

# Brian G Fox

## List of Publications by Citations

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162  
papers

8,269  
citations

50  
h-index

86  
g-index

167  
ext. papers

9,008  
ext. citations

6.1  
avg, IF

5.67  
L-index

#	Paper	IF	Citations
162	Eight histidine residues are catalytically essential in a membrane-associated iron enzyme, stearoyl-CoA desaturase, and are conserved in alkane hydroxylase and xylene monooxygenase. <i>Biochemistry</i> , <b>1994</b> , 33, 12787-94	3.2	649
161	Haloalkene oxidation by the soluble methane monooxygenase from <i>Methylosinus trichosporium</i> OB3b: mechanistic and environmental implications. <i>Biochemistry</i> , <b>1990</b> , 29, 6419-27	3.2	345
160	Maltose-neopentyl glycol (MNG) amphiphiles for solubilization, stabilization and crystallization of membrane proteins. <i>Nature Methods</i> , <b>2010</b> , 7, 1003-8	21.6	316
159	A transient intermediate of the methane monooxygenase catalytic cycle containing an FeIVFeIV cluster. <i>Journal of the American Chemical Society</i> , <b>1993</b> , 115, 6450-6451	16.4	307
158	A combined approach to improving large-scale production of tobacco etch virus protease. <i>Protein Expression and Purification</i> , <b>2007</b> , 55, 53-68	2	216
157	Peroxodiferric intermediate of stearoyl-acyl carrier protein delta 9 desaturase: oxidase reactivity during single turnover and implications for the mechanism of desaturation. <i>Biochemistry</i> , <b>1998</b> , 37, 14664-71	3.2	205
156	Resonance Raman evidence for an Fe-O-Fe center in stearoyl-ACP desaturase. Primary sequence identity with other diiron-oxo proteins. <i>Biochemistry</i> , <b>1994</b> , 33, 12776-86	3.2	186
155	Moessbauer, EPR, and ENDOR studies of the hydroxylase and reductase components of methane monooxygenase from <i>Methylosinus trichosporium</i> OB3b. <i>Journal of the American Chemical Society</i> , <b>1993</b> , 115, 3688-3701	16.4	167
154	Recombinant toluene-4-monooxygenase: catalytic and Moessbauer studies of the purified diiron and rieske components of a four-protein complex. <i>Biochemistry</i> , <b>1996</b> , 35, 9106-19	3.2	165
153	High-valent transition metal chemistry. Moessbauer and EPR studies of high-spin ( $S = 2$ ) iron(IV) and intermediate-spin ( $S = 3/2$ ) iron(III) complexes with a macrocyclic tetraamido-N ligand. <i>Journal of the American Chemical Society</i> , <b>1993</b> , 115, 6746-6757	16.4	159
152	Structure and mechanism of mouse cysteine dioxygenase. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2006</b> , 103, 3084-9	11.5	157
151	Reactions of the diiron enzyme stearoyl-acyl carrier protein desaturase. <i>Accounts of Chemical Research</i> , <b>2004</b> , 37, 421-9	24.3	152
150	Evolution and Ecology of Actinobacteria and Their Bioenergy Applications. <i>Annual Review of Microbiology</i> , <b>2016</b> , 70, 235-54	17.5	146
149	X-ray structure of a mammalian stearoyl-CoA desaturase. <i>Nature</i> , <b>2015</b> , 524, 252-6	50.4	136
148	Identification of transcribed sequences in <i>Arabidopsis thaliana</i> by using high-resolution genome tiling arrays. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2005</b> , 102, 4453-8	11.5	136
147	Integer-spin EPR studies of the fully reduced methane monooxygenase hydroxylase component. <i>Journal of the American Chemical Society</i> , <b>1990</b> , 112, 5861-5865	16.4	132
146	Cloning and sequence analysis of two <i>Pseudomonas</i> flavoprotein xenobiotic reductases. <i>Journal of Bacteriology</i> , <b>1999</b> , 181, 6254-63	3.5	131

145	Transformation of 2,4,6-trinitrotoluene by purified xenobiotic reductase B from <i>Pseudomonas fluorescens</i> I-C. <i>Applied and Environmental Microbiology</i> , <b>2000</b> , 66, 4742-50	4.8	128
144	Enhanced bacterial protein expression during auto-induction obtained by alteration of lac repressor dosage and medium composition. <i>Biotechnology Progress</i> , <b>2007</b> , 23, 585-98	2.8	124
143	Oxidation-reduction potentials of the methane monooxygenase hydroxylase component from <i>Methylosinus trichosporium</i> OB3b. <i>Biochemistry</i> , <b>1994</b> , 33, 713-22	3.2	110
142	Protocols for production of selenomethionine-labeled proteins in 2-L polyethylene terephthalate bottles using auto-induction medium. <i>Protein Expression and Purification</i> , <b>2005</b> , 40, 256-67	2	99
141	Mössbauer studies of the formation and reactivity of a quasi-stable peroxy intermediate of stearoyl-acyl carrier protein Delta 9-desaturase. <i>Biochemistry</i> , <b>1999</b> , 38, 12197-204	3.2	97
140	Aerobic deconstruction of cellulosic biomass by an insect-associated <i>Streptomyces</i> . <i>Scientific Reports</i> , <b>2013</b> , 3, 1030	4.9	93
139	Changes in the regiospecificity of aromatic hydroxylation produced by active site engineering in the diiron enzyme toluene 4-monooxygenase. <i>Biochemistry</i> , <b>1997</b> , 36, 9283-9	3.2	92
138	Insight into the mechanism of aromatic hydroxylation by toluene 4-monooxygenase by use of specifically deuterated toluene and p-xylene. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2003</b> , 100, 3784-9	11.5	92
137	Characterization of the nitrosyl adduct of substrate-bound mouse cysteine dioxygenase by electron paramagnetic resonance: electronic structure of the active site and mechanistic implications. <i>Biochemistry</i> , <b>2007</b> , 46, 8569-78	3.2	91
136	Spectroscopic studies of the coupled binuclear non-heme iron active site in the fully reduced hydroxylase component of methane monooxygenase: comparison to deoxy and deoxy-azide hemerythrin. <i>Journal of the American Chemical Society</i> , <b>1993</b> , 115, 12409-12422	16.4	90
135	Auto-induction medium for the production of [U-15N]- and [U-13C, U-15N]-labeled proteins for NMR screening and structure determination. <i>Protein Expression and Purification</i> , <b>2005</b> , 40, 268-78	2	81
134	Combined participation of hydroxylase active site residues and effector protein binding in a para to ortho modulation of toluene 4-monooxygenase regiospecificity. <i>Biochemistry</i> , <b>2002</b> , 41, 3176-88	3.2	81
133	Structural consequences of effector protein complex formation in a diiron hydroxylase. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2008</b> , 105, 19194-8	11.5	80
132	Solution structures of spinach acyl carrier protein with decanoate and stearate. <i>Biochemistry</i> , <b>2006</b> , 45, 5217-27	3.2	75
131	Results from high-throughput DNA cloning of <i>Arabidopsis thaliana</i> target genes using site-specific recombination. <i>Journal of Structural and Functional Genomics</i> , <b>2004</b> , 5, 267-76		73
130	The oligomeric states of the purified sigma-1 receptor are stabilized by ligands. <i>Journal of Biological Chemistry</i> , <b>2014</b> , 289, 20333-44	5.4	72
129	Wheat germ cell-free translation, purification, and assembly of a functional human stearoyl-CoA desaturase complex. <i>Protein Expression and Purification</i> , <b>2008</b> , 62, 171-8	2	71
128	Methane monooxygenase from <i>Methylosinus trichosporium</i> OB3b. <i>Methods in Enzymology</i> , <b>1990</b> , 188, 191-202	1.7	71

127	Global gene expression patterns in <i>Clostridium thermocellum</i> as determined by microarray analysis of chemostat cultures on cellulose or cellobiose. <i>Applied and Environmental Microbiology</i> , <b>2011</b> , 77, 1243-1253	4.8	66
126	Effects of sterculic acid on stearoyl-CoA desaturase in differentiating 3T3-L1 adipocytes. <i>Biochemical and Biophysical Research Communications</i> , <b>2003</b> , 300, 316-26	3.4	65
125	High-throughput purification and quality assurance of <i>Arabidopsis thaliana</i> proteins for eukaryotic structural genomics. <i>Journal of Structural and Functional Genomics</i> , <b>2005</b> , 6, 143-7		65
124	Circular Dichroism and Magnetic Circular Dichroism Studies of the Reduced Binuclear Non-Heme Iron Site of Stearoyl-ACP $\Delta$ -Desaturase: Substrate Binding and Comparison to Ribonucleotide Reductase. <i>Journal of the American Chemical Society</i> , <b>1999</b> , 121, 2770-2783	16.4	62
123	Spectroscopic and computational characterization of substrate-bound mouse cysteine dioxygenase: nature of the ferrous and ferric cysteine adducts and mechanistic implications. <i>Biochemistry</i> , <b>2010</b> , 49, 6033-41	3.2	60
122	Evolution of substrate specificity in bacterial AA10 lytic polysaccharide monooxygenases. <i>Biotechnology for Biofuels</i> , <b>2014</b> , 7, 109	7.8	59
121	Designing ligands to achieve robust oxidation catalysts. Iron based systems. <i>Coordination Chemistry Reviews</i> , <b>1998</b> , 174, 361-390	23.2	59
120	Differential regulation of the stearoyl-CoA desaturase genes by thiazolidinediones in 3T3-L1 adipocytes. <i>Journal of Lipid Research</i> , <b>2000</b> , 41, 1310-1316	6.3	59
119	Coordinating the impact of structural genomics on the human $\alpha$ -helical transmembrane proteome. <i>Nature Structural and Molecular Biology</i> , <b>2013</b> , 20, 135-8	17.6	57
118	Toluene monooxygenase-catalyzed epoxidation of alkenes. <i>Applied and Environmental Microbiology</i> , <b>2000</b> , 66, 1877-82	4.8	57
117	Transformation of RDX and other energetic compounds by xenobiotic reductases XenA and XenB. <i>Applied Microbiology and Biotechnology</i> , <b>2009</b> , 84, 535-44	5.7	56
116	Mössbauer and EPR studies of the photoactivation of nitrile hydratase. <i>Biochemistry</i> , <b>2001</b> , 40, 7984-91	3.2	54
115	Comparison of cell-based and cell-free protocols for producing target proteins from the <i>Arabidopsis thaliana</i> genome for structural studies. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2005</b> , 59, 633-43	4.2	52
114	High efficiency single step production of expression plasmids from cDNA clones using the Flexi Vector cloning system. <i>Protein Expression and Purification</i> , <b>2006</b> , 47, 562-70	2	51
113	Threonine 201 in the diiron enzyme toluene 4-monooxygenase is not required for catalysis. <i>Biochemistry</i> , <b>2000</b> , 39, 791-9	3.2	50
112	Cellulolytic <i>Streptomyces</i> strains associated with herbivorous insects share a phylogenetically linked capacity to degrade lignocellulose. <i>Applied and Environmental Microbiology</i> , <b>2014</b> , 80, 4692-701	4.8	49
111	Evolution of High Cellulolytic Activity in Symbiotic <i>Streptomyces</i> through Selection of Expanded Gene Content and Coordinated Gene Expression. <i>PLoS Biology</i> , <b>2016</b> , 14, e1002475	9.7	46
110	Autoinduction of protein expression. <i>Current Protocols in Protein Science</i> , <b>2009</b> , Chapter 5, Unit 5.23	3.1	45

109	High valent transition metal chemistry. Synthesis and characterization of an intermediate-spin iron(IV) complex of a strong pi-acid ligand. <i>Journal of the American Chemical Society</i> , <b>1992</b> , 114, 8724-8725	16.4	45
108	Mutations in FLS2 Ser-938 dissect signaling activation in FLS2-mediated Arabidopsis immunity. <i>PLoS Pathogens</i> , <b>2013</b> , 9, e1003313	7.6	44
107	Reaction mechanisms of non-heme diiron hydroxylases characterized in whole cells. <i>Journal of Inorganic Biochemistry</i> , <b>2005</b> , 99, 1998-2006	4.2	42
106	Purification of a high specific activity methane monooxygenase hydroxylase component from a type II methanotroph. <i>Biochemical and Biophysical Research Communications</i> , <b>1988</b> , 154, 165-70	3.4	41
105	Application of fed-batch fermentation to the preparation of isotopically labeled or selenomethionyl-labeled proteins. <i>Protein Expression and Purification</i> , <b>1999</b> , 16, 109-19	2	40
104	Structure and mechanism of NOV1, a resveratrol-cleaving dioxygenase. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2016</b> , 113, 14324-14329	11.5	40
103	Crystallographic and catalytic studies of the peroxide-shunt reaction in a diiron hydroxylase. <i>Biochemistry</i> , <b>2009</b> , 48, 8932-9	3.2	39
102	Cell-free translation of integral membrane proteins into unilamellar liposomes. <i>Methods in Enzymology</i> , <b>2009</b> , 463, 647-73	1.7	39
101	Structural genomics: from genes to structures with valuable materials and many questions in between. <i>Nature Methods</i> , <b>2008</b> , 5, 129-32	21.6	39
100	Multifunctional cellulase catalysis targeted by fusion to different carbohydrate-binding modules. <i>Biotechnology for Biofuels</i> , <b>2015</b> , 8, 220	7.8	38
99	X-ray structure of ILL2, an auxin-conjugate amidohydrolase from Arabidopsis thaliana. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2009</b> , 74, 61-71	4.2	37
98	Geometric and electronic structure studies of the binuclear nonheme ferrous active site of toluene-4-monooxygenase: parallels with methane monooxygenase and insight into the role of the effector proteins in O <sub>2</sub> activation. <i>Journal of the American Chemical Society</i> , <b>2008</b> , 130, 7098-109	16.4	37
97	N-isotope effects on the Raman spectra of Fe(2)S(2) ferredoxin and Rieske ferredoxin: evidence for structural rigidity of metal sites. <i>Journal of Biological Inorganic Chemistry</i> , <b>2003</b> , 8, 318-26	3.7	35
96	Structure of human J-type co-chaperone HscB reveals a tetracysteine metal-binding domain. <i>Journal of Biological Chemistry</i> , <b>2008</b> , 283, 30184-92	5.4	33
95	In-crystal reaction cycle of a toluene-bound diiron hydroxylase. <i>Nature</i> , <b>2017</b> , 544, 191-195	50.4	32
94	Cell-free synthesis and functional characterization of sphingolipid synthases from parasitic trypanosomatid protozoa. <i>Journal of Biological Chemistry</i> , <b>2010</b> , 285, 20580-7	5.4	32
93	Remarkable aliphatic hydroxylation by the diiron enzyme toluene 4-monooxygenase in reactions with radical or cation diagnostic probes norcarane, 1,1-dimethylcyclopropane, and 1,1-diethylcyclopropane. <i>Biochemistry</i> , <b>2004</b> , 43, 15688-701	3.2	32
92	Molecular differences caused by differentiation of 3T3-L1 preadipocytes in the presence of either dehydroepiandrosterone (DHEA) or 7-oxo-DHEA. <i>Biochemistry</i> , <b>2002</b> , 41, 5473-82	3.2	32

91	Rapid kinetic characterization of glycosyl hydrolases based on oxime derivatization and nanostructure-initiator mass spectrometry (NIMS). <i>ACS Chemical Biology</i> , <b>2014</b> , 9, 1470-9	4.9	30
90	X-ray structure of putative acyl-ACP desaturase DesA2 from <i>Mycobacterium tuberculosis</i> H37Rv. <i>Protein Science</i> , <b>2005</b> , 14, 1508-17	6.3	30
89	Identification of the binding region of the [2Fe-2S] ferredoxin in stearoyl-acyl carrier protein desaturase: insight into the catalytic complex and mechanism of action. <i>Biochemistry</i> , <b>2006</b> , 45, 4848-58	3.2	30
88	The fundamental, versatile role of diiron enzymes in lipid metabolism. <i>Lipid - Fett</i> , <b>1998</b> , 100, 103-113		29
87	Cell-free protein synthesis technology in NMR high-throughput structure determination. <i>Methods in Molecular Biology</i> , <b>2010</b> , 607, 127-47	1.4	29
86	Role of hydrophobic partitioning in substrate selectivity and turnover of the <i>ricinus communis</i> stearoyl acyl carrier protein delta(9) desaturase. <i>Biochemistry</i> , <b>1999</b> , 38, 12833-40	3.2	28
85	Spectroscopic and computational characterization of the NO adduct of substrate-bound Fe(II) cysteine dioxygenase: insights into the mechanism of O <sub>2</sub> activation. <i>Biochemistry</i> , <b>2013</b> , 52, 6040-51	3.2	27
84	Small-scale, semi-automated purification of eukaryotic proteins for structure determination. <i>Journal of Structural and Functional Genomics</i> , <b>2007</b> , 8, 153-66		27
83	Optimized expression and purification of toluene 4-monooxygenase hydroxylase. <i>Protein Expression and Purification</i> , <b>2000</b> , 20, 58-65	2	27
82	Expression, purification, and physical characterization of <i>Escherichia coli</i> lipoyl(octanoyl)transferase. <i>Protein Expression and Purification</i> , <b>2005</b> , 39, 269-82	2	26
81	Solution structure of the toluene 4-monooxygenase effector protein (T4moD). <i>Biochemistry</i> , <b>2001</b> , 40, 3512-24	3.2	26
80	Functional evolution of ribonuclease inhibitor: insights from birds and reptiles. <i>Journal of Molecular Biology</i> , <b>2014</b> , 426, 3041-56	6.5	25
79	The Center for Eukaryotic Structural Genomics. <i>Journal of Structural and Functional Genomics</i> , <b>2009</b> , 10, 165-79		25
78	Spinach holo-acyl carrier protein: overproduction and phosphopantetheinylation in <i>Escherichia coli</i> BL21(DE3), in vitro acylation, and enzymatic desaturation of histidine-tagged isoform I. <i>Protein Expression and Purification</i> , <b>1999</b> , 15, 314-26	2	25
77	Active site and laminarin binding in glycoside hydrolase family 55. <i>Journal of Biological Chemistry</i> , <b>2015</b> , 290, 11819-32	5.4	24
76	Structural basis for biomolecular recognition in overlapping binding sites in a diiron enzyme system. <i>Nature Communications</i> , <b>2014</b> , 5, 5009	17.4	24
75	Spectroscopic and computational investigation of iron(III) cysteine dioxygenase: implications for the nature of the putative superoxo-Fe(III) intermediate. <i>Biochemistry</i> , <b>2014</b> , 53, 5759-70	3.2	23
74	Structure-guided analysis of catalytic specificity of the abundantly secreted chitosanase SACTE_5457 from <i>Streptomyces</i> sp. SirexAA-E. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2014</b> , 82, 1245-57	4.2	23

73	Fusion of dioxygenase and lignin-binding domains in a novel secreted enzyme from cellulolytic <i>Streptomyces</i> sp. SirexAA-E. <i>Journal of Biological Chemistry</i> , <b>2013</b> , 288, 18574-87	5.4	23
72	A Protein Structure Initiative approach to expression, purification, and in situ delivery of human cytochrome b5 to membrane vesicles. <i>Protein Expression and Purification</i> , <b>2008</b> , 58, 229-41	2	23
71	Flexi vector cloning. <i>Methods in Molecular Biology</i> , <b>2009</b> , 498, 55-73	1.4	22
70	Production in two-liter beverage bottles of proteins for NMR structure determination labeled with either <sup>15</sup> N- or <sup>13</sup> C- <sup>15</sup> N. <i>Journal of Structural and Functional Genomics</i> , <b>2004</b> , 5, 87-93		22
69	Desaturation, chain scission, and register-shift of oxygen-substituted fatty acids during reaction with stearyl-ACP desaturase. <i>Biochemistry</i> , <b>2002</b> , 41, 10141-8	3.2	22
68	Spectroscopic and Computational Investigation of the H155A Variant of Cysteine Dioxygenase: Geometric and Electronic Consequences of a Third-Sphere Amino Acid Substitution. <i>Biochemistry</i> , <b>2015</b> , 54, 2874-84	3.2	21
67	Role for threonine 201 in the catalytic cycle of the soluble diiron hydroxylase toluene 4-monooxygenase. <i>Biochemistry</i> , <b>2009</b> , 48, 3838-46	3.2	21
66	EXAFS and Mössbauer characterization of the Diiron(III) site in stearyl-acyl carrier protein $\beta$ desaturase. <i>Journal of Biological Inorganic Chemistry</i> , <b>1998</b> , 3, 392-400	3.7	21
65	Robotic large-scale application of wheat cell-free translation to structural studies including membrane proteins. <i>New Biotechnology</i> , <b>2011</b> , 28, 239-49	6.4	20
64	Structure of cellobiose phosphorylase from <i>Clostridium thermocellum</i> in complex with phosphate. <i>Acta Crystallographica Section F: Structural Biology Communications</i> , <b>2011</b> , 67, 1345-9		20
63	Fluorescence anisotropy assay for proteolysis of specifically labeled fusion proteins. <i>Analytical Biochemistry</i> , <b>2005</b> , 336, 75-86	3.1	20
62	Fluorescence anisotropy studies of enzyme-substrate complex formation in stearyl-ACP desaturase. <i>Biochemistry</i> , <b>2002</b> , 41, 14472-81	3.2	20
61	Crystal structures and functional studies of T4moD, the toluene 4-monooxygenase catalytic effector protein. <i>Biochemistry</i> , <b>2005</b> , 44, 7131-42	3.2	19
60	Identification of Rv3230c as the NADPH oxidoreductase of a two-protein DesA3 acyl-CoA desaturase in <i>Mycobacterium tuberculosis</i> H37Rv. <i>Biochemistry</i> , <b>2006</b> , 45, 13476-86	3.2	19
59	Expression, purification and characterization of a functional carbohydrate-binding module from <i>Streptomyces</i> sp. SirexAA-E. <i>Protein Expression and Purification</i> , <b>2014</b> , 98, 1-9	2	18
58	Cell-free production of integral membrane aspartic acid proteases reveals zinc-dependent methyltransferase activity of the <i>Pseudomonas aeruginosa</i> prepilin peptidase PilD. <i>MicrobiologyOpen</i> , <b>2013</b> , 2, 94-104	3.4	18
57	Function of Shaker potassium channels produced by cell-free translation upon injection into <i>Xenopus</i> oocytes. <i>Scientific Reports</i> , <b>2013</b> , 3, 1040	4.9	18
56	Rapid-mix and chemical quench studies of ferredoxin-reduced stearyl-acyl carrier protein desaturase. <i>Biochemistry</i> , <b>2003</b> , 42, 5857-66	3.2	18

55	X-ray structure of Danio rerio secretagoin: A hexa-EF-hand calcium sensor. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2009</b> , 76, 477-83	4.2	17
54	Cell-free translation of biofuel enzymes. <i>Methods in Molecular Biology</i> , <b>2014</b> , 1118, 71-95	1.4	17
53	Cell-free protein synthesis for functional and structural studies. <i>Methods in Molecular Biology</i> , <b>2014</b> , 1091, 161-78	1.4	16
52	Crystallographic analysis of active site contributions to regiospecificity in the diiron enzyme toluene 4-monooxygenase. <i>Biochemistry</i> , <b>2012</b> , 51, 1101-13	3.2	16
51	Soluble expression and purification of the oxidoreductase component of toluene 4-monooxygenase. <i>Protein Expression and Purification</i> , <b>2008</b> , 57, 9-16	2	15
50	Chemical and posttranslational modification of Escherichia coli acyl carrier protein for preparation of dansyl-acyl carrier proteins. <i>Protein Expression and Purification</i> , <b>2000</b> , 20, 274-84	2	15
49	Methane Monooxygenase: A Novel Biological Catalyst for Hydrocarbon Oxidations <b>1990</b> , 367-388		15
48	Development of a High Throughput Platform for Screening Glycoside Hydrolases Based on Oxime-NIMS. <i>Frontiers in Bioengineering and Biotechnology</i> , <b>2015</b> , 3, 153	5.8	14
47	Crystal structure of At2g03760, a putative steroid sulfotransferase from Arabidopsis thaliana. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2004</b> , 57, 854-7	4.2	14
46	Chain cleavage and sulfoxidation of thioacyl-ACP upon reaction with stearyl-ACP desaturase. <i>Biochemistry</i> , <b>2003</b> , 42, 7828-35	3.2	14
45	Resonance Raman studies of the stoichiometric catalytic turnover of a substrate-stearyl-acyl carrier protein delta(9) desaturase complex. <i>Biochemistry</i> , <b>2000</b> , 39, 10507-13	3.2	14
44	Determination of glycoside hydrolase specificities during hydrolysis of plant cell walls using glycome profiling. <i>Biotechnology for Biofuels</i> , <b>2017</b> , 10, 31	7.8	13
43	Structural and functional characterization of a novel phosphatase from the Arabidopsis thaliana gene locus At1g05000. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2008</b> , 73, 241-53	4.2	13
42	Aromatic hydroxylation catalyzed by toluene 4-monooxygenase in organic solvent/aqueous buffer mixtures. <i>Applied Biochemistry and Biotechnology</i> , <b>2001</b> , 90, 187-97	3.2	13
41	Desaturation of trans-octadecenoyl-acyl carrier protein by stearyl-acyl carrier protein delta9 desaturase. <i>Journal of Inorganic Biochemistry</i> , <b>2000</b> , 78, 7-14	4.2	13
40	Biochemical properties and atomic resolution structure of a proteolytically processed Emannanase from cellulolytic Streptomyces sp. SirexAA-E. <i>PLoS ONE</i> , <b>2014</b> , 9, e94166	3.7	12
39	Improved expression and purification of sigma 1 receptor fused to maltose binding protein by alteration of linker sequence. <i>Protein Expression and Purification</i> , <b>2013</b> , 89, 203-9	2	11
38	Component interactions and implications for complex formation in the multicomponent toluene 4-monooxygenase. <i>Biochemistry</i> , <b>2006</b> , 45, 5478-85	3.2	11



37	Solution structure of T4moC, the Rieske ferredoxin component of the toluene 4-monooxygenase complex. <i>Journal of Biological Inorganic Chemistry</i> , <b>2004</b> , 9, 945-53	3.7	11
36	Expression platforms for producing eukaryotic proteins: a comparison of E. coli cell-based and wheat germ cell-free synthesis, affinity and solubility tags, and cloning strategies. <i>Journal of Structural and Functional Genomics</i> , <b>2015</b> , 16, 67-80		10
35	Discovery of sarcosine dimethylglycine methyltransferase from <i>Galdieria sulphuraria</i> . <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2009</b> , 74, 368-77	4.2	10
34	Crystallization and preliminary analysis of xenobiotic reductase B from <i>Pseudomonas fluorescens</i> I-C. <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>2004</b> , 60, 1289-91		10
33	Structures of proteins of biomedical interest from the Center for Eukaryotic Structural Genomics. <i>Journal of Structural and Functional Genomics</i> , <b>2007</b> , 8, 73-84		9
32	Preparation of isotopically labeled spinach acyl-acyl carrier protein for NMR structural studies. <i>Protein Expression and Purification</i> , <b>2006</b> , 46, 446-55	2	9
31	Structure of T4moF, the Toluene 4-Monooxygenase Ferredoxin Oxidoreductase. <i>Biochemistry</i> , <b>2015</b> , 54, 5980-8	3.2	8
30	Extent and Origins of Functional Diversity in a Subfamily of Glycoside Hydrolases. <i>Journal of Molecular Biology</i> , <b>2019</b> , 431, 1217-1233	6.5	7
29	A bacterial biosynthetic pathway for methylated furan fatty acids. <i>Journal of Biological Chemistry</i> , <b>2020</b> , 295, 9786-9801	5.4	7
28	Spectroscopic Investigation of Cysteamine Dioxygenase. <i>Biochemistry</i> , <b>2020</b> , 59, 2450-2458	3.2	7
27	Crystallization and preliminary analysis of xenobiotic reductase A and ligand complexes from <i>Pseudomonas putida</i> II-B. <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>2004</b> , 60, 957-61		7
26	Cell-free translation and purification of <i>Arabidopsis thaliana</i> regulator of G signaling 1 protein. <i>Protein Expression and Purification</i> , <b>2016</b> , 126, 33-41	2	7
25	Solid-state NMR studies of solvent-mediated, acid-catalyzed woody biomass pre-treatment for enzymatic conversion of residual cellulose. <i>ACS Sustainable Chemistry and Engineering</i> , <b>2020</b> , 8, 6551-6563	8.3	7
24	In vivo inactivation of the mycobacterial integral membrane stearyl coenzyme A desaturase DesA3 by a C-terminus-specific degradation process. <i>Journal of Bacteriology</i> , <b>2008</b> , 190, 6686-96	3.5	6
23	Oxygen-18 tracer studies of enzyme reactions with radical/cation diagnostic probes. <i>Biochemical and Biophysical Research Communications</i> , <b>2005</b> , 338, 240-9	3.4	5
22	Crystal structure of the protein from gene At3g17210 of <i>Arabidopsis thaliana</i> . <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2004</b> , 57, 218-20	4.2	5
21	Use of Nanostructure-Initiator Mass Spectrometry to Deduce Selectivity of Reaction in Glycoside Hydrolases. <i>Frontiers in Bioengineering and Biotechnology</i> , <b>2015</b> , 3, 165	5.8	4
20	Amino acid determinants of substrate selectivity in the <i>Trypanosoma brucei</i> sphingolipid synthase family. <i>Biochemistry</i> , <b>2011</b> , 50, 8853-61	3.2	4

19	X-ray structure of a soluble Rieske-type ferredoxin from <i>Mus musculus</i> . <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>2008</b> , 64, 933-40		4
18	The structure at 2.4 Å resolution of the protein from gene locus At3g21360, a putative Fe(II)/2-oxoglutarate-dependent enzyme from <i>Arabidopsis thaliana</i> . <i>Acta Crystallographica Section F: Structural Biology Communications</i> , <b>2005</b> , 61, 469-72		4
17	Reply to Kiser: Dioxygen binding in NOV1 crystal structures. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2017</b> , 114, E6029-E6030	11.5	3
16	Structural architecture of <i>Galdieria sulphuraria</i> DCN1L. <i>Proteins: Structure, Function and Bioinformatics</i> , <b>2011</b> , 79, 1329-36	4.2	3
15	The Crystal Structure of Cysteamine Dioxygenase Reveals the Origin of the Large Substrate Scope of This Vital Mammalian Enzyme. <i>Biochemistry</i> , <b>2021</b> , 60, 3728-3737	3.2	2
14	Role of Nucleic Acid and Protein Manipulation Technologies in High-throughput Structural Biology Efforts <b>2003</b> ,		2
13	A structural and kinetic survey of GH5_4 endoglucanases reveals determinants of broad substrate specificity and opportunities for biomass hydrolysis. <i>Journal of Biological Chemistry</i> , <b>2020</b> , 295, 17752-17769	5.4	2
12	Multifunctional cellulases are potent, versatile tools for a renewable bioeconomy. <i>Current Opinion in Biotechnology</i> , <b>2021</b> , 67, 141-148	11.4	2
11	Crystallization and preliminary analysis of native and N-terminal truncated isoforms of toluene-4-monooxygenase catalytic effector protein. <i>Acta Crystallographica Section D: Biological Crystallography</i> , <b>2003</b> , 59, 572-5		1
10	Assignment of <sup>1</sup> H, <sup>13</sup> C and <sup>15</sup> N NMR signals in the toluene 4-monooxygenase effector protein. <i>Journal of Biomolecular NMR</i> , <b>2000</b> , 16, 359-60	3	1
9	Mannose- and Mannobiose-Specific Responses of the Insect-Associated Cellulolytic Bacterium sp. Strain SirexAA-E. <i>Applied and Environmental Microbiology</i> , <b>2021</b> , 87, e0271920	4.8	1
8	Spectroscopic investigation of iron(III) cysteamine dioxygenase in the presence of substrate (analog): implications for the nature of substrate-bound reaction intermediates. <i>Journal of Biological Inorganic Chemistry</i> , <b>2021</b> , 26, 947-955	3.7	1
7	Toluene 4-Monooxygenase Reaction Intermediates <b>2020</b> , 1-11		
6	Iron Cofactors: Nonhaem <b>2015</b> , 1-8		
5	Structural Proteomics99-128		
4	Assignment of <sup>1</sup> H, <sup>13</sup> C and <sup>15</sup> N NMR signals from toluene 4-monooxygenase Rieske ferredoxin in its oxidized state. <i>Journal of Biomolecular NMR</i> , <b>2001</b> , 21, 73-4	3	
3	Functional characterization of three GH10 xylanases. <i>FASEB Journal</i> , <b>2017</b> , 31, 607.1	0.9	
2	PreDSLpmo: A neural network-based prediction tool for functional annotation of lytic polysaccharide monooxygenases. <i>Journal of Biotechnology</i> , <b>2020</b> , 308, 148-155	3.7	

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