	3.2	61
92	Advances in Understanding Carboxysome Assembly in <i>Prochlorococcus</i> and <i>Synechococcus</i> Implicate CsoS2 as a Critical Component. <i>Life</i> , <b>2015</b> , 5, 1141-71	3	60

91	Isolation and characterization of the Prochlorococcus carboxysome reveal the presence of the novel shell protein CsoS1D. <i>Journal of Bacteriology</i> , <b>2012</b> , 194, 787-95	3.5	58
90	Bacterial microcompartment assembly: The key role of encapsulation peptides. <i>Communicative and Integrative Biology</i> , <b>2015</b> , 8, e1039755	1.7	52
89	Structure, function and evolution of the cyanobacterial orange carotenoid protein and its homologs. <i>New Phytologist</i> , <b>2017</b> , 215, 937-951	9.8	51
88	Carboxysomes: metabolic modules for CO <sub>2</sub> fixation. <i>FEMS Microbiology Letters</i> , <b>2017</b> , 364,	2.9	51
87	Production and Characterization of Synthetic Carboxysome Shells with Incorporated Luminal Proteins. <i>Plant Physiology</i> , <b>2016</b> , 170, 1868-77	6.6	50
86	Carotenoid-protein interaction alters the S(1) energy of hydroxyechinenone in the Orange Carotenoid Protein. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , <b>2013</b> , 1827, 248-54	4.6	45
85	Streamlined Construction of the Cyanobacterial CO <sub>2</sub> -Fixing Organelle via Protein Domain Fusions for Use in Plant Synthetic Biology. <i>Plant Cell</i> , <b>2015</b> , 27, 2637-44	11.6	43
84	Structure and Function of a Bacterial Microcompartment Shell Protein Engineered to Bind a [4Fe-4S] Cluster. <i>Journal of the American Chemical Society</i> , <b>2016</b> , 138, 5262-70	16.4	42
83	Incorporating genomics and bioinformatics across the life sciences curriculum. <i>PLoS Biology</i> , <b>2010</b> , 8, e1000448	9.7	42
82	Bioinformatic characterization of glycyl radical enzyme-associated bacterial microcompartments. <i>Applied and Environmental Microbiology</i> , <b>2015</b> , 81, 8315-29	4.8	41
81	Structure, Diversity, and Evolution of a New Family of Soluble Carotenoid-Binding Proteins in Cyanobacteria. <i>Molecular Plant</i> , <b>2016</b> , 9, 1379-1394	14.4	41
80	Different Functions of the Paralogs to the N-Terminal Domain of the Orange Carotenoid Protein in the Cyanobacterium <i>Anabaena</i> sp. PCC 7120. <i>Plant Physiology</i> , <b>2016</b> , 171, 1852-66	6.6	40
79	Light harvesting in photosystems I and II. <i>Biochemical Society Transactions</i> , <b>1993</b> , 21, 15-8	5.1	39
78	Structure and functions of Orange Carotenoid Protein homologs in cyanobacteria. <i>Current Opinion in Plant Biology</i> , <b>2017</b> , 37, 1-9	9.9	38
77	Additional families of orange carotenoid proteins in the photoprotective system of cyanobacteria. <i>Nature Plants</i> , <b>2017</b> , 3, 17089	11.5	38
76	Two new high-resolution crystal structures of carboxysome pentamer proteins reveal high structural conservation of CcmL orthologs among distantly related cyanobacterial species. <i>Photosynthesis Research</i> , <b>2013</b> , 118, 9-16	3.7	37
75	Using BLAST to teach "E-value-tionary" concepts. <i>PLoS Biology</i> , <b>2011</b> , 9, e1001014	9.7	37
74	Comparative analysis of 126 cyanobacterial genomes reveals evidence of functional diversity among homologs of the redox-regulated CP12 protein. <i>Plant Physiology</i> , <b>2013</b> , 161, 824-35	6.6	36

73	In Vitro Characterization and Concerted Function of Three Core Enzymes of a Glycyl Radical Enzyme - Associated Bacterial Microcompartment. <i>Scientific Reports</i> , <b>2017</b> , 7, 42757	4.9	35
72	Engineering the Bacterial Microcompartment Domain for Molecular Scaffolding Applications. <i>Frontiers in Microbiology</i> , <b>2017</b> , 8, 1441	5.7	35
71	Structural Characterization of a Newly Identified Component of $\beta$ -Carboxysomes: The AAA+ Domain Protein CsoCbbQ. <i>Scientific Reports</i> , <b>2015</b> , 5, 16243	4.9	34
70	Structural and EPR characterization of the soluble form of cytochrome c-550 and of the psbV2 gene product from the cyanobacterium <i>Thermosynechococcus elongatus</i> . <i>Plant and Cell Physiology</i> , <b>2003</b> , 44, 697-706	4.9	34
69	In Vitro Assembly of Diverse Bacterial Microcompartment Shell Architectures. <i>Nano Letters</i> , <b>2018</b> , 18, 7030-7037	11.5	32
68	Heterohexamers Formed by CcmK3 and CcmK4 Increase the Complexity of Beta Carboxysome Shells. <i>Plant Physiology</i> , <b>2019</b> , 179, 156-167	6.6	30
67	Engineering nanoreactors using bacterial microcompartment architectures. <i>Current Opinion in Biotechnology</i> , <b>2018</b> , 51, 1-7	11.4	29
66	Excited-state properties of the 16kDa red carotenoid protein from <i>Arthrospira maxima</i> . <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , <b>2011</b> , 1807, 30-5	4.6	29
65	Cyanobacterial ultrastructure in light of genomic sequence data. <i>Photosynthesis Research</i> , <b>2016</b> , 129, 147-57	3.7	27
64	Raman Optical Activity Reveals Carotenoid Photoactivation Events in the Orange Carotenoid Protein in Solution. <i>Journal of the American Chemical Society</i> , <b>2017</b> , 139, 10456-10460	16.4	27
63	The Plasticity of Molecular Interactions Governs Bacterial Microcompartment Shell Assembly. <i>Structure</i> , <b>2019</b> , 27, 749-763.e4	5.2	27
62	Structure of a Synthetic $\beta$ -Carboxysome Shell. <i>Plant Physiology</i> , <b>2019</b> , 181, 1050-1058	6.6	27
61	Specificity of the cyanobacterial orange carotenoid protein: influences of orange carotenoid protein and phycobilisome structures. <i>Plant Physiology</i> , <b>2014</b> , 164, 790-804	6.6	26
60	Crystal structure and possible dimerization of the high-potential iron-sulfur protein from <i>Chromatium purpuratum</i> . <i>Biochemistry</i> , <b>1998</b> , 37, 13911-7	3.2	26
59	Bacterial microcompartments as metabolic modules for plant synthetic biology. <i>Plant Journal</i> , <b>2016</b> , 87, 66-75	6.9	24
58	The Structural Basis of Coenzyme A Recycling in a Bacterial Organelle. <i>PLoS Biology</i> , <b>2016</b> , 14, e1002399	9.7	24
57	Purification and Characterization of Protein Nanotubes Assembled from a Single Bacterial Microcompartment Shell Subunit. <i>Advanced Materials Interfaces</i> , <b>2016</b> , 3, 1500295	4.6	23
56	The 1.6 Å resolution structure of Fe-superoxide dismutase from the thermophilic cyanobacterium <i>Thermosynechococcus elongatus</i> . <i>Journal of Biological Inorganic Chemistry</i> , <b>2003</b> , 8, 707-14	3.7	23

55	Carboxysome bioinformatics: identification and evolution of new bacterial microcompartment protein gene classes and core locus constraints. <i>Journal of Experimental Botany</i> , <b>2017</b> , 68, 3841-3855	7	21
54	The undergraduate genomics research initiative. <i>PLoS Biology</i> , <b>2007</b> , 5, e141	9.7	21
53	Bacterial microcompartments: catalysis-enhancing metabolic modules for next generation metabolic and biomedical engineering. <i>BMC Biology</i> , <b>2019</b> , 17, 79	7.3	20
52	A designed bacterial microcompartment shell with tunable composition and precision cargo loading. <i>Metabolic Engineering</i> , <b>2019</b> , 54, 286-291	9.7	20
51	Glycyl Radical Enzyme-Associated Microcompartments: Redox-Replete Bacterial Organelles. <i>MBio</i> , <b>2019</b> , 10,	7.8	20
50	Operational properties of fluctuation X-ray scattering data. <i>IUCrJ</i> , <b>2015</b> , 2, 309-16	4.7	19
49	Synthetic OCP heterodimers are photoactive and recapitulate the fusion of two primitive carotenoproteins in the evolution of cyanobacterial photoprotection. <i>Plant Journal</i> , <b>2017</b> , 91, 646-656	6.9	18
48	Bioinformatic analysis of the distribution of inorganic carbon transporters and prospective targets for bioengineering to increase Ci uptake by cyanobacteria. <i>Photosynthesis Research</i> , <b>2015</b> , 126, 99-109	3.7	18
47	Cyanobacterial carboxysomes contain an unique rubisco-activase-like protein. <i>New Phytologist</i> , <b>2020</b> , 225, 793-806	9.8	18
46	Structure of the RuBisCO chaperone RbcX from <i>Synechocystis</i> sp. PCC6803. <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>2007</b> , 63, 1109-12		16
45	Interrelated modules in cyanobacterial photosynthesis: the carbon-concentrating mechanism, photorespiration, and light perception. <i>Journal of Experimental Botany</i> , <b>2016</b> , 67, 2931-40	7	16
44	Genomes of ubiquitous marine and hypersaline <i>Hydrogenovibrio</i> , <i>Thiomicrothrix</i> and <i>Thiomicrospira</i> spp. encode a diversity of mechanisms to sustain chemolithoautotrophy in heterogeneous environments. <i>Environmental Microbiology</i> , <b>2018</b> , 20, 2686-2708	5.2	14
43	X-ray radiolytic labeling reveals the molecular basis of orange carotenoid protein photoprotection and its interactions with fluorescence recovery protein. <i>Journal of Biological Chemistry</i> , <b>2019</b> , 294, 8848-8860	5.4	13
42	A catalog of the diversity and ubiquity of bacterial microcompartments. <i>Nature Communications</i> , <b>2021</b> , 12, 3809	17.4	13
41	Structural Characterization of a Synthetic Tandem-Domain Bacterial Microcompartment Shell Protein Capable of Forming Icosahedral Shell Assemblies. <i>ACS Synthetic Biology</i> , <b>2019</b> , 8, 668-674	5.7	12
40	Structural, Mechanistic and Genomic Insights into OCP-Mediated Photoprotection. <i>Advances in Botanical Research</i> , <b>2013</b> , 65, 1-26	2.2	12
39	A bioarchitectonic approach to the modular engineering of metabolism. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , <b>2017</b> , 372,	5.8	12
38	Crystals of the carotenoid protein from <i>Arthrospira maxima</i> containing uniformly oriented pigment molecules. <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>1997</b> , 53, 720-3		12

37	Engineered bacterial microcompartments: apps for programming metabolism. <i>Current Opinion in Biotechnology</i> , <b>2020</b> , 65, 225-232	11.4	11
36	Structural and functional insights into the unique CBS-CP12 fusion protein family in cyanobacteria. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2018</b> , 115, 7141-7146	11.5	10
35	Bayesian analysis of congruence of core genes in Prochlorococcus and Synechococcus and implications on horizontal gene transfer. <i>PLoS ONE</i> , <b>2014</b> , 9, e85103	3.7	10
34	The crystal structures of the tri-functional Chloroflexus aurantiacus and bi-functional Rhodobacter sphaeroides malyl-CoA lyases and comparison with CitE-like superfamily enzymes and malate synthases. <i>BMC Structural Biology</i> , <b>2013</b> , 13, 28	2.7	10
33	Structural and spectroscopic characterization of HCP2. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , <b>2019</b> , 1860, 414-424	4.6	9
32	Functionalization of Bacterial Microcompartment Shell Proteins With Covalently Attached Heme. <i>Frontiers in Bioengineering and Biotechnology</i> , <b>2019</b> , 7, 432	5.8	9
31	Engineering the orange carotenoid protein for applications in synthetic biology. <i>Current Opinion in Structural Biology</i> , <b>2019</b> , 57, 110-117	8.1	8
30	Fluorescence and Excited-State Conformational Dynamics of the Orange Carotenoid Protein. <i>Journal of Physical Chemistry B</i> , <b>2018</b> , 122, 1792-1800	3.4	8
29	The use of non-denaturing Deriphath-polyacrylamide gel electrophoresis to fractionate pigment-protein complexes of purple bacteria. <i>Photosynthesis Research</i> , <b>1991</b> , 30, 139-43	3.7	8
28	Rewiring Escherichia coli for carbon-dioxide fixation. <i>Nature Biotechnology</i> , <b>2016</b> , 34, 1035-1036	44.5	8
27	Plug-and-play for improving primary productivity. <i>American Journal of Botany</i> , <b>2015</b> , 102, 1949-50	2.7	7
26	Comparative ultrafast spectroscopy and structural analysis of OCP1 and OCP2 from Tolypothrix. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , <b>2020</b> , 1861, 148120	4.6	7
25	David W. Krogmann, 1931-2016. <i>Photosynthesis Research</i> , <b>2017</b> , 132, 1-12	3.7	6
24	Structural comparison of cytochrome c2and cytochrome c6. <i>Photosynthesis Research</i> , <b>1997</b> , 54, 81-98	3.7	6
23	Redox Characterization of Electrode-Immobilized Bacterial Microcompartment Shell Proteins Engineered To Bind Metal Centers.. <i>ACS Applied Bio Materials</i> , <b>2020</b> , 3, 685-692	4.1	6
22	Visualizing in Vivo Dynamics of Designer Nanoscaffolds. <i>Nano Letters</i> , <b>2020</b> , 20, 208-217	11.5	6
21	Structural analysis of a new carotenoid-binding protein: the C-terminal domain homolog of the OCP. <i>Scientific Reports</i> , <b>2020</b> , 10, 15564	4.9	6
20	Bioinformatic Identification and Structural Characterization of a New Carboxysome Shell Protein. <i>Advances in Photosynthesis and Respiration</i> , <b>2012</b> , 345-356	1.7	5



19	Excited-State Properties of Canthaxanthin in Cyanobacterial Carotenoid-Binding Proteins HCP2 and HCP3. <i>Journal of Physical Chemistry B</i> , <b>2020</b> , 124, 4896-4905	3.4	5
18	A Survey of Bacterial Microcompartment Distribution in the Human Microbiome. <i>Frontiers in Microbiology</i> , <b>2021</b> , 12, 669024	5.7	5
17	Evolutionary relationships among shell proteins of carboxysomes and metabolosomes. <i>Current Opinion in Microbiology</i> , <b>2021</b> , 63, 1-9	7.9	5
16	Light-Driven Chloride Transport Kinetics of Halorhodopsin. <i>Biophysical Journal</i> , <b>2018</b> , 115, 353-360	2.9	4
15	Photoprotection in Cyanobacteria: The Orange Carotenoid Protein and Energy Dissipation <b>2011</b> , 395-421		4
14	Structure of cytochrome c6 from <i>Arthrospira maxima</i> : an assembly of 24 subunits in a nearly symmetric shell. <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>2002</b> , 58, 1104-10		4
13	Free-electron laser data for multiple-particle fluctuation scattering analysis. <i>Scientific Data</i> , <b>2018</b> , 5, 180801		4
12	Structural and Functional Characterization of a Short-Chain Flavodoxin Associated with a Noncanonical 1,2-Propanediol Utilization Bacterial Microcompartment. <i>Biochemistry</i> , <b>2017</b> , 56, 5679-5690	3.2	3
11	Ubiquity and functional uniformity in CO <sub>2</sub> concentrating mechanisms in multiple phyla of Bacteria is suggested by a diversity and prevalence of genes encoding candidate dissolved inorganic carbon transporters. <i>FEMS Microbiology Letters</i> , <b>2020</b> , 367,	2.9	3
10	Crystallization of two integral membrane pigment-protein complexes from the purple-sulfur bacterium <i>Chromatium purpuratum</i> . <i>Protein Science</i> , <b>1993</b> , 2, 1352-5	6.3	3
9	Binding Options for the Small Subunit-Like Domain of Cyanobacteria to Rubisco. <i>Frontiers in Microbiology</i> , <b>2020</b> , 11, 187	5.7	2
8	A Catalog of the Diversity and Ubiquity of Metabolic Organelles in Bacteria		2
7	Structures of the Cyanobacterial Phycobilisome		1
6	Validation of an insertion-engineered isoprene synthase as a strategy to functionalize terpene synthases.. <i>RSC Advances</i> , <b>2021</b> , 11, 29997-30005	3.7	1
5	BMC Caller: a webtool to identify and analyze bacterial microcompartment types in sequence data.. <i>Biology Direct</i> , <b>2022</b> , 17, 9	7.2	1
4	Clues to the function of bacterial microcompartments from ancillary genes. <i>Biochemical Society Transactions</i> , <b>2021</b> , 49, 1085-1098	5.1	0
3	Liposome-based measurement of light-driven chloride transport kinetics of halorhodopsin. <i>Biochimica Et Biophysica Acta - Biomembranes</i> , <b>2021</b> , 1863, 183637	3.8	0
2	Characterization of Novel Homologs to the C-terminal Domain of the Orange Carotenoid Protein. <i>FASEB Journal</i> , <b>2019</b> , 33, 779.45	0.9	

1 Bioenergetics Theory and Components | The Shells of Bacterial Microcompartments **2021**, 108-122