Ivan Rayment

List of Publications by Year in Descending Order

Source: https://exaly.com/author-pdf/2050155/ivan-rayment-publications-by-year.pdf

Version: 2024-04-09

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.

61 106 185 12,412 h-index g-index citations papers 6.2 13,284 5.98 197 avg, IF L-index ext. citations ext. papers

#	Paper	IF	Citations
185	Yeast pericentrin/Spc110 contains multiple domains required for tethering the Eubulin complex to the centrosome. <i>Molecular Biology of the Cell</i> , 2020 , 31, 1437-1452	3.5	1
184	Structure and function of Spc42 coiled-coils in yeast centrosome assembly and duplication. <i>Molecular Biology of the Cell</i> , 2019 , 30, 1505-1522	3.5	6
183	Structural and functional analysis of an l-serine O-phosphate decarboxylase involved in norcobamide biosynthesis. <i>FEBS Letters</i> , 2019 , 593, 3040-3053	3.8	3
182	Kinesin-2 motors: Kinetics and biophysics. <i>Journal of Biological Chemistry</i> , 2018 , 293, 4510-4518	5.4	16
181	Homodimeric Kinesin-2 KIF3CC Promotes Microtubule Dynamics. <i>Biophysical Journal</i> , 2017 , 113, 1845-1	8 <u>5</u> .7j	11
180	Reversible swelling of SBMV is associated with reversible disordering. <i>Journal of Structural Biology</i> , 2017 , 200, 314-324	3.4	
179	Design considerations in coiled-coil fusion constructs for the structural determination of a problematic region of the human cardiac myosin rod. <i>Journal of Structural Biology</i> , 2017 , 200, 219-228	3.4	4
178	The molecular architecture of the yeast spindle pole body core determined by Bayesian integrative modeling. <i>Molecular Biology of the Cell</i> , 2017 , 28, 3298-3314	3.5	32
177	Determinants and Expansion of Specificity in a Trichothecene UDP-Glucosyltransferase from Oryza sativa. <i>Biochemistry</i> , 2017 , 56, 6585-6596	3.2	14
176	Functional characterization of a soluble NADPH-cytochrome P450 reductase from Fusarium graminearum. <i>Protein Expression and Purification</i> , 2017 , 138, 69-75	2	4
175	The PrpF protein of Shewanella oneidensis MR-1 catalyzes the isomerization of 2-methyl-cis-aconitate during the catabolism of propionate via the AcnD-dependent 2-methylcitric acid cycle. <i>PLoS ONE</i> , 2017 , 12, e0188130	3.7	8
174	Heterodimerization of Kinesin-2 KIF3AB Modulates Entry into the Processive Run. <i>Journal of Biological Chemistry</i> , 2016 , 291, 23248-23256	5.4	7
173	Family-specific Kinesin Structures Reveal Neck-linker Length Based on Initiation of the Coiled-coil. Journal of Biological Chemistry, 2016 , 291, 20372-86	5.4	12
172	Fast or Slow, Either Head Can Start the Processive Run of Kinesin-2 KIF3AC. <i>Journal of Biological Chemistry</i> , 2016 , 291, 4407-16	5.4	10
171	A composite approach towards a complete model of the myosin rod. <i>Proteins: Structure, Function and Bioinformatics</i> , 2016 , 84, 172-189	4.2	8
170	Crystal Structure of Os79 (Os04g0206600) from Oryza sativa: A UDP-glucosyltransferase Involved in the Detoxification of Deoxynivalenol. <i>Biochemistry</i> , 2016 , 55, 6175-6186	3.2	32
169	Skip residues modulate the structural properties of the myosin rod and guide thick filament assembly. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2015 , 112, E3806-15	11.5	34

(2012-2015)

168	Kinesin-2 KIF3AC and KIF3AB Can Drive Long-Range Transport along Microtubules. <i>Biophysical Journal</i> , 2015 , 109, 1472-82)	21	
167	Biochemical Characterization of a Recombinant UDP-glucosyltransferase from Rice and Enzymatic Production of Deoxynivalenol-3-O-ED-glucoside. <i>Toxins</i> , 2015 , 7, 2685-700)	28	
166	Structural insights into the assembly of a monomeric class V myosin. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2014 , 111, 4351-2	.5	2	
165	Dissecting cobamide diversity through structural and functional analyses of the base-activating CobT enzyme of Salmonella enterica. <i>Biochimica Et Biophysica Acta - General Subjects</i> , 2014 , 1840, 464-75 ⁴		14	
164	Insights into the specificity of lysine acetyltransferases. <i>Journal of Biological Chemistry</i> , 2014 , 289, 36249 5 6	2	12	
163	Kinesin-2 KIF3AB exhibits novel ATPase characteristics. <i>Journal of Biological Chemistry</i> , 2014 , 289, 27836	β	15	
162	Diffraction and Scattering by X-Rays and Neutrons 2013 , 91-112			
161	Molecular Biophysics for the Life Sciences 2013 ,		1	
160	Common mechanistic themes for the powerstroke of kinesin-14 motors. <i>Journal of Structural Biology</i> , 2013 , 184, 335-44	ļ	5	
159	Functional asymmetry in kinesin and dynein dimers. <i>Biology of the Cell</i> , 2013 , 105, 1-13	;	12	
158	Structural organization of FtsB, a transmembrane protein of the bacterial divisome. <i>Biochemistry</i> , 2013 , 52, 2574-85	!	23	
157	Kar3Vik1 uses a minus-end directed powerstroke for movement along microtubules. <i>PLoS ONE</i> , 2013 , 8, e53792	,	6	
156	Structural, Physical, and Chemical Principles 2013 , 17-30			
155	Structural insights into the mechanism of four-coordinate Cob(II)alamin formation in the active site of the Salmonella enterica ATP:Co(I)rrinoid adenosyltransferase enzyme: critical role of residues 3.2 Phe91 and Trp93. <i>Biochemistry</i> , 2012 , 51, 9647-57	:	25	
154	Structural insights into the substrate specificity of the Rhodopseudomonas palustris protein acetyltransferase RpPat: identification of a loop critical for recognition by RpPat. <i>Journal of Biological Chemistry</i> , 2012 , 287, 41392-404	ļ-	12	
153	Structural insights into the function of the nicotinate mononucleotide:phenol/p-cresol phosphoribosyltransferase (ArsAB) enzyme from Sporomusa ovata. <i>Biochemistry</i> , 2012 , 51, 8571-82	!	12	
152	Kar3Vik1, a member of the kinesin-14 superfamily, shows a novel kinesin microtubule binding pattern. <i>Journal of Cell Biology</i> , 2012 , 197, 957-70	3	25	
151	The ATPase pathway that drives the kinesin-14 Kar3Vik1 powerstroke. <i>Journal of Biological Chemistry</i> , 2012 , 287, 36673-82	ļ	16	

150	Structure-guided expansion of the substrate range of methylmalonyl coenzyme A synthetase (MatB) of Rhodopseudomonas palustris. <i>Applied and Environmental Microbiology</i> , 2012 , 78, 6619-29	4.8	27
149	Structure and mutational analysis of the archaeal GTP:AdoCbi-P guanylyltransferase (CobY) from Methanocaldococcus jannaschii: insights into GTP binding and dimerization. <i>Biochemistry</i> , 2011 , 50, 530)1 ² 1 ² 3	5
148	Kinesin Kar3Cik1 ATPase pathway for microtubule cross-linking. <i>Journal of Biological Chemistry</i> , 2011 , 286, 29261-29272	5.4	18
147	Structure-function analysis of the C-terminal domain of CNM67, a core component of the Saccharomyces cerevisiae spindle pole body. <i>Journal of Biological Chemistry</i> , 2011 , 286, 18240-50	5.4	21
146	Bioprospecting for trichothecene 3-O-acetyltransferases in the fungal genus Fusarium yields functional enzymes with different abilities to modify the mycotoxin deoxynivalenol. <i>Applied and Environmental Microbiology</i> , 2011 , 77, 1162-70	4.8	29
145	Structure of the tropomyosin overlap complex from chicken smooth muscle: insight into the diversity of N-terminal recognition. <i>Biochemistry</i> , 2010 , 49, 4908-20	3.2	58
144	Insights into the importance of hydrogen bonding in the gamma-phosphate binding pocket of myosin: structural and functional studies of serine 236. <i>Biochemistry</i> , 2010 , 49, 4897-907	3.2	13
143	Cryo-electron tomography of microtubule-kinesin motor complexes. <i>Journal of Structural Biology</i> , 2010 , 170, 257-65	3.4	38
142	Structural and functional characterization of TRI3 trichothecene 15-O-acetyltransferase from Fusarium sporotrichioides. <i>Protein Science</i> , 2009 , 18, 747-61	6.3	27
141	Residue Phe112 of the human-type corrinoid adenosyltransferase (PduO) enzyme of Lactobacillus reuteri is critical to the formation of the four-coordinate Co(II) corrinoid substrate and to the activity of the enzyme. <i>Biochemistry</i> , 2009 , 48, 3138-45	3.2	30
140	Construction and use of new cloning vectors for the rapid isolation of recombinant proteins from Escherichia coli. <i>Plasmid</i> , 2008 , 59, 231-7	3.3	107
139	Actin-binding cleft closure in myosin II probed by site-directed spin labeling and pulsed EPR. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008 , 105, 12867-72	11.5	41
138	Structure, mechanism and regulation of pyruvate carboxylase. <i>Biochemical Journal</i> , 2008 , 413, 369-87	3.8	299
137	The small molecule tool (S)-(-)-blebbistatin: novel insights of relevance to myosin inhibitor design. <i>Organic and Biomolecular Chemistry</i> , 2008 , 6, 2076-84	3.9	29
136	Structural characterization of a human-type corrinoid adenosyltransferase confirms that coenzyme B12 is synthesized through a four-coordinate intermediate. <i>Biochemistry</i> , 2008 , 47, 5755-66	3.2	48
135	Structural and functional characterization of the TRI101 trichothecene 3-O-acetyltransferase from Fusarium sporotrichioides and Fusarium graminearum: kinetic insights to combating Fusarium head blight. <i>Journal of Biological Chemistry</i> , 2008 , 283, 1660-1669	5.4	71
134	Phosphate coordination and movement of DNA in the Tn5 synaptic complex: role of the (R)YREK motif. <i>Nucleic Acids Research</i> , 2008 , 36, 5855-62	20.1	18
133	Structural and functional analyses of the human-type corrinoid adenosyltransferase (PduO) from Lactobacillus reuteri. <i>Biochemistry</i> , 2007 , 46, 13829-36	3.2	29

(2004-2007)

132	The three-dimensional crystal structure of the PrpF protein of Shewanella oneidensis complexed with trans-aconitate: insights into its biological function. <i>Protein Science</i> , 2007 , 16, 1274-84	6.3	18
131	Structural characterization of the active site of the PduO-type ATP:Co(I)rrinoid adenosyltransferase from Lactobacillus reuteri. <i>Journal of Biological Chemistry</i> , 2007 , 282, 2596-605	5.4	53
130	Vik1 modulates microtubule-Kar3 interactions through a motor domain that lacks an active site. <i>Cell</i> , 2007 , 128, 1161-72	56.2	72
129	A structural basis for regulation of actin polymerization by pectenotoxins. <i>Journal of Molecular Biology</i> , 2007 , 371, 959-70	6.5	58
128	Domain architecture of pyruvate carboxylase, a biotin-dependent multifunctional enzyme. <i>Science</i> , 2007 , 317, 1076-9	33.3	106
127	Actin-targeting natural products: structures, properties and mechanisms of action. <i>Cellular and Molecular Life Sciences</i> , 2006 , 63, 2119-34	10.3	160
126	Crystal structure of polymerization-competent actin. <i>Journal of Molecular Biology</i> , 2006 , 362, 140-50	6.5	38
125	X-ray structure of putative acyl-ACP desaturase DesA2 from Mycobacterium tuberculosis H37Rv. <i>Protein Science</i> , 2005 , 14, 1508-17	6.3	30
124	Evolution of enzymatic activities in the orotidine 5Rmonophosphate decarboxylase suprafamily: enhancing the promiscuous D-arabino-hex-3-ulose 6-phosphate synthase reaction catalyzed by 3-keto-L-gulonate 6-phosphate decarboxylase. <i>Biochemistry</i> , 2005 , 44, 1807-15	3.2	41
123	Evolution of enzymatic activities in the orotidine 5Rmonophosphate decarboxylase suprafamily: structural basis for catalytic promiscuity in wild-type and designed mutants of 3-keto-L-gulonate 6-phosphate decarboxylase. <i>Biochemistry</i> , 2005 , 44, 1816-23	3.2	27
122	Divergent evolution in the enolase superfamily: the interplay of mechanism and specificity. <i>Archives of Biochemistry and Biophysics</i> , 2005 , 433, 59-70	4.1	174
121	Structural basis of swinholide A binding to actin. <i>Chemistry and Biology</i> , 2005 , 12, 287-91		58
120	The structural basis of blebbistatin inhibition and specificity for myosin II. <i>Nature Structural and Molecular Biology</i> , 2005 , 12, 378-9	17.6	228
119	Structures of microfilament destabilizing toxins bound to actin provide insight into toxin design and activity. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2005 , 102, 14527-32	11.5	80
118	Structural and functional analysis of tetracenomycin F2 cyclase from Streptomyces glaucescens. A type II polyketide cyclase. <i>Journal of Biological Chemistry</i> , 2004 , 279, 37956-63	5.4	42
117	Structure/function insights into Tn5 transposition. Current Opinion in Structural Biology, 2004, 14, 50-7	8.1	76
116	Crystal structure of gene locus At3g16990 from Arabidopsis thaliana. <i>Proteins: Structure, Function and Bioinformatics</i> , 2004 , 57, 221-2	4.2	4
115	Structure of D-ribulose 5-phosphate 3-epimerase from Synechocystis to 1.6 A resolution. <i>Acta Crystallographica Section D: Biological Crystallography</i> , 2004 , 60, 1687-90		9

114	Absolute stereochemistry of ulapualide A. <i>Organic Letters</i> , 2004 , 6, 597-9	6.2	45
113	Evolution of enzymatic activity in the enolase superfamily: functional studies of the promiscuous o-succinylbenzoate synthase from Amycolatopsis. <i>Biochemistry</i> , 2004 , 43, 224-9	3.2	61
112	Evolution of enzymatic activities in the enolase superfamily: structure of a substrate-liganded complex of the L-Ala-D/L-Glu epimerase from Bacillus subtilis. <i>Biochemistry</i> , 2004 , 43, 10370-8	3.2	25
111	Evolution of enzymatic activities in the orotidine 5Rmonophosphate decarboxylase suprafamily: mechanistic evidence for a proton relay system in the active site of 3-keto-L-gulonate 6-phosphate decarboxylase. <i>Biochemistry</i> , 2004 , 43, 6427-37	3.2	22
110	Evolution of enzymatic activity in the enolase superfamily: structural studies of the promiscuous o-succinylbenzoate synthase from Amycolatopsis. <i>Biochemistry</i> , 2004 , 43, 5716-27	3.2	43
109	Evolution of enzymatic activities in the orotidine 5Rmonophosphate decarboxylase suprafamily: crystallographic evidence for a proton relay system in the active site of 3-keto-L-gulonate 6-phosphate decarboxylase. <i>Biochemistry</i> , 2004 , 43, 6438-46	3.2	15
108	Understanding the importance of protein structure to natureß routes for divergent evolution in TIM barrel enzymes. <i>Accounts of Chemical Research</i> , 2004 , 37, 149-58	24.3	37
107	Molecular dynamics analysis of structural factors influencing back door pi release in myosin. <i>Biophysical Journal</i> , 2004 , 86, 3794-803	2.9	48
106	The structural determination of an insect sterol carrier protein-2 with a ligand-bound C16 fatty acid at 1.35-A resolution. <i>Journal of Biological Chemistry</i> , 2003 , 278, 39085-91	5.4	69
105	The structural determination of phosphosulfolactate synthase from Methanococcus jannaschii at 1.7-A resolution: an enolase that is not an enolase. <i>Journal of Biological Chemistry</i> , 2003 , 278, 45858-63	5.4	13
104	Biomolecular mimicry in the actin cytoskeleton: mechanisms underlying the cytotoxicity of kabiramide C and related macrolides. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2003 , 100, 13851-6	11.5	78
103	Project management system for structural and functional proteomics: Sesame. <i>Journal of Structural and Functional Genomics</i> , 2003 , 4, 11-23		80
102	Trisoxazole macrolide toxins mimic the binding of actin-capping proteins to actin. <i>Nature Structural and Molecular Biology</i> , 2003 , 10, 1058-63	17.6	134
101	Evolution of enzymatic activity in the enolase superfamily: structural and mutagenic studies of the mechanism of the reaction catalyzed by o-succinylbenzoate synthase from Escherichia coli. <i>Biochemistry</i> , 2003 , 42, 14427-33	3.2	25
100	Structural evidence for a 1,2-enediolate intermediate in the reaction catalyzed by 3-keto-L-gulonate 6-phosphate decarboxylase, a member of the orotidine 5Rmonophosphate decarboxylase suprafamily. <i>Biochemistry</i> , 2003 , 42, 12133-42	3.2	13
99	Structure and function of enzymes of the Leloir pathway for galactose metabolism. <i>Journal of Biological Chemistry</i> , 2003 , 278, 43885-8	5.4	342
98	The three-dimensional structure of the core domain of Naf Y from Azotobacter vinelandii determined at 1.8-A resolution. <i>Journal of Biological Chemistry</i> , 2003 , 278, 32150-6	5.4	20
97	Protein Structure 2003 , 191-218		1

(2000-2002)

96	Small-scale batch crystallization of proteins revisited: an underutilized way to grow large protein crystals. <i>Structure</i> , 2002 , 10, 147-51	5.2	51
95	Pentaerythritol propoxylate: a new crystallization agent and cryoprotectant induces crystal growth of 2-methylcitrate dehydratase. <i>Acta Crystallographica Section D: Biological Crystallography</i> , 2002 , 58, 306-9		23
94	Two-metal active site binding of a Tn5 transposase synaptic complex. <i>Nature Structural Biology</i> , 2002 , 9, 278-81		67
93	The ATP:Co(I)rrinoid adenosyltransferase (CobA) enzyme of Salmonella enterica requires the 2ROH group of ATP for function and yields inorganic triphosphate as its reaction byproduct. <i>Journal of Biological Chemistry</i> , 2002 , 277, 33127-31	5.4	28
92	Capture of a labile substrate by expulsion of water molecules from the active site of nicotinate mononucleotide:5,6-dimethylbenzimidazole phosphoribosyltransferase (CobT) from Salmonella enterica. <i>Journal of Biological Chemistry</i> , 2002 , 277, 41120-7	5.4	19
91	Three-dimensional structure of the L-threonine-O-3-phosphate decarboxylase (CobD) enzyme from Salmonella enterica. <i>Biochemistry</i> , 2002 , 41, 4798-808	3.2	23
90	Structural studies of the L-threonine-O-3-phosphate decarboxylase (CobD) enzyme from Salmonella enterica: the apo, substrate, and product-aldimine complexes. <i>Biochemistry</i> , 2002 , 41, 9079-	8 ³ 9 ²	22
89	Homologous (beta/alpha)8-barrel enzymes that catalyze unrelated reactions: orotidine 5Rmonophosphate decarboxylase and 3-keto-L-gulonate 6-phosphate decarboxylase. <i>Biochemistry</i> , 2002 , 41, 3861-9	3.2	61
88	Evidence for "unseen" transposaseDNA contacts. <i>Journal of Molecular Biology</i> , 2002 , 322, 971-82	6.5	19
87	Structural investigation of the biosynthesis of alternative lower ligands for cobamides by nicotinate mononucleotide: 5,6-dimethylbenzimidazole phosphoribosyltransferase from Salmonella enterica. <i>Journal of Biological Chemistry</i> , 2001 , 276, 37612-20	5.4	33
86	Evolution of enzymatic activities in the enolase superfamily: crystal structures of the L-Ala-D/L-Glu epimerases from Escherichia coli and Bacillus subtilis. <i>Biochemistry</i> , 2001 , 40, 15716-24	3.2	33
85	Three-dimensional structure of ATP:corrinoid adenosyltransferase from Salmonella typhimurium in its free state, complexed with MgATP, or complexed with hydroxycobalamin and MgATP. <i>Biochemistry</i> , 2001 , 40, 361-74	3.2	63
84	Evolution of enzymatic activities in the enolase superfamily: identification of the general acid catalyst in the active site of D-glucarate dehydratase from Escherichia coli. <i>Biochemistry</i> , 2001 , 40, 1005	4 2 -62	25
83	X-ray structures of the apo and MgATP-bound states of Dictyostelium discoideum myosin motor domain. <i>Journal of Biological Chemistry</i> , 2000 , 275, 38494-9	5.4	105
82	Analysis of the adenosylcobinamide kinase/adenosylcobinamide-phosphate guanylyltransferase (CobU) enzyme of Salmonella typhimurium LT2. Identification of residue His-46 as the site of guanylylation. <i>Journal of Biological Chemistry</i> , 2000 , 275, 27576-86	5.4	24
81	X-ray structures of the Dictyostelium discoideum myosin motor domain with six non-nucleotide analogs. <i>Journal of Biological Chemistry</i> , 2000 , 275, 398-408	5.4	40
80	Three-dimensional structure of the Tn5 synaptic complex transposition intermediate. <i>Science</i> , 2000 , 289, 77-85	33.3	329
79	Evolution of enzymatic activities in the enolase superfamily: crystallographic and mutagenesis studies of the reaction catalyzed by D-glucarate dehydratase from Escherichia coli. <i>Biochemistry</i> , 2000 , 39, 4590-602	3.2	43

78	Evolution of enzymatic activity in the enolase superfamily: structure of o-succinylbenzoate synthase from Escherichia coli in complex with Mg2+ and o-succinylbenzoate. <i>Biochemistry</i> , 2000 , 39, 10662-76	3.2	66
77	Three-dimensional structure of escherichia coli asparagine synthetase B: A short journey from substrate to product. <i>Biochemistry</i> , 2000 , 39, 7330	3.2	5
76	The three-dimensional structure of a Tn5 transposase-related protein determined to 2.9-A resolution. <i>Journal of Biological Chemistry</i> , 1999 , 274, 11904-13	5.4	65
75	The structure of carbamoyl phosphate synthetase determined to 2.1 A resolution. <i>Acta Crystallographica Section D: Biological Crystallography</i> , 1999 , 55, 8-24		66
74	Channel gate! Tension, leak and disclosure. <i>Structure</i> , 1999 , 7, R99-103	5.2	41
73	Three-dimensional structure of Escherichia coli asparagine synthetase B: a short journey from substrate to product. <i>Biochemistry</i> , 1999 , 38, 16146-57	3.2	163
72	The three-dimensional structures of nicotinate mononucleotide:5,6- dimethylbenzimidazole phosphoribosyltransferase (CobT) from Salmonella typhimurium complexed with 5,6-dimethybenzimidazole and its reaction products determined to 1.9 A resolution. <i>Biochemistry</i> ,	3.2	34
71	Three-dimensional structure of adenosylcobinamide kinase/adenosylcobinamide phosphate guanylyltransferase (CobU) complexed with GMP: evidence for a substrate-induced transferase active site. <i>Biochemistry</i> , 1999 , 38, 12995-3005	3.2	27
70	Tn5: A molecular window on transposition. <i>Biochemical and Biophysical Research Communications</i> , 1999 , 266, 729-34	3.4	49
69	Evolution of enzymatic activities in the enolase superfamily: crystal structure of (D)-glucarate dehydratase from Pseudomonas putida. <i>Biochemistry</i> , 1998 , 37, 14358-68	3.2	34
68	X-ray crystal structure of the yeast Kar3 motor domain complexed with Mg.ADP to 2.3 A resolution. <i>Biochemistry</i> , 1998 , 37, 1769-76	3.2	91
67	Three-dimensional structure of adenosylcobinamide kinase/adenosylcobinamide phosphate guanylyltransferase from Salmonella typhimurium determined to 2.3 A resolution,. <i>Biochemistry</i> , 1998 , 37, 7686-95	3.2	36
66	Structure of the bis(Mg2+)-ATP-oxalate complex of the rabbit muscle pyruvate kinase at 2.1 A resolution: ATP binding over a barrel. <i>Biochemistry</i> , 1998 , 37, 6247-55	3.2	116
65	[12] Reductive alkylation of lysine residues to alter crystallization properties of proteins. <i>Methods in Enzymology</i> , 1997 , 276, 171-179	1.7	109
64	Structure of carbamoyl phosphate synthetase: a journey of 96 A from substrate to product. <i>Biochemistry</i> , 1997 , 36, 6305-16	3.2	302
63	Structural analysis of the H166G site-directed mutant of galactose-1-phosphate uridylyltransferase complexed with either UDP-glucose or UDP-galactose: detailed description of the nucleotide sugar binding site. <i>Biochemistry</i> , 1997 , 36, 1212-22	3.2	57
62	X-ray structures of the MgADP, MgATPgammaS, and MgAMPPNP complexes of the Dictyostelium discoideum myosin motor domain. <i>Biochemistry</i> , 1997 , 36, 11619-28	3.2	188
61	Ligand-induced domain movement in pyruvate kinase: structure of the enzyme from rabbit muscle with Mg2+, K+, and L-phospholactate at 2.7 A resolution. <i>Archives of Biochemistry and Biophysics</i> , 1997 . 345, 199-206	4.1	74

(1995-1997)

60	X-ray crystal structure and solution fluorescence characterization of Mg.2R3P-O-(N-methylanthraniloyl) nucleotides bound to the Dictyostelium discoideum myosin motor domain. <i>Journal of Molecular Biology</i> , 1997 , 274, 394-407	6.5	48
59	Structure of the beta 2 homodimer of bacterial luciferase from Vibrio harveyi: X-ray analysis of a kinetic protein folding trap. <i>Protein Science</i> , 1997 , 6, 13-23	6.3	24
58	Structural studies on myosin II: communication between distant protein domains. <i>BioEssays</i> , 1997 , 19, 561-9	4.1	45
57	A carboxylate oxygen of the substrate bridges the magnesium ions at the active site of enolase: structure of the yeast enzyme complexed with the equilibrium mixture of 2-phosphoglycerate and phosphoenolpyruvate at 1.8 A resolution. <i>Biochemistry</i> , 1996 , 35, 4349-58	3.2	136
56	X-ray structure of the magnesium(II).ADP.vanadate complex of the Dictyostelium discoideum myosin motor domain to 1.9 A resolution. <i>Biochemistry</i> , 1996 , 35, 5404-17	3.2	504
55	The enolase superfamily: a general strategy for enzyme-catalyzed abstraction of the alpha-protons of carboxylic acids. <i>Biochemistry</i> , 1996 , 35, 16489-501	3.2	301
54	The structure of nucleotidylated histidine-166 of galactose-1-phosphate uridylyltransferase provides insight into phosphoryl group transfer. <i>Biochemistry</i> , 1996 , 35, 11560-9	3.2	76
53	Structural and mechanistic studies of enolase. Current Opinion in Structural Biology, 1996, 6, 736-43	8.1	71
52	The 1.5-A resolution crystal structure of bacterial luciferase in low salt conditions. <i>Journal of Biological Chemistry</i> , 1996 , 271, 21956-68	5.4	99
51	Kinesin and myosin: molecular motors with similar engines. <i>Structure</i> , 1996 , 4, 501-4	5.2	30
50	Kinesin and myosin: molecular motors with similar engines. <i>Structure</i> , 1996 , 4, 501-4 Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> , 1996 , 4, 969-87	5.2 5.2	30 201
	Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> ,		
50	Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> , 1996 , 4, 969-87 Mutations in either the essential or regulatory light chains of myosin are associated with a rare	5.2	201
50	Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> , 1996 , 4, 969-87 Mutations in either the essential or regulatory light chains of myosin are associated with a rare myopathy in human heart and skeletal muscle. <i>Nature Genetics</i> , 1996 , 13, 63-9	5.2 36.3	201
50 49 48	Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> , 1996 , 4, 969-87 Mutations in either the essential or regulatory light chains of myosin are associated with a rare myopathy in human heart and skeletal muscle. <i>Nature Genetics</i> , 1996 , 13, 63-9 The structural basis of the myosin ATPase activity. <i>Journal of Biological Chemistry</i> , 1996 , 271, 15850-3 Three-dimensional structure of galactose-1-phosphate uridylyltransferase from Escherichia coli at	5.2 36.3 5.4	201 502 104
50 49 48 47	Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> , 1996 , 4, 969-87 Mutations in either the essential or regulatory light chains of myosin are associated with a rare myopathy in human heart and skeletal muscle. <i>Nature Genetics</i> , 1996 , 13, 63-9 The structural basis of the myosin ATPase activity. <i>Journal of Biological Chemistry</i> , 1996 , 271, 15850-3 Three-dimensional structure of galactose-1-phosphate uridylyltransferase from Escherichia coli at 1.8 A resolution. <i>Biochemistry</i> , 1995 , 34, 11049-61 X-ray structure of the magnesium(II)-pyrophosphate complex of the truncated head of	5.2 36.3 5.4 3.2	20150210486
50 49 48 47 46	Conservation within the myosin motor domain: implications for structure and function. <i>Structure</i> , 1996, 4, 969-87 Mutations in either the essential or regulatory light chains of myosin are associated with a rare myopathy in human heart and skeletal muscle. <i>Nature Genetics</i> , 1996, 13, 63-9 The structural basis of the myosin ATPase activity. <i>Journal of Biological Chemistry</i> , 1996, 271, 15850-3 Three-dimensional structure of galactose-1-phosphate uridylyltransferase from Escherichia coli at 1.8 A resolution. <i>Biochemistry</i> , 1995, 34, 11049-61 X-ray structure of the magnesium(II)-pyrophosphate complex of the truncated head of Dictyostelium discoideum myosin to 2.7 A resolution. <i>Biochemistry</i> , 1995, 34, 8973-81 X-ray structures of the myosin motor domain of Dictyostelium discoideum complexed with	5.2 36.3 5.4 3.2	201 502 104 86 88

42	Galactose-1-phosphate uridylyltransferase from Escherichia coli, a zinc and iron metalloenzyme. <i>Biochemistry</i> , 1995 , 34, 5610-7	3.2	29
41	Three-dimensional structure of bacterial luciferase from Vibrio harveyi at 2.4 A resolution. <i>Biochemistry</i> , 1995 , 34, 6581-6	3.2	102
40	The three-dimensional structure of a molecular motor. <i>Trends in Biochemical Sciences</i> , 1994 , 19, 129-34	10.3	77
39	Structure of rabbit muscle pyruvate kinase complexed with Mn2+, K+, and pyruvate. <i>Biochemistry</i> , 1994 , 33, 6301-9	3.2	205
38	Preliminary X-ray crystallographic analysis of biotin carboxylase isolated from Escherichia coli. <i>Journal of Molecular Biology</i> , 1994 , 235, 367-9	6.5	1
37	Chelation of serine 39 to Mg2+ latches a gate at the active site of enolase: structure of the bis(Mg2+) complex of yeast enolase and the intermediate analog phosphonoacetohydroxamate at 2.1-A resolution. <i>Biochemistry</i> , 1994 , 33, 9333-42	3.2	106
36	Three-dimensional structure of the muscle fatty-acid-binding protein isolated from the desert locust Schistocerca gregaria. <i>Biochemistry</i> , 1994 , 33, 12378-85	3.2	52
35	Three-dimensional structure of the biotin carboxylase subunit of acetyl-CoA carboxylase. <i>Biochemistry</i> , 1994 , 33, 10249-56	3.2	185
34	Molecular structure of the oxidized high-potential iron-sulfur protein isolated from Ectothiorhodospira vacuolata. <i>Biochemistry</i> , 1994 , 33, 2476-83	3.2	64
33	Molecular structure of kanamycin nucleotidyltransferase determined to 3.0-A resolution. <i>Biochemistry</i> , 1993 , 32, 11977-84	3.2	89
32	Structural consequences of reductive methylation of lysine residues in hen egg white lysozyme: an X-ray analysis at 1.8-A resolution. <i>Biochemistry</i> , 1993 , 32, 9851-8	3.2	111
31	Molecular structure of the oxidized, recombinant, heterocyst [2Fe-2S] ferredoxin from Anabaena 7120 determined to 1.7-A resolution. <i>Biochemistry</i> , 1993 , 32, 6788-93	3.2	89
30	Kinetic characterization of reductively methylated myosin subfragment 1. <i>Biochemistry</i> , 1993 , 32, 9859-	6552	39
29	Myosin subfragment-1: structure and function of a molecular motor. <i>Current Opinion in Structural Biology</i> , 1993 , 3, 944-952	8.1	20
28	Three-dimensional atomic model of F-actin decorated with Dictyostelium myosin S1. <i>Nature</i> , 1993 , 364, 171-4	50.4	292
27	Crystallization and preliminary crystallographic analysis of a thermostable mutant of kanamycin nucleotidyltransferase. <i>Archives of Biochemistry and Biophysics</i> , 1992 , 295, 1-4	4.1	3
26	X-ray structure determination of telokin, the C-terminal domain of myosin light chain kinase, at 2.8 A resolution. <i>Journal of Molecular Biology</i> , 1992 , 227, 840-51	6.5	143
25	Three-dimensional structure of the high-potential iron-sulfur protein isolated from the purple phototrophic bacterium Rhodocyclus tenuis determined and refined at 1.5 A resolution. <i>Journal of Molecular Biology</i> , 1992 , 228, 672-86	6.5	95

24	The molecular structure of UDP-galactose 4-epimerase from Escherichia coli determined at 2.5 A resolution. <i>Proteins: Structure, Function and Bioinformatics</i> , 1992 , 12, 372-81	4.2	92
23	Inside polyomavirus at 25-A resolution. <i>Nature</i> , 1992 , 355, 652-4	50.4	94
22	The isolation, purification, and preliminary crystallographic characterization of UDP-galactose-4-epimerase from Escherichia coli. <i>Proteins: Structure, Function and Bioinformatics</i> , 1991 , 9, 135-42	4.2	15
21	Crystallization and preliminary analysis of enzyme-substrate complexes of pyruvate kinase from rabbit muscle. <i>Proteins: Structure, Function and Bioinformatics</i> , 1991 , 11, 153-7	4.2	7
20	Crystallization and preliminary analysis of telokin, the C-terminal domain of myosin light chain kinase. <i>Journal of Molecular Biology</i> , 1991 , 217, 621-3	6.5	3
19	Molecular structure of an apolipoprotein determined at 2.5-A resolution. <i>Biochemistry</i> , 1991 , 30, 603-8	3.2	251
18	Two-dimensional magnetization exchange spectroscopy of Anabaena 7120 ferredoxin. Nuclear Overhauser effect and electron self-exchange cross peaks from amino acid residues surrounding the 2Fe-2S* cluster. <i>Biochemistry</i> , 1991 , 30, 7363-8	3.2	48
17	Crystallization and structure determination to 2.5-A resolution of the oxidized [2Fe-2S] ferredoxin isolated from Anabaena 7120. <i>Biochemistry</i> , 1991 , 30, 4126-31	3.2	178
16	Trimethyllead acetate: a first-choice heavy atom derivative for protein crystallography. <i>Archives of Biochemistry and Biophysics</i> , 1991 , 291, 187-94	4.1	18
15	Molecular structure of cytochrome c2 isolated from Rhodobacter capsulatus determined at 2.5 A resolution. <i>Journal of Molecular Biology</i> , 1991 , 220, 673-85	6.5	89
14	Chapter 20 Papovaviridae. Perspectives in Medical Virology, 1987, 3, 335-348		
13	Crystallization and preliminary analysis of crystals of cytochrome c2 from Rhodopseudomonas capsulata. <i>Journal of Molecular Biology</i> , 1987 , 195, 229-31	6.5	13
12	Diffraction methods for biological macromolecules. Treatment and manipulation of crystals. <i>Methods in Enzymology</i> , 1985 , 114, 136-40	1.7	7
11	A systematic method for aligning double-focusing mirrors. <i>Methods in Enzymology</i> , 1985 , 114, 316-29	1.7	10
10	Packing analysis of crystalline myosin subfragment-1. Implications for the size and shape of the myosin head. <i>Journal of Molecular Biology</i> , 1985 , 181, 487-501	6.5	61
9	A Description of the Techniques and Application of Molecular Replacement Used to Determine the Structure of Polyoma Virus Capsid at 22.5 [Resolution. <i>Acta Crystallographica Section B: Structural Science</i> , 1983 , 39, 505-516		9
8	Crystal structure of 2,2,4,4,6-pentafluoro-6-[N-(l,2,4,3,5-trithiadiazol-1-ylidene)amino]cyclotriphosphazene, S3N2NP3N3F5. <i>Journal of the Chemical Society Dalton Transactions</i> , 1982 , 883		4
7	Structure of southern bean mosaic virus at 2.8 A resolution. <i>Nature</i> , 1980 , 286, 33-9	50.4	386

6	The structure of southern bean mosaic virus at 5 A resolution. Virology, 1978, 85, 187-97	3.6	21
5	Crystalline cowpea chlorotic mottle virus. <i>Journal of Ultrastructure Research</i> , 1977 , 61, 240-2		5
4	Crystal structure of 2,4,6,8,9,10-hexamethyl-2,4,6,8,9,10-hexabora-adamantane. <i>Journal of the Chemical Society Dalton Transactions</i> , 1977 , 136		14
3	Reactions of tetrasulphur tetranitride with halides. Part VI. The preparation and structure of cyclopentathiazenium pentachloro(phosphoryl chloride)stannate(IV). <i>Journal of the Chemical Society Dalton Transactions</i> , 1976 , 928		13
2	The structure of southern bean mosaic virus at 22.5 a resolution. Virology, 1976, 75, 394-400	3.6	54
1	The structure of thiodithiazyl chlorodisulphate, S3N2S2O6Cl and its preparation from thiodithiazyl monochloride, S3N2Cl. <i>Inorganic and Nuclear Chemistry Letters</i> , 1974 , 10, 647-654		51