The Structure of the Potassium Channel: Molecular Bas

Science 280, 69-77 DOI: 10.1126/science.280.5360.69

Citation Report

#	Article	IF	CITATIONS
1	Formation of Ridges on Gd3Ga5O12by Ion-Beam Etching and Subsequent Phosphoric Acid Treatment Utilizing Tri-Layered Etching Mask. Japanese Journal of Applied Physics, 1992, 31, 3888-3894.	0.8	9
2	The Behaviour of Ions in Narrow Water-Filled Pores. Bioscience Reports, 1998, 18, 313-327.	1.1	1
3	Sodium Channel Fragments: Contributions to Voltage Sensitivity and Ion Selectivity. Bioscience Reports, 1998, 18, 279-286.	1.1	3
4	Synthetic Peptide Fragments as Probes for Structure Determination of Potassium Ion-Channel Proteins. Bioscience Reports, 1998, 18, 299-312.	1.1	10
5	Molecular determinants of KATP channel inhibition by ATP. EMBO Journal, 1998, 17, 3290-3296.	3.5	208
6	Mutations in the pore regions of the yeast K+ channel YKC1 affect gating by extracellular K+. EMBO Journal, 1998, 17, 7190-7198.	3.5	26
7	Pore stoichiometry of a voltage-gated chloride channel. Nature, 1998, 394, 687-690.	13.7	61
8	A specific monovalent metal ion integral to the AA platform of the RNA tetraloop receptor. Nature Structural Biology, 1998, 5, 986-992.	9.7	199
9	Ion-binding sites in NMDA receptors: classical approaches provide the numbers. Nature Neuroscience, 1998, 1, 433-434.	7.1	5
10	Interneurons and the ghost of the sea. Nature Neuroscience, 1998, 1, 434-436.	7.1	15
11	Non-pore lining amino acid side chains influence anion selectivity of the human CFTR Clâ^'channel expressed in mammalian cell lines. Journal of Physiology, 1998, 512, 1-16.	1.3	69
12	Modulation of ATP-gated non-selective cation channel (P2X1receptor) activation and desensitization by the actin cytoskeleton. Journal of Physiology, 1998, 510, 19-25.	1.3	32
13	The selectivity filter of a potassium channel, murine Kir2.1, investigated using scanning cysteine mutagenesis. Journal of Physiology, 1998, 511, 25-32.	1.3	32
14	At last, the structure of an ion-selective channel. Nature Structural Biology, 1998, 5, 342-344.	9.7	8
16	K+ channel gating mechanism proposed using EPR. Nature Structural Biology, 1998, 5, 418-420.	9.7	2
16 17	K+ channel gating mechanism proposed using EPR. Nature Structural Biology, 1998, 5, 418-420. Premonitions of ion channel gating. Nature Structural Biology, 1998, 5, 421-421.	9.7 9.7	2

ARTICLE IF CITATIONS # Two models of the influenza A M2 channel domain: verification by comparison. Folding & Design, 1998, 20 4.5 35 3, 443-448. Ion channels: A first view of K+ channels in atomic glory. Current Biology, 1998, 8, R450-R452. 1.8 Sugar transporters from bacteria, parasites and mammals: structure–activity relationships. Trends in 22 3.7 118 Biochemical Sciences, 1998, 23, 476-481. Single potassium ion seeks open channel for transmembrane travels: tales from the KcsA structure. 24 Structure, 1998, 6, 1221-1226. Peptide Nanotubes and Beyond. Chemistry - A European Journal, 1998, 4, 1367-1372. 26 1.7 247 The Crystal Structure of a Potassium Channel— A New Era in the Chemistry of Biological Signaling. Angewandte Chemie - International Edition, 1998, 37, 2329-2331. Evidence for a Multi-ion Pore Behavior in the Plant Potassium Channel KAT1. Journal of Membrane 28 1.0 32 Biology, 1998, 166, 91-100. Structure and Function of Voltage-Gated Ion Channels. Die Naturwissenschaften, 1998, 85, 437-444. 29 Chemical basis for alkali cation selectivity in potassium-channel proteins. Chemistry and Biology, 1998, 30 6.2 19 5, R291-R301. Potassium ion channels and human disease: phenotypes to drug targets?. Current Opinion in 3.3 Biotechnology, 1998, 9, 565-572. Carriers and channels: current progress and future prospects. Current Opinion in Chemical Biology, 32 2.8 18 1998, 2, 711-716. Ca2+ channel block and inactivation: common molecular determinants. Trends in Pharmacological Sciences, 1998, 19, 439-443. Membrane proteins Channels, pumps and charge separators. Current Opinion in Structural Biology, 34 2.6 5 1998, 8, 477-479. Recent advances in site-directed spin labeling of proteins. Current Opinion in Structural Biology, 1998, 2.6 568 8,649-656. An Ingenious Filter: the Structural Basis for Ion Channel Selectivity. Neuron, 1998, 20, 821-823. 36 3.8 10 A Novel Inward Rectifier K+ Channel with Unique Pore Properties. Neuron, 1998, 20, 995-1005. 38 Not So Funny Anymore. Neuron, 1998, 21, 5-7. 3.8 114 The Activation Gate of a Voltage-Gated K+ Channel Can Be Trapped in the Open State by an Intersubunit 3.8 194 Metal Bridge. Neuron, 1998, 21, 617-621.

#	Article	IF	CITATIONS
40	Biotinylation of Single Cysteine Mutants of the Glutamate Transporter GLT-1 from Rat Brain Reveals Its Unusual Topology. Neuron, 1998, 21, 623-632.	3.8	148
41	Crystal Clear Structure/Function Relationships for GluRs. Neuron, 1998, 21, 938-940.	3.8	0
42	Allosteric Receptors after 30 Years. Neuron, 1998, 21, 959-980.	3.8	424
43	A Reentrant Loop Domain in the Glutamate Carrier EAAT1 Participates in Substrate Binding and Translocation. Neuron, 1998, 21, 1487-1498.	3.8	110
44	The role of hydrophobic interactions in binding of polyamines to non NMDA receptor ion channels. Neuropharmacology, 1998, 37, 1381-1391.	2.0	24
45	Functional architectures of animal toxins: a clue to drug design?. Toxicon, 1998, 36, 1557-1572.	0.8	176
46	Identification of a Gene Encoding a Hyperpolarization-Activated Pacemaker Channel of Brain. Cell, 1998, 93, 717-729.	13.5	656
47	Transmembrane Signaling across the Ligand-Gated FhuA Receptor. Cell, 1998, 95, 771-778.	13.5	527
48	Single mutations strongly alter the K+ -selective pore of the Kin channel KAT1. FEBS Letters, 1998, 430, 370-376.	1.3	26
49	Simulation of the HIV-1 Vpu transmembrane domain as a pentameric bundle. FEBS Letters, 1998, 431, 143-148.	1.3	66
50	Intrinsic uncoupling of cytochromecoxidase may cause the maternally inherited mitochondrial diseases MELAS and LHON. FEBS Letters, 1998, 433, 93-97.	1.3	20
51	ATP binding site of P2X channel proteins: structural similarities with class II aminoacyl-tRNA synthetases. FEBS Letters, 1998, 434, 61-65.	1.3	42
52	The M2 channel of influenza A virus: a molecular dynamics study. FEBS Letters, 1998, 434, 265-271.	1.3	81
53	Probing pore topology and conformational changes of Kir2.1 potassium channels by cysteine scanning mutagenesis. FEBS Letters, 1998, 435, 69-73.	1.3	23
54	Escherichia coliSecA shape and dimensions. FEBS Letters, 1998, 436, 277-282.	1.3	46
55	Three-dimensional architecture and gating mechanism of a K+ channel studied by EPR spectroscopy. Nature Structural Biology, 1998, 5, 459-469.	9.7	282
56	Cation flux dependence on carbon chain length in hydraphile channels as assessed by dynamic 23Na NMR methods in phospholipid bilayers. Chemical Communications, 1998, , 2477-2478.	2.2	20
57	Solution Structure of Two New Toxins from the Venom of the Chinese ScorpionButhusmartensiKarsch Blockers of Potassium Channelsâ€,‡. Biochemistry, 1998, 37, 12412-12418.	1.2	31

	CITATION	CITATION REPORT	
#	Article	IF	Citations
58	A Novel High-Affinity Inhibitor for Inward-Rectifier K+Channelsâ€. Biochemistry, 1998, 37, 13291-13299.	1.2	207
59	Channel-Lining Residues in the M3 Membrane-Spanning Segment of the Cystic Fibrosis Transmembrane Conductance Regulatorâ€. Biochemistry, 1998, 37, 12233-12240.	1.2	39
60	A Snake Toxin Inhibitor of Inward Rectifier Potassium Channel ROMK1â€. Biochemistry, 1998, 37, 14867-14874.	1.2	49
61	The Preference Functions Method for Predicting Protein Helical Turns with Membrane Propensity. Journal of Chemical Information and Computer Sciences, 1998, 38, 575-585.	2.8	23
62	lonic channels in biological membranes- electrostatic analysis of a natural nanotube. Contemporary Physics, 1998, 39, 447-466.	0.8	83
63	Two-dimensional crystallization and projection structure of KcsA potassium channel 1 1Edited by W. Baumeister. Journal of Molecular Biology, 1998, 282, 211-216.	2.0	21
64	Modeling Nonlinear Red Cell Elasticity. Biophysical Journal, 1998, 75, 1141-1142.	0.2	8
65	Run, Don't Hop, through the Nearest Calcium Channel. Biophysical Journal, 1998, 75, 1142-1143.	0.2	4
66	Asymmetrical Contributions of Subunit Pore Regions to Ion Selectivity in an Inward Rectifier K+ Channel. Biophysical Journal, 1998, 75, 1330-1339.	0.2	22
67	Loss of Shaker K Channel Conductance in 0 K+ Solutions: Role of the Voltage Sensor. Biophysical Journal, 1998, 75, 1828-1835.	0.2	56
68	Dynamic Properties of Na+ Ions in Models of Ion Channels: A Molecular Dynamics Study. Biophysical Journal, 1998, 75, 2767-2782.	0.2	50
69	Noncontact Dipole Effects on Channel Permeation. I. Experiments with (5F-Indole)Trp13 Gramicidin A Channels. Biophysical Journal, 1998, 75, 2830-2844.	0.2	115
70	Molecular Dynamics Simulations of Ion Channels: How Far Have We Gone and Where Are We Heading?. Biophysical Journal, 1998, 74, 2744-2745.	0.2	12
71	Cells Use the Singular Properties of Different Channels to Produce Unique Electrical Songs. Biophysical Journal, 1998, 74, 2745-2746.	0.2	8
72	NEUROSCIENCE: The Vision of the Pore. Science, 1998, 280, 56-57.	6.0	27
73	Structural Conservation in Prokaryotic and Eukaryotic Potassium Channels. Science, 1998, 280, 106-109.	6.0	404
74	PLANT BIOLOGY: How Calcium Enhances Plant Salt Tolerance. Science, 1998, 280, 1906-1907.	6.0	118
75	Structure of the MscL Homolog from Mycobacterium tuberculosis: A Gated Mechanosensitive Ion Channel. Science, 1998, 282, 2220-2226.	6.0	975

#	Article	IF	CITATIONS
76	Bornâ^'Oppenheimer ab Initio QM/MM Dynamics Simulations of Na+and K+in Water:Â From Structure Making to Structure Breaking Effects. Journal of Physical Chemistry A, 1998, 102, 10340-10347.	1.1	218
77	Cylindrical β-Sheet Peptide Assemblies. Journal of the American Chemical Society, 1998, 120, 8949-8962.	6.6	178
78	Mutagenic Mapping of the Na-K-Cl Cotransporter for Domains Involved in Ion Transport and Bumetanide Binding. Journal of General Physiology, 1998, 112, 549-558.	0.9	82
79	Extracellular K + Dependence of Inward Rectification Kinetics in Human Left Ventricular Cardiomyocytes. Circulation, 1998, 98, 2753-2759.	1.6	20
80	Intermediate Conductances during Deactivation of Heteromultimeric Shaker Potassium Channels. Journal of General Physiology, 1998, 112, 457-474.	0.9	94
81	A Mutation in S6 of Shaker Potassium Channels Decreases the K+ Affinity of an Ion Binding Site Revealing Ion–Ion Interactions in the Pore. Journal of General Physiology, 1998, 112, 243-257.	0.9	60
82	Determination of transmembrane topology of an inward-rectifying potassium channel from Arabidopsis thaliana based on functional expression in Escherichia coli. Proceedings of the National Academy of Sciences of the United States of America, 1998, 95, 9773-9778.	3.3	87
83	Ion Discrimination in Proteins and DNA. , 1998, 281, 883a-883.		2
84	Shedding Light on Voltage-dependent Gating. Journal of General Physiology, 1998, 112, 373-376.	0.9	1
85	Permeation and Gating of an Inwardly Rectifying Potassium Channel. Journal of General Physiology, 1998, 112, 433-446.	0.9	47
86	Intermolecular Proton Transfer between Two Methylamine Molecules with an External Electric Field in the Gas Phase. Journal of Physical Chemistry A, 1998, 102, 7181-7190.	1.1	24
87	Identifying Swelling-activated Channels from Ion Selectivity Patterns. Journal of General Physiology, 1998, 112, 369-371.	0.9	11
88	Single-Channel Characteristics of Wild-Type IKs Channels and Channels formed with Two MinK Mutants that Cause Long QT Syndrome. Journal of General Physiology, 1998, 112, 651-663.	0.9	200
89	Identification of PKDL, a Novel Polycystic Kidney Disease 2-Like Gene Whose Murine Homologue Is Deleted in Mice with Kidney and Retinal Defects. Journal of Biological Chemistry, 1998, 273, 25967-25973.	1.6	143
90	MinK-KvLQT1 Fusion Proteins, Evidence for Multiple Stoichiometries of the Assembled I Channel. Journal of Biological Chemistry, 1998, 273, 34069-34074.	1.6	116
91	The CorA Mg2+ Transport Protein of Salmonella typhimurium. Journal of Biological Chemistry, 1998, 273, 28663-28669.	1.6	35
92	Coupled Ion Movement Underlies Rectification in an Inward-Rectifier K+ Channel. Journal of General Physiology, 1998, 112, 211-221.	0.9	96
93	Protein Rearrangements Underlying Slow Inactivation of the Shaker K+ Channel. Journal of General Physiology, 1998, 112, 377-389.	0.9	181

"			Circuration
#		IF	CITATIONS
94	Identification of Native Atrial G-protein-regulated Inwardly Rectifying K+ (GIRK4) Channel Homomultimers. Journal of Biological Chemistry, 1998, 273, 27499-27504.	1.6	89
95	Voltage-dependent Gating of Single Wild-Type and S4 Mutant KAT1 Inward Rectifier Potassium Channels. Journal of General Physiology, 1998, 112, 679-713.	0.9	39
96	Nonindependent K+ Movement through the Pore in IRK1 Potassium Channels. Journal of General Physiology, 1998, 112, 475-484.	0.9	32
97	Critical Amino Acid Residues in Transmembrane Span 7 of the Serotonin Transporter Identified by Random Mutagenesis. Journal of Biological Chemistry, 1998, 273, 28098-28106.	1.6	40
98	Block of the Kir2.1 Channel Pore by Alkylamine Analogues of Endogenous Polyamines. Journal of General Physiology, 1998, 112, 351-363.	0.9	49
99	The structure and organization within the membrane of the helices composing the pore-forming domain of Bacillus thuringiensis Â-endotoxin are consistent with an "umbrella-like" structure of the pore. Proceedings of the National Academy of Sciences of the United States of America, 1998, 95, 12289-12294.	3.3	161
100	Topology of the Region Surrounding Glu681 of Human AE1 Protein, the Erythrocyte Anion Exchanger. Journal of Biological Chemistry, 1998, 273, 22545-22553.	1.6	86
101	Functional Consequences of Mutations of Conserved, Polar Amino Acids in Transmembrane Sequences of the Ca2+ Release Channel (Ryanodine Receptor) of Rabbit Skeletal Muscle Sarcoplasmic Reticulum. Journal of Biological Chemistry, 1998, 273, 31867-31872.	1.6	62
102	ShK-Dap22, a Potent Kv1.3-specific Immunosuppressive Polypeptide. Journal of Biological Chemistry, 1998, 273, 32697-32707.	1.6	222
103	Functional Reconstitution of a Prokaryotic K+ Channel. Journal of General Physiology, 1998, 111, 741-749.	0.9	201
104	Structures of Membrane Proteins Determined at Atomic Resolution. Journal of Biochemistry, 1998, 124, 1051-1059.	0.9	40
105	Fourier transform infrared spectroscopy reveals a rigid Â-helical assembly for the tetrameric Streptomyces lividans K+ channel. Proceedings of the National Academy of Sciences of the United States of America, 1998, 95, 6114-6117.	3.3	83
106	Recnt advances on renal inward rectifier K+ channels. Current Opinion in Nephrology and Hypertension, 1998, 7, 503-508.	1.0	2
107	[34] Ion channels: Molecular modeling and simulation studies. Methods in Enzymology, 1998, 293, 647-693.	0.4	5
108	Secondary structure analysis of the putative membrane-associated domains of the inward rectifier K+ channel ROMK1. Biochemical Journal, 1998, 335, 375-380.	1.7	16
109	The Epithelial Inward Rectifier Channel Kir7.1 Displays Unusual K ⁺ Permeation Properties. Journal of Neuroscience, 1998, 18, 8625-8636.	1.7	139
110	Voltage dependent calcium channels in mammalian spermatozoa. Frontiers in Bioscience - Landmark, 1998, 3, d1220-1240.	3.0	69
111	Evidence for a Functional Interaction between Integrins and G Protein-activated Inward Rectifier K+ Channels. Journal of Biological Chemistry, 1998, 273, 34696-34702.	1.6	55

#	Article	IF	CITATIONS
112	Activity-Dependent Modulation of Glutamate Receptors by Polyamines. Journal of Neuroscience, 1998, 18, 8175-8185.	1.7	105
113	Cardiac Ionic Currents and Acute Ischemia: From Channels to Arrhythmias. Physiological Reviews, 1999, 79, 917-1017.	13.1	611
114	Ion Channels in Sperm Physiology. Physiological Reviews, 1999, 79, 481-510.	13.1	292
115	Cloning of Components of a Novel Subthreshold-Activating K ⁺ Channel with a Unique Pattern of Expression in the Cerebral Cortex. Journal of Neuroscience, 1999, 19, 10789-10802.	1.7	58
116	G Protein Regulation of Inwardly Rectifying K ⁺ Channels. Physiology, 1999, 14, 215-220.	1.6	14
117	Membrane phospholipid composition affects function of potassium channels from rabbit colon epithelium. American Journal of Physiology - Cell Physiology, 1999, 277, C83-C90.	2.1	26
118	Electrically silent potassium channel subunits from human lens epithelium. American Journal of Physiology - Cell Physiology, 1999, 277, C412-C424.	2.1	67
119	Kv3.1–Kv3.2 Channels Underlie a High-Voltage–Activating Component of the Delayed Rectifier K ⁺ Current in Projecting Neurons From the Globus Pallidus. Journal of Neurophysiology, 1999, 82, 1512-1528.	0.9	88
120	Residues in a Jellyfish Shaker-Like Channel Involved in Modulation by External Potassium. Journal of Neurophysiology, 1999, 82, 1740-1747.	0.9	3
121	Identification and properties of ATP-sensitive potassium channels in myocytes from rabbit Purkinje fibres. Cardiovascular Research, 1999, 44, 356-369.	1.8	24
122	Molecular Dynamics of the Sodium Channel Pore Vary with Gating: Interactions between P-Segment Motions and Inactivation. Journal of Neuroscience, 1999, 19, 1577-1585.	1.7	54
123	Voltage-Gated Ion Channels and Hereditary Disease. Physiological Reviews, 1999, 79, 1317-1372.	13.1	509
124	A Molecular Basis for the Different Local Anesthetic Affinities of Resting Versus Open and Inactivated States of the Sodium Channel. Molecular Pharmacology, 1999, 55, 134-141.	1.0	138
125	CFTR: Mechanism of Anion Conduction. Physiological Reviews, 1999, 79, S47-S75.	13.1	126
126	Toward the demolition of a computational quantum brain. , 1999, , 92-104.		37
127	Block of an ether-a-go-go-Like K ⁺ Channel by Imipramine Rescues <i>egl-2</i> Excitation Defects in <i>Caenorhabditis elegans</i> . Journal of Neuroscience, 1999, 19, 9831-9840.	1.7	71
128	Antiidiotypic Antibody Recognizes an Amiloride Binding Domain within the α Subunit of the Epithelial Na+ Channel. Journal of Biological Chemistry, 1999, 274, 9648-9655.	1.6	23
130	Structure and function of cardiac potassium channels. Cardiovascular Research, 1999, 42, 377-390.	1.8	174

ARTICLE IF CITATIONS # Molecular evolution of glutamate receptors: a primitive signaling mechanism that existed before 131 3.5 185 plants and animals diverged. Molecular Biology and Evolution, 1999, 16, 826-838. Ca channels in cardiac myocytes: structure and function in Ca influx and intracellular Ca release. Cardiovascular Research, 1999, 42, 339-360. 1.8 189 Molecular Elements of Ion Permeation and Selectivity within Calcium Channels. Critical Reviews in 133 2.3 49 Biochemistry and Molecular Biology, 1999, 34, 181-214. Pharmacology, Structure and Function of Cardiac L-Type Ca²⁺ Channels. Cellular 134 Physiology and Biochemistry, 1999, 9, 242-269. Molecular Biology of Adenosine Triphosphate-Sensitive Potassium Channels*. Endocrine Reviews, 1999, 135 8.9 543 20, 101-135. Structure and Function of Cardiac Pacemaker Channels. Cellular Physiology and Biochemistry, 1999, 9, 1.1 179-186. Simultaneous Binding of Basic Peptides at Intracellular Sites on a Large Conductance Ca2+-activated 137 0.9 12 K+ Channel. Journal of General Physiology, 1999, 113, 295-320. Genetic selection of inward-rectifying K+ channel mutants with reduced Cs+ sensitivity by random recombinant DNA shuffling mutagenesis and mutant selection in yeast. Journal of Experimental 2.4 10 Botany, 1999, 50, 967-978 139 Calcium Channel Permeation: A Field in Flux. Journal of General Physiology, 1999, 113, 765-772. 0.9 75 Helical Structure and Packing Orientation of the S2 Segment in the Shaker K+ Channel. Journal of 140 General Physiology, 1999, 113, 415-423. Modeling of Ion Channels. Journal of General Physiology, 1999, 113, 789-794. 141 0.9 75 Identification of Residues Lining the Translocation Pore of Human AE1, Plasma Membrane Anion 1.6 49 Exchange Protein. Journal of Biological Chemistry, 1999, 274, 3557-3564. A New Topological Model of the Cardiac Sarcolemmal Na+-Ca2+ Exchanger. Journal of Biological 143 1.6 182 Chemistry, 1999, 274, 910-917. Ionic Hopping Defended. Journal of General Physiology, 1999, 113, 783-787. 144 The screw–helical voltage gating of ion channels. Proceedings of the Royal Society B: Biological 145 1.2 54 Sciences, 1999, 266, 843-852. Molecular Identification of the Ryanodine Receptor Pore-forming Segment. Journal of Biological 146 Chemistry, 1999, 274, 25971-25974. Mutations in the S4 Region Isolate the Final Voltage-dependent Cooperative Step in Potassium Channel 147 0.9 223 Activation. Journal of General Physiology, 1999, 113, 389-414. Functional Consequences of a Decreased Potassium Affinity in a Potassium Channel Pore. Journal of 148 General Physiology, 1999, 113, 347-358.

	CITATION	KEPORT	
#	Article	IF	CITATIONS
149	Single Channel Properties of P2X2 Purinoceptors. Journal of General Physiology, 1999, 113, 695-720.	0.9	159
150	p53 and Tumor Necrosis Factor α Regulate the Expression of a Mitochondrial Chloride Channel Protein. Journal of Biological Chemistry, 1999, 274, 36488-36497.	1.6	119
151	Cloning of a New Mouse Two-P Domain Channel Subunit and a Human Homologue with a Unique Pore Structure. Journal of Biological Chemistry, 1999, 274, 11751-11760.	1.6	108
152	A Mutated PtsG, the Glucose Transporter, Allows Uptake ofd-Ribose. Journal of Biological Chemistry, 1999, 274, 14006-14011.	1.6	33
153	Inactivation Gating of Kv4 Potassium Channels. Journal of General Physiology, 1999, 113, 641-660.	0.9	113
154	Individual Subunits Contribute Independently to Slow Gating of Bovine EAG Potassium Channels. Journal of Biological Chemistry, 1999, 274, 5362-5369.	1.6	27
155	Interaction between the Pore and a Fast Gate of the Cardiac Sodium Channel. Journal of General Physiology, 1999, 113, 321-332.	0.9	26
156	Helix 4 of the Bacillus thuringiensis Cry1Aa Toxin Lines the Lumen of the Ion Channel. Journal of Biological Chemistry, 1999, 274, 31996-32000.	1.6	104
157	Calmodulin Mediates Calcium-dependent Activation of the Intermediate Conductance KCa Channel,IKCa1. Journal of Biological Chemistry, 1999, 274, 5746-5754.	1.6	277
158	Voltage-insensitive Gating after Charge-neutralizing Mutations in the S4 Segment of Shaker Channels. Journal of General Physiology, 1999, 113, 139-151.	0.9	29
159	The Molecular Assembly of ATP-sensitive Potassium Channels. Journal of Biological Chemistry, 1999, 274, 22652-22659.	1.6	55
160	Ion channel genes and human neurological disease: Recent progress, prospects, and challenges. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 4759-4766.	3.3	162
161	Single Streptomyces lividans K+ Channels. Journal of General Physiology, 1999, 114, 551-560.	0.9	293
162	A Marine Snail Neurotoxin Shares with Scorpion Toxins a Convergent Mechanism of Blockade on the Pore of Voltage-Gated K Channels. Journal of General Physiology, 1999, 114, 141-158.	0.9	26
163	Gat1 (Gaba:Na+:Clâ^') Cotransport Function. Journal of General Physiology, 1999, 114, 459-476.	0.9	101
164	Theories of Ion Permeation. Journal of General Physiology, 1999, 114, 605-608.	0.9	12
165	REVIEW â— : How Glutamate Receptors Are Built. Neuroscientist, 1999, 5, 311-323.	2.6	5
166	Potassium-dependent Changes in the Conformation of the Kv2.1 Potassium Channel Pore. Journal of General Physiology, 1999, 113, 819-836.	0.9	82

#	Article	IF	CITATIONS
167	Mapping the Functional Anatomy of BgK on Kv1.1, Kv1.2, and Kv1.3. Journal of Biological Chemistry, 1999, 274, 35653-35661.	1.6	60
168	Isolation of a Single Carboxyl-Carboxylate Proton Binding Site in the Pore of a Cyclic Nucleotide–Gated Channel. Journal of General Physiology, 1999, 114, 71-84.	0.9	45
169	High-Level Expression, Functional Reconstitution, and Quaternary Structure of a Prokaryotic Clc-Type Chloride Channel. Journal of General Physiology, 1999, 114, 713-722.	0.9	159
170	On the Molecular Basis of Ion Permeation in the Epithelial Na+ Channel. Journal of General Physiology, 1999, 114, 13-30.	0.9	124
171	Tuning the Voltage Dependence of Tetraethylammonium Block with Permeant Ions in an Inward-Rectifier K+ Channel. Journal of General Physiology, 1999, 114, 415-426.	0.9	36
172	Local Anesthetic Anchoring to Cardiac Sodium Channels. Circulation Research, 1999, 85, 88-98.	2.0	16
173	Identification of structural elements of the testis-specific voltage dependent calcium channel that potentially regulate its biophysical properties. Molecular Human Reproduction, 1999, 5, 311-322.	1.3	21
174	Cystic Fibrosis Transmembrane Conductance Regulator. Journal of General Physiology, 1999, 114, 799-818.	0.9	104
175	Structural Conservation of the Pores of Calcium-activated and Voltage-gated Potassium Channels Determined by a Sea Anemone Toxin. Journal of Biological Chemistry, 1999, 274, 21885-21892.	1.6	119
176	Mutational Analysis of the Shab-encoded Delayed Rectifier K+ Channels in Drosophila. Journal of Biological Chemistry, 1999, 274, 22109-22113.	1.6	22
177	Mapping of the Physical Interaction between the Intracellular Domains of an Inwardly Rectifying Potassium Channel, Kir6.2. Journal of Biological Chemistry, 1999, 274, 33393-33397.	1.6	47
178	A Pore Segment in DEG/ENaC Na+ Channels. Journal of Biological Chemistry, 1999, 274, 28484-28490.	1.6	93
179	A model for ion channel voltage gating with static S4 segments. Ferroelectrics, 1999, 220, 249-271.	0.3	13
180	Cu(II) Inhibition of the Proton Translocation Machinery of the Influenza A Virus M2 Protein. Journal of Biological Chemistry, 1999, 274, 5474-5482.	1.6	115
181	SOLID-STATE NUCLEAR MAGNETIC RESONANCE INVESTIGATION OF PROTEIN AND POLYPEPTIDE STRUCTURE. Annual Review of Biophysics and Biomolecular Structure, 1999, 28, 235-268.	18.3	105
182	Cyclic Nucleotide–Gated Channels. Journal of General Physiology, 1999, 114, 377-392.	0.9	68
183	Identification of a Potassium Channel Site That Interacts with G Protein βγ Subunits to Mediate Agonist-induced Signaling. Journal of Biological Chemistry, 1999, 274, 12517-12524.	1.6	106
184	A single point mutation in the pore region of the epithelial Na+ channel changes ion selectivity by modifying molecular sieving. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 4170-4175.	3.3	142

#	Article	IF	CITATIONS
185	A conserved serine-rich stretch in the glutamate transporter family forms a substrate-sensitive reentrant loop. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 14282-14287.	3.3	116
186	Determinants of Voltage-Dependent Gating and Open-State Stability in the S5 Segment of Shaker Potassium Channels. Journal of General Physiology, 1999, 114, 215-242.	0.9	41
187	The Block of Shaker K+ Channels by κ-Conotoxin Pviia Is State Dependent. Journal of General Physiology, 1999, 114, 125-140.	0.9	38
188	Different Membrane Anchoring Positions of Tryptophan and Lysine in Synthetic Transmembrane α-Helical Peptides. Journal of Biological Chemistry, 1999, 274, 20839-20846.	1.6	298
189	Distinct Molecular Bases for pH Sensitivity of the Guard Cell K+ Channels KST1 and KAT1. Journal of Biological Chemistry, 1999, 274, 11599-11603.	1.6	56
190	Binding of Correolide to Kv1 Family Potassium Channels. Journal of Biological Chemistry, 1999, 274, 25237-25244.	1.6	52
191	TWIK-2, a New Weak Inward Rectifying Member of the Tandem Pore Domain Potassium Channel Family. Journal of Biological Chemistry, 1999, 274, 7887-7892.	1.6	122
192	The CorA Mg2+ Transport Protein of Salmonella typhimurium. Journal of Biological Chemistry, 1999, 274, 36973-36979.	1.6	63
193	Cytoplasmic amino and carboxyl domains form a wide intracellular vestibule in an inwardly rectifying potassium channel. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 9926-9931.	3.3	38
194	Distinct Specificities of Inwardly Rectifying K+Channels for Phosphoinositides. Journal of Biological Chemistry, 1999, 274, 36065-36072.	1.6	179
195	Ion Permeation and Chemical Kinetics. Journal of General Physiology, 1999, 114, 601-604.	0.9	21
196	Localization of the K+ Lock-in and the Ba2+ Binding Sites in a Voltage-Gated Calcium-Modulated Channel. Journal of General Physiology, 1999, 114, 365-376.	0.9	56
197	Luminal loop of the ryanodine receptor: A pore-forming segment?. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 3345-3347.	3.3	78
198	Specific association of the gene product of PKD2 with the TRPC1 channel. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 3934-3939.	3.3	299
199	Cellular Microtransport Processes: Intercellular, Intracellular, and Aggregate Behavior. Annual Review of Biomedical Engineering, 1999, 1, 463-503.	5.7	9
200	Static and magic angle spinning NMR of membrane peptides and proteins. Progress in Nuclear Magnetic Resonance Spectroscopy, 1999, 35, 1-84.	3.9	72
201	Methods for X-ray diffraction analysis of macromolecular structures. Current Opinion in Chemical Biology, 1999, 3, 525-529.	2.8	10
202	Biomolecular NMR: recent advances in liquids, solids and screening. Current Opinion in Chemical Biology, 1999, 3, 530-536.	2.8	23

#	Article	IF	CITATIONS
203	Pharmacology of voltage-gated and calcium-activated potassium channels. Current Opinion in Chemical Biology, 1999, 3, 448-458.	2.8	158
204	Model membranes: developments in functional micelles and vesicles. Current Opinion in Chemical Biology, 1999, 3, 730-735.	2.8	50
205	Blockers of human T cell Kv1.3 potassium channels using de novo ligand design and solid-phase parallel combinatorial chemistry. Bioorganic and Medicinal Chemistry Letters, 1999, 9, 3267-3272.	1.0	24
206	Refined solution structure of ï‰-conotoxin GVIA: implications for calcium channel binding. Chemical Biology and Drug Design, 1999, 53, 343-351.	1.2	39
207	Molecular determinants of the Arabidopsis AKT1 K+ channel ionic selectivity investigated by expression in yeast of randomly mutated channels. Physiologia Plantarum, 1999, 105, 459-468.	2.6	20
208	Interactions of α-helices with lipid bilayers: a review of simulation studies. Biophysical Chemistry, 1999, 76, 161-183.	1.5	105
209	Effective diffusion coefficients of K+ and Clâ^' ions in ion channel models. Biophysical Chemistry, 1999, 79, 129-151.	1.5	52
210	Accelerated diffusion of Na+ in a hydrophobic region revealed by molecular dynamics simulations of a synthetic ion channel. Biophysical Chemistry, 1999, 82, 183-193.	1.5	6
211	Membrane proteins: structure and function. Journal of Synchrotron Radiation, 1999, 6, 918-927.	1.0	8
212	Molecular Cloning of a Putative Cyclic Nucleotide-Gated Ion Channel cDNA from Limulus polyphemus. Journal of Neurochemistry, 1999, 72, 461-471.	2.1	9
213	Structure-function studies of omega-atracotoxin, a potent antagonist of insect voltage-gated calcium channels. FEBS Journal, 1999, 264, 488-494.	0.2	79
214	Bacterial genes induced within the nodule during the Rhizobium-legume symbiosis. Molecular Microbiology, 1999, 32, 837-849.	1.2	222
215	Designed membrane channels and pores. Current Opinion in Biotechnology, 1999, 10, 94-103.	3.3	83
216	Combining hydrophobicity and helicity: a novel approach to membrane protein structure prediction. Bioorganic and Medicinal Chemistry, 1999, 7, 1-7.	1.4	31
217	More pieces of the K+ ion channel puzzle. , 1999, 6, 807-810.		4
219	Ion channels: From idea to reality. Nature Medicine, 1999, 5, 1105-1109.	15.2	138
220	Effect of cysteine substitutions on the topology of the S4 segment of theShakerpotassium channel: implications for molecular models of gating. Journal of Physiology, 1999, 521, 315-326.	1.3	30
221	Functional domains within the degenerin/epithelial sodium channel (Deg/ENaC) superfamily of ion channels. Journal of Physiology, 1999, 520, 631-644.	1.3	154

ARTICLE IF CITATIONS # Gating current studies reveal both intra- and extracellular cation modulation of K+channel 222 1.3 19 deactivation. Journal of Physiology, 1999, 515, 331-339. Amino acid substitutions in the pore of rat glutamate receptors at sites influencing block by polyamines. Journal of Physiology, 1999, 520, 337-357. 1.3 Molecular and Functional Diversity of Voltage-Gated Calcium Channels. Annals of the New York 224 1.8 65 Academy of Sciences, 1999, 868, 102-117. Molecular Diversity of K+ Channels. Annals of the New York Academy of Sciences, 1999, 868, 233-255. 1.8 1,057 Structure, G Protein Activation, and Functional Relevance of the Cardiac G Protein-Gated K+ Channel, 226 1.8 35 IKACh. Annals of the New York Academy of Sciences, 1999, 868, 386-398. Topology of the Pore Region of an Inward Rectifier K+ Channel, Kir2.1. Annals of the New York Academy of Sciences, 1999, 868, 414-417. 1.8 Effects on Ion Permeation with Hydrophobic Substitutions at a Residue in Shaker S6 That Interacts 228 1.8 5 with a Signature Sequence Amino Acid. Annals of the New York Academy of Sciences, 1999, 868, 458-464. The HCN Gene Family: Molecular Basis of the Hyperpolarization-Activated Pacemaker Channels. Annals 229 1.8 of the New York Academy of Sciences, 1999, 868, 741-764. 230 Inherited Long QT Syndromes:.. Journal of Cardiovascular Electrophysiology, 1999, 10, 1664-1683. 0.8 136 Characterization of a Novel Missense Mutation in the Pore of HERG in a Patient with Long OT 0.8 Syndrome. Journal of Cardiovascular Electrophysiology, 1999, 10, 1262-1270. Spectroscopic mapping of voltage sensor movement in the Shaker potassium channel. Nature, 1999, 232 13.7288 402, 813-817. Functional characterization of a potassium-selective prokaryotic glutamate receptor. Nature, 1999, 13.7 304 402, 817-821. 234 A banner year for membranes., 1999, 6, 1-2. 6 K+ channels lacking the 'tetramerization' domain: implications for pore structure., 1999, 6, 1122-1125. Structures of the M2 channel-lining segments from nicotinic acetylcholine and NMDA receptors by 236 9.7 306 NMR spectroscopy. Nature Structural Biology, 1999, 6, 374-379. The effect of deep pore mutations on the action of phenylalkylamines on the Kv1.3 potassium channel. British Journal of Pharmacology, 1999, 127, 1065-1074. Effect of detergent alkyl chain length on crystallization of a detergent-solubilized membrane 238 0.7 25 protein: Journal of Crystal Growth, 1999, 207, 214-225. An Energy-Barrier Model for the Permeation of Monovalent and Divalent Cations Through the Maxi 239 Cation Channel in the Plasma Membrane of Rye Roots. Journal of Membrane Biology, 1999, 168, 63-75.

#	Article	IF	CITATIONS
240	Ion Permeation and Block of P2X 2 Purinoceptors: Single Channel Recordings. Journal of Membrane Biology, 1999, 172, 215-223.	1.0	46
241	The voltage-gated potassium channel: Sequence analysis and molecular modelling of the pore domain. Journal of Computer - Aided Molecular Design, 1999, 15/16, 187-214.	1.0	Ο
242	Sea anemone toxins as templates for the design of immunosuppressant drugs. Journal of Computer - Aided Molecular Design, 1999, 15/16, 111-129.	1.0	16
243	Structural organization of G-protein-coupled receptors. Journal of Computer-Aided Molecular Design, 1999, 13, 325-353.	1.3	50
244	Extracellular links in Kir subunits control the unitary conductance of SUR/Kir6.0 ion channels. EMBO Journal, 1999, 18, 3317-3324.	3.5	37
245	Projection structure of NhaA, a secondary transporter from Escherichia coli, at 4.0 A resolution. EMBO Journal, 1999, 18, 3558-3563.	3.5	113
246	Stilbenes and fenamates rescue the loss of IKS channel function induced by an LQT5 mutation and other IsK mutants. EMBO Journal, 1999, 18, 4137-4148.	3.5	80
247	Two pacemaker channels from human heart with profoundly different activation kinetics. EMBO Journal, 1999, 18, 2323-2329.	3.5	343
248	Lipophilic 4-Isoxazolyl-1,4-dihydropyridines:Â Synthesis and Structureâ^'Activity Relationships. Journal of Medicinal Chemistry, 1999, 42, 3087-3093.	2.9	39
249	Mutations in the KCNQ4 gene are responsible for autosomal dominant deafness in four DFNA2 families. Human Molecular Genetics, 1999, 8, 1321-1328.	1.4	154
250	Molecular Pharmacology of Organic Cation Transporters in Kidney. Journal of Membrane Biology, 1999, 167, 103-117.	1.0	143
251	Suppression of Inward-Rectifying K + Channels KAT1 and AKT2 by Dominant Negative Point Mutations in the KAT1 α-Subunit. Journal of Membrane Biology, 1999, 167, 119-125.	1.0	61
252	Potassium Uptake Through the TOK1 K + Channel in the Budding Yeast. Journal of Membrane Biology, 1999, 168, 149-157.	1.0	38
253	From Structure to Function in Open Ionic Channels. Journal of Membrane Biology, 1999, 171, 1-24.	1.0	146
254	Fluoxetine Inhibits K + Transport Pathways (K + Efflux, Na + -K + -2Cl â^' Cotransport, and Na + Pump) Underlying Volume Regulation in Corneal Endothelial Cells. Journal of Membrane Biology, 1999, 171, 75-85.	1.0	20
255	A new interpretation of flux ratio exponents using statistical rate theory. European Biophysics Journal, 1999, 28, 279-293.	1.2	0
256	Mechanosensitive potassium channels in locust muscle membrane. European Biophysics Journal, 1999, 28, 346-350.	1.2	1
257	Hyperpolarization-activated cation channels: A multi-gene family. , 1999, 136, 165-181.		75

#	ARTICLE	IF	CITATIONS
258	Voltage-dependent calcium channels: From structure to function. , 1999, 139, 33-87.		297
259	Structure and function of cyclic nucleotide-gated channels. , 1999, 135, 151-171.		99
260	Ion channels in plant signaling. Cellular and Molecular Life Sciences, 1999, 55, 183-203.	2.4	77
261	General anaesthetic actions on ligand-gated ion channels. Cellular and Molecular Life Sciences, 1999, 55, 1278-1303.	2.4	369
262	Three for T: molecular analysis of the low voltage-activated calcium channel family. Cellular and Molecular Life Sciences, 1999, 56, 660-669.	2.4	75
263	Les canaux ioniques: une introduction. Douleur Et Analgesie, 1999, 12, 251-259.	0.2	0
264	Identification of a highly conserved sequence at the N-terminus of the epithelial Na + channel α subunit involved in gating. Pflugers Archiv European Journal of Physiology, 1999, 438, 709-715.	1.3	35
265	The possible role of a disulphide bond in forming functional Kir2.1 potassium channels. Pflugers Archiv European Journal of Physiology, 1999, 438, 778-781.	1.3	21
266	The effects of oxidizing and cysteine-reactive reagents on the inward rectifier potassium channels Kir2.3 and Kir1.1. Pflugers Archiv European Journal of Physiology, 1999, 438, 868-878.	1.3	4
267	Allosteric effects of mutations in the extracellular S5-P loop on the gating and ion permeation properties of the hERG potassium channel. Pflugers Archiv European Journal of Physiology, 1999, 439, 141-149.	1.3	27
268	The properties of cysteine mutants in the pore region of cyclic-nucleotide-gated channels. Pflugers Archiv European Journal of Physiology, 1999, 438, 587-596.	1.3	14
269	Pronounced differences between the native K + channels and KAT1 and KST1 α-subunit homomers of guard cells. Planta, 1999, 207, 370-376.	1.6	40
270	Susceptibility of the guard-cell K + -uptake channel KST1 to Zn 2+ requires histidine residues in the S3-S4 linker and in the channel pore. Planta, 1999, 209, 543-546.	1.6	11
271	Challenges at the frontiers of structural biology. Trends in Genetics, 1999, 15, M20-M24.	2.9	4
272	Cortical neurons immunoreactive for the potassium channel Kv3.1b subunit are predominantly surrounded by perineuronal nets presumed as a buffering system for cations. Brain Research, 1999, 842, 15-29.	1.1	294
273	The pharmacology of ion channels: with particular reference to voltage-gated Ca2+ channels. European Journal of Pharmacology, 1999, 375, 311-325.	1.7	78
274	Co-expression of Human Kir3 Subunits Can Yield Channels with Different Functional Properties. Cellular Signalling, 1999, 11, 871-883.	1.7	24
275	Inwardly rectifying potassium channels. Current Opinion in Cell Biology, 1999, 11, 503-508.	2.6	202

#	Article	IF	CITATIONS
277	The bacterial K+ channel structure and its implications for neuronal channels. Current Opinion in Neurobiology, 1999, 9, 267-273.	2.0	25
278	â€~Feeling the pressure': structural insights into a gated mechanosensitive channel. Current Opinion in Structural Biology, 1999, 9, 448-454.	2.6	43
279	Ion channels:. Current Biology, 1999, 9, R173-R175.	1.8	4
280	Potassium channels: Putting the parts together. Current Biology, 1999, 9, R738-R741.	1.8	2
281	Challenges at the frontiers of structural biology. Trends in Cell Biology, 1999, 9, M20-M24.	3.6	40
282	Towards the three-dimensional structure of voltage-gated potassium channels. Trends in Biochemical Sciences, 1999, 24, 345-349.	3.7	46
283	Challenges at the frontiers of structural biology. Trends in Biochemical Sciences, 1999, 24, M20-M24.	3.7	11
284	Channel gate! Tension, leak and disclosure. Structure, 1999, 7, R99-R103.	1.6	45
285	Plant ion channels: from molecular structures to physiological functions. Current Opinion in Plant Biology, 1999, 2, 477-482.	3.5	65
286	Plasma membrane transport in context — making sense out of complexity. Current Opinion in Plant Biology, 1999, 2, 236-243.	3.5	33
287	Cysteine-scanning mutagenesis of an eukaryotic pore-forming toxin from sea anemone. Topology in lipid membranes. FEBS Journal, 1999, 263, 128-136.	0.2	87
288	Identification of residues in dendrotoxin K responsible for its discrimination between neuronal K+ channels containing Kv1.1 and 1.2 alpha subunits. FEBS Journal, 1999, 263, 222-229.	0.2	64
289	Novel mutation in the KCNQ4 gene in a large kindred with dominant progressive hearing loss. Human Mutation, 1999, 14, 493-501.	1.1	53
290	Conotoxins and their potential pharmaceutical applications. , 1999, 46, 219-234.		97
291	Peptide structural analysis by solid-state NMR spectroscopy. , 1999, 51, 174-190.		76
292	Solution structure of potassium channel-inhibiting scorpion toxin Lq2. Proteins: Structure, Function and Bioinformatics, 1999, 34, 417-426.	1.5	15
293	Are membrane proteins ?inside-out? proteins?. , 1999, 36, 135-143.		68
294	Viral ion channels: molecular modeling and simulation. BioEssays, 1999, 20, 992-1000.	1.2	24

#	Article	IF	CITATIONS
296	Allosteric effects of mutations in the extracellular S5-P loop on the gating and ion permeation properties of the hERG potassium channel. Pflugers Archiv European Journal of Physiology, 1999, 439, 141-149.	1.3	26
297	The possible role of a disulphide bond in forming functional Kir2.1 potassium channels. Pflugers Archiv European Journal of Physiology, 1999, 438, 778-781.	1.3	13
298	The effects of oxidizing and cysteine-reactive reagents on the inward rectifier potassium channels Kir2.3 and Kir1.1. Pflugers Archiv European Journal of Physiology, 1999, 438, 868-878.	1.3	7
299	Identification of a highly conserved sequence at the N-terminus of the epithelial Na+ channel α subunit involved in gating. Pflugers Archiv European Journal of Physiology, 1999, 438, 709-715.	1.3	57
300	Solution Structure of the Sodium Channel Inactivation Gate,. Biochemistry, 1999, 38, 855-861.	1.2	130
301	Stereoselective Characterization of the 1,4-Dihydropyridine Binding Site at L-Type Calcium Channels in the Resting State and the Opened/Inactivated State. Journal of Medicinal Chemistry, 1999, 42, 2204-2211.	2.9	60
302	Ionotropic Glutamate Receptors in the CNS. Handbook of Experimental Pharmacology, 1999, , .	0.9	40
303	A glimpse of the mechanisms of ion homeostasis during salt stress. Journal of Experimental Botany, 1999, 50, 1023-1036.	2.4	351
304	Structure of the KcsA Potassium Channel fromStreptomyces lividans:Â A Site-Directed Spin Labeling Study of the Second Transmembrane Segmentâ€. Biochemistry, 1999, 38, 10324-10335.	1.2	122
305	On the structure and thermodynamics of solvated monoatomic ions using a hybrid solvation model. Journal of Chemical Physics, 1999, 111, 10998-11014.	1.2	122
306	Kinetics and thermodynamics across single-file pores: Solute permeability and rectified osmosis. Journal of Chemical Physics, 1999, 110, 606-615.	1.2	62
307	Size selectivity by cation–π interactions: Solvation of K+ and Na+ by benzene and water. Journal of Chemical Physics, 1999, 110, 8429-8435.	1.2	214
308	NEUROSCIENCE:For the Latest Information, Tune to Channel KcsA. Science, 1999, 285, 59-61.	6.0	8
309	Structural Rearrangements Underlying K+-Channel Activation Gating. Science, 1999, 285, 73-78.	6.0	545
310	The Cavity and Pore Helices in the KcsA K+ Channel: Electrostatic Stabilization of Monovalent Cations. Science, 1999, 285, 100-102.	6.0	427
311	Ion Penetration of the Water-Oil Interface. Science, 1999, 286, 2482-2485.	6.0	23
312	A Mutation in the C. elegans EXP-2 Potassium Channel That Alters Feeding Behavior. Science, 1999, 286, 2501-2504.	6.0	58
313	Molecular dynamics simulation of a hydrated diphytanol phosphatidylcholine lipid bilayer containing an alpha-helical bundle of four transmembrane domains of the Influenza A virus M2 protein. Faraday Discussions, 1999, 111, 200-208.	1.6	10

#	Article	IF	CITATIONS
314	The effect of hydrophobic and hydrophilic channel walls on the structure and diffusion of water and ions. Journal of Chemical Physics, 1999, 111, 7985-7999.	1.2	88
315	Aqua–potassium(I) complexes: Ab initio study. Journal of Chemical Physics, 1999, 111, 3995-4004.	1.2	100
316	Atomic scale movement of the voltage-sensing region in a potassium channel measured via spectroscopy. Nature, 1999, 402, 809-813.	13.7	478
317	A â€~toothpaste tube' model for ion transport through trans-membrane channels. Chemical Communications, 1999, , 553-554.	2.2	18
318	Role of Helixâ^'Helix Interactions in Assembly of the Bacteriorhodopsin Lattice. Biochemistry, 1999, 38, 9023-9030.	1.2	27
319	Membrane Topology of the β-Subunit of the Oxaloacetate Decarboxylase Na+Pump fromKlebsiella pneumoniaeâ€. Biochemistry, 1999, 38, 13461-13472.	1.2	23
320	Pi7, an Orphan Peptide from the Scorpion Pandinus imperator: A 1H-NMR Analysis Using a Nano-NMR Probe,. Biochemistry, 1999, 38, 16756-16765.	1.2	30
321	Possible interaction mechanism for quaternary ammonium (QA) ions binding to potassium channels: density functional theory and MP2 studies on the interaction between phenol and ammonium cation â€. Journal of the Chemical Society Perkin Transactions II, 1999, , 107-112.	0.9	22
322	Chapter 11. Molecular interactions of biomembranes. Annual Reports on the Progress of Chemistry Section C, 1999, 95, 373.	4.4	5
323	Three-dimensional models of glutamate receptors. Faraday Discussions, 1999, 111, 259-272.	1.6	3
324	Receptors and channels regulating acrosome reactions. Human Fertility, 1999, 2, 42-55.	0.7	21
325	Bacterial mechanosensitive channels: integrating physiology, structure and function. Trends in Microbiology, 1999, 7, 420-424.	3.5	114
326	Out of Africa: daunting data and dazzling discussion on TB. Trends in Microbiology, 1999, 7, 424.	3.5	0
327	Lateral organisation of membrane lipids. Biochimica Et Biophysica Acta - Molecular and Cell Biology of Lipids, 1999, 1440, 32-48.	1.2	146
328	Architecture of a K+ Channel Inner Pore Revealed by Stoichiometric Covalent Modification. Neuron, 1999, 22, 571-580.	3.8	91
329	Mutational Analysis of the Charge Selectivity Filter of the α7 Nicotinic Acetylcholine Receptor. Neuron, 1999, 22, 831-843.	3.8	158
330	Potassium Channels. Neuron, 1999, 23, 7-10.	3.8	79
331	Dynamic Selectivity Filters in Ion Channels. Neuron, 1999, 23, 653-658.	3.8	91

#	Article	IF	CITATIONS
332	Stoichiometry and Arrangement of Subunits in Rod Cyclic Nucleotide–Gated Channels. Neuron, 1999, 23, 809-819.	3.8	62
333	Molecular dynamics study of kaliotoxin in water. International Journal of Biological Macromolecules, 1999, 24, 1-9.	3.6	2
334	IS3 peptide-formed ion channels in rat skeletal muscle cell membranes. FEBS Letters, 1999, 446, 351-354.	1.3	0
335	The presumed potassium carrier Trk2p inSaccharomyces cerevisiaedetermines an H+-dependent, K+-independent current. FEBS Letters, 1999, 447, 115-120.	1.3	31
336	Localization and age-dependent expression of the inward rectifier K+ channel subunit Kir 5.1 in a mammalian reproductive system. FEBS Letters, 1999, 449, 146-152.	1.3	41
337	VacA fromHelicobacter pylori: a hexameric chloride channel. FEBS Letters, 1999, 450, 101-104.	1.3	125
338	Identification and cloning of TWIK-originated similarity sequence (TOSS): a novel human 2-pore K+ channel principal subunit. FEBS Letters, 1999, 450, 191-196.	1.3	51
339	Change to alanine of one out of four selectivity filter glycines in KtrB causes a two orders of magnitude decrease in the affinities for both K+and Na+of the Na+dependent K+uptake system KtrAB fromVibrio alginolyticus. FEBS Letters, 1999, 450, 217-220.	1.3	79
340	Voltage-gated potassium channels: from hyperexcitability to excitement. FEBS Letters, 1999, 452, 31-35.	1.3	158
341	Exchange of conductance and gating properties between gap junction hemichannels. FEBS Letters, 1999, 451, 113-117.	1.3	33
342	Images of oligomeric Kvβ2, a modulatory subunit of potassium channels. FEBS Letters, 1999, 457, 107-111.	1.3	16
343	Mutations in the yeast two pore K+channel YKC1 identify functional differences between the pore domains. FEBS Letters, 1999, 458, 285-291.	1.3	6
344	The tolbutamide site of SUR1 and a mechanism for its functional coupling to KATPchannel closure. FEBS Letters, 1999, 459, 367-376.	1.3	59
345	Exploring the open pore of the potassium channel fromStreptomyces lividans. FEBS Letters, 1999, 462, 447-452.	1.3	109
346	Structural and functional modularity of voltage-gated potassium channels. FEBS Letters, 1999, 463, 375-381.	1.3	16
347	KCNQ4, a Novel Potassium Channel Expressed in Sensory Outer Hair Cells, Is Mutated in Dominant Deafness. Cell, 1999, 96, 437-446.	13.5	783
348	Transmembrane Structure of an Inwardly Rectifying Potassium Channel. Cell, 1999, 96, 879-891.	13.5	148
349	Unlocking Family Secrets. Cell, 1999, 97, 547-550.	13.5	13

#	Article	IF	CITATIONS
350	Structure of a Voltage-Dependent K+ Channel β Subunit. Cell, 1999, 97, 943-952.	13.5	268
351	Backbone Mutations in Transmembrane Domains of a Ligand-Gated Ion Channel. Cell, 1999, 96, 89-98.	13.5	130
352	Functional reconstitution of bacterially expressed human potassium channels in proteoliposomes: membrane potential measurements with JC-1 to assay ion channel activity. Biochimica Et Biophysica Acta - Biomembranes, 1999, 1416, 92-100.	1.4	18
353	Structure and function of the uncoupling protein from brown adipose tissue. Biochimica Et Biophysica Acta - Biomembranes, 1999, 1415, 271-296.	1.4	320
354	Melibiose carrier of Escherichia coli: use of cysteine mutagenesis to identify the amino acids on the hydrophilic face of transmembrane helix 2. Biochimica Et Biophysica Acta - Biomembranes, 1999, 1420, 63-72.	1.4	19
355	Sulfonylurea receptors: ABC transporters that regulate ATP-sensitive K+ channels. Biochimica Et Biophysica Acta - Biomembranes, 1999, 1461, 285-303.	1.4	113
356	The structure, dynamics and orientation of antimicrobial peptides in membranes by multidimensional solid-state NMR spectroscopy. Biochimica Et Biophysica Acta - Biomembranes, 1999, 1462, 157-183.	1.4	435
357	Molecular and Brownian dynamics study of ion selectivity and conductivity in the potassium channel. Chemical Physics Letters, 1999, 313, 358-365.	1.2	31
358	HYPERINSULINEMIC HYPOGLYCEMIA OF INFANCY. Endocrinology and Metabolism Clinics of North America, 1999, 28, 695-708.	1.2	17
359	Alamethicin channels in a membrane: molecular dynamics simulations. Faraday Discussions, 1999, 111, 209-223.	1.6	27
360	Neurological channelopathies: diagnosis and therapy in the new millennium. Annals of Medicine, 1999, 31, 406-420.	1.5	30
361	MEMBRANE PROTEIN FOLDING AND STABILITY: Physical Principles. Annual Review of Biophysics and Biomolecular Structure, 1999, 28, 319-365.	18.3	1,595
362	Crystal Structure ofS-Adenosylhomocysteine Hydrolase from Rat Liverâ€,â€j. Biochemistry, 1999, 38, 8323-8333.	1.2	105
363	Streptomyces lividansPotassium Channel Contains Poly-(R)-3-hydroxybutyrate and Inorganic Polyphosphateâ€. Biochemistry, 1999, 38, 15666-15672.	1.2	49
364	Theoretical models of conformational transitions and ion conduction in voltage-dependent ion channels: Bioferroelectricity and superionic conduction. Ferroelectrics, 1999, 220, 157-204.	0.3	47
365	Mechanisms for xenobiotic transport in biological membranes. Toxicology Letters, 1999, 106, 107-118.	0.4	15
366	Statistical Mechanical Equilibrium Theory of Selective Ion Channels. Biophysical Journal, 1999, 77, 139-153.	0.2	130
367	The Na Channel Voltage Sensor Associated with Inactivation Is Localized to the External Charged Residues of Domain IV, S4. Biophysical Journal, 1999, 77, 747-757.	0.2	156

#	Article	IF	CITATIONS
368	Evolutionary Relationship between K+ Channels and Symporters. Biophysical Journal, 1999, 77, 775-788.	0.2	169
369	Structural Models of the KtrB, TrkH, and Trk1,2 Symporters Based on the Structure of the KcsA K+ Channel. Biophysical Journal, 1999, 77, 789-807.	0.2	162
370	Role of Individual Surface Charges of Voltage-Gated K Channels. Biophysical Journal, 1999, 77, 1358-1362.	0.2	42
371	Intersegment Hydrogen Bonds as Possible Structural Determinants of the N/Q/R Site in Glutamate Receptors. Biophysical Journal, 1999, 77, 1914-1926.	0.2	27
372	Molecular Dynamics of Synthetic Leucine-Serine Ion Channels in a Phospholipid Membrane. Biophysical Journal, 1999, 77, 2400-2410.	0.2	51
373	Molecular Dynamics Study of the KcsA Potassium Channel. Biophysical Journal, 1999, 77, 2502-2516.	0.2	152
374	Permeation of Ions Across the Potassium Channel: Brownian Dynamics Studies. Biophysical Journal, 1999, 77, 2517-2533.	0.2	190
375	Nonglutamate Pore Residues in Ion Selection and Conduction in Voltage-Gated Ca2+ Channels. Biophysical Journal, 1999, 77, 2575-2589.	0.2	24
376	Competitive Binding of Mg2+, Ca2+, Na+, and K+ Ions to DNA in Oriented DNA Fibers: Experimental and Monte Carlo Simulation Results. Biophysical Journal, 1999, 77, 2736-2749.	0.2	108
377	Inhibition of αβ Epithelial Sodium Channels by External Protons Indicates That the Second Hydrophobic Domain Contains Structural Elements for Closing the Pore. Biophysical Journal, 1999, 77, 3043-3051.	0.2	17
378	K+-Dependent Composite Gating of the Yeast K+ Channel, Tok1. Biophysical Journal, 1999, 77, 3060-3070.	0.2	24
379	Physical Origin of Selectivity in Ionic Channels of Biological Membranes. Biophysical Journal, 1999, 76, 129-148.	0.2	70
380	Contribution of the Selectivity Filter to Inactivation in Potassium Channels. Biophysical Journal, 1999, 76, 253-263.	0.2	161
381	Exploration of the Structural Features Defining the Conduction Properties of a Synthetic Ion Channel. Biophysical Journal, 1999, 76, 618-630.	0.2	72
382	A Lattice Relaxation Algorithm for Three-Dimensional Poisson-Nernst-Planck Theory with Application to Ion Transport through the Gramicidin A Channel. Biophysical Journal, 1999, 76, 642-656.	0.2	254
383	(In)validity of the Constant Field and Constant Currents Assumptions in Theories of Ion Transport. Biophysical Journal, 1999, 76, 768-781.	0.2	37
384	An Alamethicin Channel in a Lipid Bilayer: Molecular Dynamics Simulations. Biophysical Journal, 1999, 76, 1757-1769.	0.2	172
385	Defining the Transmembrane Helix of M2 Protein from Influenza A by Molecular Dynamics Simulations in a Lipid Bilayer. Biophysical Journal, 1999, 76, 1886-1896.	0.2	63

ARTICLE IF CITATIONS # Simulation Study of a Gramicidin/Lipid Bilayer System in Excess Water and Lipid. II. Rates and 386 0.2 71 Mechanisms of Water Transport. Biophysical Journal, 1999, 76, 1939-1950. Structural Determinants of Gating in Inward-Rectifier K+ Channels. Biophysical Journal, 1999, 76, 0.2 1988-2003. 388 Evidence for Dimerization of Dimers in K+ Channel Assembly. Biophysical Journal, 1999, 76, 2004-2017. 0.2 74 Improved Secondary Structure Predictions for a Nicotinic Receptor Subunit: Incorporation of Solvent Accessibility and Experimental Data into a Two-Dimensional Representation. Biophysical Journal, 1999, 76, 2329-2345. 389 98 External Tetraethylammonium As a Molecular Caliper for Sensing the Shape of the Outer Vestibule of 390 0.2 25 Potassium Channels. Biophysical Journal, 1999, 76, 2351-2360. Effects of Outer Mouth Mutations on hERG Channel Function: A Comparison with Similar Mutations in the Shaker Channel. Biophysical Journal, 1999, 76, 3128-3140. 0.2 Batrachotoxin-Resistant Na+ Channels Derived from Point Mutations in Transmembrane Segment 392 0.2 74 D4-S6. Biophysical Journal, 1999, 76, 3141-3149. A Multifrequency Electron Spin Resonance Study of T4 Lysozyme Dynamics. Biophysical Journal, 1999, 0.2 76, 3298-3306. Molecular determinants of a Ca2+-binding site in the pore of cyclic nucleotide-gated channels: S5/S6 394 3.5 66 segments control affinity of intrapore glutamates. EMBO Journal, 1999, 18, 119-130. Modulating Dipoles for Structureâ[^]Function Correlations in the Gramicidin A Channelâ€. Biochemistry, 1999, 38, 9185-9197. 1.2 44 Potassium and Sodium Binding to the Outer Mouth of the K+ Channel. Biochemistry, 1999, 38, 396 1.2 146 8599-8604. Self-Assembled Rigid-Rod Ionophores. Journal of the American Chemical Society, 1999, 121, 4294-4295. 6.6 Transmembrane Helix 5 Is Critical for the High Water Permeability of Aquaporinâ€. Biochemistry, 1999, 398 1.2 15 38, 16340-16346. Role of Disulfide Bonds in the Structure and Potassium Channel Blocking Activity of ShK Toxin. 399 1.2 Biochemistry, 1999, 38, 14549-14558. Experimental and Monte Carlo Simulation Studies on the Competitive Binding of Li+, Na+, and K+lons 400 1.2 30 to DNA in Oriented DNA Fibersâ€. Journal of Physical Chemistry B, 1999, 103, 9008-9019. Chloride Concentration Dependency of the Electrogenic Activity of Halorhodopsinâ€. Biochemistry, 1.2 34 1999, 38, 5422-5429. Hydraphile Channels: A Structural and Fluorescent Probes of Position and Function in a Phospholipid 402 6.6 67 Bilayer. Journal of the American Chemical Society, 1999, 121, 9043-9052. Mutant Phe788 ât' Leu of the Na+,K+-ATPase Is Inhibited by Micromolar Concentrations of Potassium and 1.2 Exhibits High Na+-ATPase Activity at Low Sodium Concentrationsâ€. Biochemistry, 1999, 38, 11389-11400.

		CITATION R	PORT	
#	Article		IF	Citations
404	Aspects of Peptide Folding and Aggregation. Accounts of Chemical Research, 1999, 3	2, 693-701.	7.6	51
405	Molecular basis of fast inactivation in voltage and Ca2+-activated K+ channels: A trans Â-subunit homolog. Proceedings of the National Academy of Sciences of the United St 1999, 96, 4137-4142.	smembrane tates of America,	3.3	354
406	Synthesis of a Stable Form of Tertiapin:Â A High-Affinity Inhibitor for Inward-Rectifier K Biochemistry, 1999, 38, 14286-14293.	.+Channelsâ€.	1.2	130
407	The Single-Channel Doseâ "Response Relation Is Consistently Steep for Rod Cyclic Nuc Channels: Â Implications for the Interpretation of Macroscopic Doseâ "Response Relati Biochemistry, 1999, 38, 10642-10648.	leotide-Gated onsâ€.	1.2	36
408	Modulation of Gramicidin Channel Structure and Function by the Aliphatic $\hat{a} \in \infty$ Space and 14 between the Tryptophans. Biochemistry, 1999, 38, 1030-1039.	-―Residues 10, 12,	1.2	20
409	Total Chemical Synthesis of the Integral Membrane Protein Influenza A Virus M2:Â Rol Domain in Tetramer Assemblyâ€. Biochemistry, 1999, 38, 11905-11913.	e of Its C-Terminal	1.2	182
410	IONIC CONDUCTANCES IN GASTROINTESTINAL SMOOTH MUSCLES AND INTERSTITIA Annual Review of Physiology, 1999, 61, 45-84.	L CELLS OF CAJAL.	5.6	98
411	Solution- and Solid-State Evidence for Alkali Metal Cationâ~ï€ Interactions with Indole of Tryptophan. Journal of the American Chemical Society, 1999, 121, 5613-5614.	, the Side Chain	6.6	114
412	Mechanisms of Inward-Rectifier K+Channel Inhibition by Tertiapin-Qâ \in . Biochemistry, 14294-14301.	1999, 38,	1.2	101
413	Novel Gating Mechanism of Polyamine Block in the Strong Inward Rectifier K Channel of General Physiology, 1999, 113, 555-564.	Kir2.1. Journal	0.9	48
414	Cation transport: an example of structural based selectivity 1 1Edited by I. B. Holland. Molecular Biology, 1999, 285, 1993-2003.	Journal of	2.0	65
415	Experimentally based orientational refinement of membrane protein models: a structu Influenza A M2 H + channel 1 1Edited by G. von Heijne. Journal of Molecular Biology, 1	re for the 999, 286, 951-962.	2.0	141
416	Studies on the active site of deacetoxycephalosporin C synthase. Journal of Molecular 287, 943-960.	Biology, 1999,	2.0	111
417	Surface crystallisation of the plasma membrane H+-ATPase on a carbon support film fo crystallography. Journal of Molecular Biology, 1999, 287, 961-968.	br electron	2.0	39
418	A day in the life of Dr K. or how I learned to stop worrying and love lysozyme: a traged Journal of Molecular Biology, 1999, 293, 367-379.	y in six acts.	2.0	35
419	Geometry of phage head construction. Journal of Molecular Biology, 1999, 293, 401-4	-33.	2.0	47
420	Turns in transmembrane helices: determination of the minimal length of a "helical derivation of a fine-grained turn propensity scale 1 1Edited by F. E. Cohen. Journal of N Biology, 1999, 293, 807-814.		2.0	95
421	Folding pattern of the α-crystallin domain in αA-crystallin determined by site-directed Journal of Molecular Biology, 1999, 294, 561-577.	spin labeling.	2.0	106

#	Article	IF	CITATIONS
422	KPROT: A knowledge-based scale for the propensity of residue orientation in transmembrane segments. Application to membrane protein structure prediction. Journal of Molecular Biology, 1999, 294, 921-935.	2.0	77
423	Brownian dynamics simulation of ion flow through porin channels. Journal of Molecular Biology, 1999, 294, 1159-1167.	2.0	119
424	The Structure of Aquaporin-1 at 4.5-à Resolution Reveals Short α-Helices in the Center of the Monomer. Journal of Structural Biology, 1999, 128, 34-43.	1.3	122
425	Functional Role of Oxygen-Containing Residues in the Fifth Transmembrane Segment of the Na,K-ATPase α Subunit. Archives of Biochemistry and Biophysics, 1999, 364, 254-263.	1.4	18
426	The N-Terminus of KIR6.2 Limits Spontaneous Bursting and Modulates the ATP-Inhibition of KATPChannels. Biochemical and Biophysical Research Communications, 1999, 255, 231-238.	1.0	76
427	Heterologous Gene Expression in a Membrane-Protein-Specific System. Protein Expression and Purification, 1999, 17, 312-323.	0.6	28
428	Expression, Purification, and Structural Characterization of the Bacteriorhodopsin–Aspartyl Transcarbamylase Fusion Protein. Protein Expression and Purification, 1999, 17, 324-338.	0.6	12
429	Conductive Properties and Gating of Channels Formed by Syringopeptin 25A, a Bioactive Lipodepsipeptide from Pseudomonas syringae pv. syringae, in Planar Lipid Membranes. Molecular Plant-Microbe Interactions, 1999, 12, 401-409.	1.4	32
430	Novel method for evaluation of the oligomeric structure of membrane proteins. Biochemical Journal, 1999, 342, 119-123.	1.7	130
431	Novel method for evaluation of the oligomeric structure of membrane proteins. Biochemical Journal, 1999, 342, 119.	1.7	56
432	Generalized solvent boundary potential for computer simulations. , 1999, , .		2
434	Ion Channels. Journal of Physiology, 1999, 518, 109P.	1.3	0
435	Chapter 1 Studies of Voltage-Dependent and Inwardly Rectifying Potassium Channels. Current Topics in Membranes, 1999, 46, 1-5.	0.5	1
436	Chapter 4 Permeation of Voltage-Dependent Potassuim Channels. Current Topics in Membranes, 1999, , 47-66.	0.5	0
437	Chapter 9 A Short History of Ion Channels and Signal Propagation. Current Topics in Membranes, 1999, 48, 283-310.	0.5	1
438	[4] Spin-label electron spin resonance and fourier transform infrared spectroscopy for structural/dynamic measurements on ion channels. Methods in Enzymology, 1999, 294, 59-92.	0.4	25
439	[7] Three-dimensional structure of membrane proteins determined by two-dimensional crystallization, electron cryomicroscopy, and image analysis. Methods in Enzymology, 1999, 294, 135-180.	0.4	40
440	Chapter 2.1.7 Genetic dissection of mouse behavior using induced mutagenesis. Handbook of Behavioral Neuroscience, 1999, , 147-165.	0.0	3

#	Article	IF	CITATIONS
441	NMR Studies of Ion-transporting Biological Channels. Annual Reports on NMR Spectroscopy, 1999, 38, 89-137.	0.7	3
442	From genes to channels: normal mechanisms. Cardiovascular Research, 1999, 42, 318-326.	1.8	25
443	Recent advances in the understanding of membrane protein assembly and structure. Quarterly Reviews of Biophysics, 1999, 32, 285-307.	2.4	101
444	Channel-forming colicins: translocation (and other deviant behaviour) associated with colicin Ia channel gating. Quarterly Reviews of Biophysics, 1999, 32, 189-205.	2.4	36
445	Inward rectifier potassium channel Kir 2.3 is inhibited by internal sulfhydryl modification. NeuroReport, 1999, 10, 3277-3282.	0.6	3
446	Ladungstransfer — chemisch, physikalisch und biologisch betrachtet. Nachrichten Aus Der Chemie, 1999, 47, 641-647.	0.0	0
447	An Electrophysiological Comparison of Voltageâ€Gated Proton Channels, Other Ion Channels, and Other Proton Channels. Israel Journal of Chemistry, 1999, 39, 409-418.	1.0	19
448	Potassium ChannelsÂ. Anesthesiology, 1999, 90, 1186-1203.	1.3	71
449	Interactions of Small Molecules and Peptides with Membranes. Theoretical and Computational Chemistry, 1999, 8, 485-535.	0.2	3
450	Electrostatics of membrane systemsâ \in "complex, heterogeneous environments. , 1999, , .		0
451	Structural details of an interaction between cardiolipin and an integral membrane protein. Proceedings of the National Academy of Sciences of the United States of America, 1999, 96, 14706-14711.	3.3	232
452	Human T-cell Kv1.3 potassium channel blockers: new strategies for immunosuppression. Expert Opinion on Therapeutic Patents, 2000, 10, 905-915.	2.4	3
453	Excitatory amino acid agonists and antagonists: pharmacology and therapeutic applications. Pharmacochemistry Library, 2000, , 221-229.	0.1	0
455	Chapter 4 Ion channels of vertebrate photoreceptors. Handbook of Biological Physics, 2000, 3, 143-181.	0.8	21
456	Structure‒function studies of tryptophan mutants of equinatoxin II, a sea anemone pore-forming protein. Biochemical Journal, 2000, 346, 223.	1.7	38
457	Conserved Ca2+-antagonist-binding properties and putative folding structure of a recombinant high-affinity dihydropyridine-binding domain. Biochemical Journal, 2000, 347, 829.	1.7	27
458	Sj-FABPc fatty-acid-binding protein of the human blood fluke Schistosoma japonicum: structural and functional characterization and unusual solvent exposure of a portal-proximal tryptophan residue. Biochemical Journal, 2000, 349, 377.	1.7	18
459	Cyclic-nucleotide- and Ca2+/calmodulin-regulated channels in plants: targets for manipulating heavy-metal tolerance, and possible physiological roles. Biochemical Society Transactions, 2000, 28, 471.	1.6	16

#	Article	IF	CITATIONS
460	Sj-FABPc fatty-acid-binding protein of the human blood fluke Schistosoma japonicum: structural and functional characterization and unusual solvent exposure of a portal-proximal tryptophan residue. Biochemical Journal, 2000, 349, 377-384.	1.7	32
461	Cyclic-nucleotide- and Ca2+/calmodulin-regulated channels in plants: targets for manipulating heavy-metal tolerance, and possible physiological roles. Biochemical Society Transactions, 2000, 28, 471-475.	1.6	29
462	Conserved Ca2+-antagonist-binding properties and putative folding structure of a recombinant high-affinity dihydropyridine-binding domain. Biochemical Journal, 2000, 347, 829-836.	1.7	63
463	Biochemie und Molekulargenetik 1999. Nachrichten Aus Der Chemie, 2000, 48, 291-300.	0.0	1
464	Cytoplasmic residues influence the voltage-dependence of the gating of human K+ channels. NeuroReport, 2000, 11, 2913-2917.	0.6	5
465	Calculation of the conductance and selectivity of an ion-selective potassium channel (IRK1) from simulation of atomic scale models. Molecular Physics, 2000, 98, 535-547.	0.8	13
466	Structure–function studies of tryptophan mutants of equinatoxin II, a sea anemone pore-forming protein. Biochemical Journal, 2000, 346, 223-232.	1.7	81
467	The Impact of Genomics on Drug Discovery. Progress in Medicinal Chemistry, 2000, 37, 1-43.	4.1	19
469	Common structural features in gramicidin and other ion channels. BioEssays, 2000, 22, 227-234.	1.2	76
471	Transmembrane domains of viral ion channel proteins: A molecular dynamics simulation study. Biopolymers, 2000, 53, 529-538.	1.2	29
472	Solution structure of BmKTX, a K+ blocker toxin from the Chinese scorpionButhus Martensi. , 2000, 38, 70-78.		40
473	Modeling of ion permeation in calcium and sodium channel selectivity filters. , 2000, 38, 384-392.		8
474	Structural and functional differences of two toxins from the scorpionPandinus imperator. , 2000, 38, 441-449.		8
475	Side chains in transmembrane helices are shorter at helix-helix interfaces. Proteins: Structure, Function and Bioinformatics, 2000, 40, 429-435.	1.5	23
476	Protein structure in anisotropic environments: Development of orientational constraints. Concepts in Magnetic Resonance, 2000, 12, 55-70.	1.3	42
477	Structure-function relationships of integral membrane proteins: Membrane transporters vs channels. Biopolymers, 2000, 55, 297-307.	1.2	22
478	A Resonance Model gives the Response to Membrane Potential for an Ion Channel: II. Simplification of the Calculation, and Prediction of Stochastic Resonance. Journal of Theoretical Biology, 2000, 206, 387-393.	0.8	8
479	Decreased cerebrospinal fluid levels of ?-phenylethylamine in patients with Rett syndrome. Annals of Neurology, 2000, 47, 801-803.	2.8	24

ARTICLE IF CITATIONS # Progression in Parkinson's disease: A positron emission tomography study with a dopamine 480 2.8 136 transporter ligand [18F]CFT. Annals of Neurology, 2000, 47, 804-808. Myelin widenings and MGUS-IgA: An immunoelectron microscopic study. Annals of Neurology, 2000, 481 2.8 47,808-811. Partial laminin ?2 chain deficiency in a patient with myopathy resembling inclusion body myositis. 482 2.8 37 Annals of Neurology, 2000, 47, 811-816. Rapid clearance of human immunodeficiency virus type 1 from ventricular cerebrospinal fluid during antiretroviral treatment. Annals of Neurology, 2000, 47, 816-819. A common mechanism for the control of eye and head movements in humans. Annals of Neurology, 484 2.8 33 2000, 47, 819-822. A novel mutation of KCNQ3 (c.925T?C) in a Japanese family with benign familial neonatal convulsions. Annals of Neurology, 2000, 47, 822-826. 2.8 104 Changes of copper-transporting proteins and ceruloplasmin in the lentiform nuclei in primary 486 2.8 54 adult-onset dystonia. Annals of Neurology, 2000, 47, 827-830. The molecular biology of the autosomal-dominant cerebellar ataxias. Movement Disorders, 2000, 15, 49 604-612. New missense mutation (G626V) in the predicted selectivity filter of the HERG channel associated with 489 1.1 1 familial long QT syndrome. Human Mutation, 2000, 15, 584-584. Experimental Evidence for Alkali Metal Cationâ[~]ï€ Interactions. European Journal of Organic Chemistry, 1.2 2000, 2000, 2967-2978. Channel-like structures formed from extended networks of 4,13-diaza-18-crown-6 complexes. 491 2 1.2 Inorganica Chimica Acta, 2000, 300-302, 333-338. Tansley Review No. 109.. New Phytologist, 2000, 145, 167-196. 3.5 Biochemical characterization of the Arabidopsis K+ channels KAT1 and AKT1 expressed or co-expressed 493 2.8 39 in insect cells. Plant Journal, 2000, 23, 527-538. The N-terminal portion of the main cytosolic loop mediates K+ sensitivity in the retinal rod 494 0.2 Na+/Ca2+-K+-exchanger. FEBS Journal, 2000, 267, 2461-2472. Polyamines as gating molecules of inward-rectifier K+channels. FEBS Journal, 2000, 267, 5824-5829. 495 0.2 71 KATPchannels gated by intracellular nucleotides and phospholipids. FEBS Journal, 2000, 267, 5842-5848. Electronic excitation as a mechanism of the ion selectivity filter. Spectrochimica Acta - Part A: 497 2.0 5 Molecular and Biomolecular Spectroscopy, 2000, 56, 1423-1432. Ion channels: doing hard chemistry with hard ions. Current Opinion in Chemical Biology, 2000, 4, 498 2.8 148-151.

#	Article	IF	CITATIONS
499	Structures of the intradiskal loops and amino terminus of the G-protein receptor, rhodopsin. Chemical Biology and Drug Design, 2000, 55, 455-465.	1.2	38
500	Channel-forming, self-assembling, bishelical amphiphilic peptides: design, synthesis and crystal structure of Py(Aib n)2 , n $\hat{a} \in f = \hat{a} \in f 2$, 3, 4. Chemical Biology and Drug Design, 2000, 56, 416-426.	1.2	10
501	News. Journal of Molecular Graphics and Modelling, 2000, 18, 605-652.	1.3	26
502	Riding the wave: structural and energetic principles of helical membrane proteins. Current Opinion in Biotechnology, 2000, 11, 67-71.	3.3	33
503	Electrodiffusion in ionic channels of biological membranes. Journal of Molecular Liquids, 2000, 87, 149-162.	2.3	50
504	Molecular dynamics study of structure and gating of low molecular weight ion channels. Parallel Computing, 2000, 26, 965-976.	1.3	6
505	New perspectives on hydrophobic effects. Chemical Physics, 2000, 258, 349-370.	0.9	286
506	Molecular dynamics estimates of ion diffusion in model hydrophobic and KcsA potassium channels. Biophysical Chemistry, 2000, 86, 1-14.	1.5	62
507	Channel-Specific Therapy of Cardiac Arrhythmias in Our Time?. Journal of Cardiovascular Electrophysiology, 2000, 11, 369-370.	0.8	1
508	Three-dimensional structure of the ion-coupled transport protein NhaA. Nature, 2000, 403, 112-115.	13.7	271
509	An orphan glutamate channel points the way to the gates. Nature Neuroscience, 2000, 3, 301-302.	7.1	3
510	Mutation of a glutamate receptor motif reveals its role in gating and \hat{I} receptor channel properties. Nature Neuroscience, 2000, 3, 315-322.	7.1	199
511	Tethered blockers as molecular 'tape measures' for a voltage-gated K+ channel. Nature Structural Biology, 2000, 7, 309-311.	9.7	96
512	Voltage dependent activation of potassium channels is coupled to T1 domain structure. Nature Structural Biology, 2000, 7, 403-407.	9.7	95
513	New roles for structure in biology and drug discovery. , 2000, 7, 928-930.		189
514	Fraternal twins: AQP1 and GlpF. , 2000, 7, 1082-1084.		16
515	Effects of halothane on the transient outward K+ current in rat ventricular myocytes. British Journal of Pharmacology, 2000, 131, 223-230.	2.7	23
516	Blocker protection in the pore of a voltage-gated K+ channel and its structural implications. Nature, 2000, 403, 321-325.	13.7	342

		CITATION RE	PORT	
#	Article		IF	Citations
517	Ion permeation mechanism of the potassium channel. Nature, 2000, 404, 881-884.		13.7	418
518	Crystal structure of the calcium pump of sarcoplasmic reticulum at 2.6 Ã resolution. N 405, 647-655.	ature, 2000,	13.7	1,793
519	Structural determinants of water permeation through aquaporin-1. Nature, 2000, 407, 5	;99-605.	13.7	1,584
520	Potassium inhibition of sodiumâ€activated potassium (K Na) channels in guineaâ€pig v Journal of Physiology, 2000, 526, 81-90.	entricular myocytes.	1.3	15
521	A residue in the intracellular vestibule of the pore is critical for gating and permeation in $\hat{a} \in \mathbf{a}$ ctivated K + (BK Ca) channels. Journal of Physiology, 2000, 529, 131-138.	Ca 2+	1.3	24
522	Residues beyond the selectivity filter of the K + channel Kir2.1 regulate permeation and external Rb + and Cs +. Journal of Physiology, 2000, 526, 231-240.	block by	1.3	55
523	A single residue contributes to the difference between Kir4.1 and Kir1.1 channels in pH s rectification and single channel conductance. Journal of Physiology, 2000, 528, 267-277		1.3	28
524	Solvent effects on squid sodium channels are attributable to movements of a flexible prostructure in gating currents and to hydration in a pore. Journal of Physiology, 2000, 522	otein , 357-373.	1.3	19
525	Regulation of transient Na + conductance by intra―and extracellular K + in the human rectifier K + channel Kv1.5. Journal of Physiology, 2000, 523, 575-591.	delayed	1.3	33
526	Molecular determinants of inactivation in voltageâ€gated Ca 2+ channels. Journal of Phy 528, 237-249.	vsiology, 2000,	1.3	122
527	Evidence for a Cardiac Ion Channel Mutation Underlying Drug-Induced QT Prolongation Life-Threatening Arrhythmias. Journal of Cardiovascular Electrophysiology, 2000, 11, 692	and 1-696.	0.8	312
528	Voltage-gated sodium channels as therapeutic targets. Drug Discovery Today, 2000, 5, 5	506-520.	3.2	209
529	Potassium transport in fungi and plants. BBA - Biomembranes, 2000, 1469, 1-30.		7.9	416
530	Understanding the insertion of transporters and other membrane proteins. Current Opin Biology, 2000, 12, 435-442.	nion in Cell	2.6	17
531	Signalling mechanisms. Current Opinion in Neurobiology, 2000, 10, 625-630.		2.0	3
532	Membrane protein assemblies — towards atomic resolution analysis Commentary. Cur Structural Biology, 2000, 10, 208-212.	rent Opinion in	2.6	6
533	Potassium channel structure: domain by domain. Current Opinion in Structural Biology, 456-461.	2000, 10,	2.6	47
534	Simulations of ion channels $\hat{a} \in$ watching ions and water move. Trends in Biochemical S 25, 368-374.	ciences, 2000,	3.7	84

#	Article	IF	CITATIONS
535	Bacterial export takes its Tol. Structure, 2000, 8, R171-R175.	1.6	3
536	Protein structural dynamics by single-molecule fluorescence polarization. Progress in Biophysics and Molecular Biology, 2000, 74, 1-35.	1.4	116
537	The structure and mechanism of bacterial type I signal peptidases. , 2000, 87, 27-49.		147
538	A computational study of ion binding and protonation states in the KcsA potassium channel. BBA - Proteins and Proteomics, 2000, 1481, 360-370.	2.1	71
539	Pharmacological receptors: a century of discovery — and more. Pharmaceutica Acta Helvetiae, 2000, 74, 79-84.	1.2	11
540	Excitatory amino acid agonists and antagonists: pharmacology and therapeutic applications. Pharmaceutica Acta Helvetiae, 2000, 74, 221-229.	1.2	64
541	Title is missing!. Journal of Fluorescence, 2000, 10, 127-127.	1.3	5
542	Mesoscopic surfactant organization and membrane protein crystallization. Protein Science, 2000, 9, 1407-1409.	3.1	5
543	Efficient membrane assembly of the KcsA potassium channel in Escherichia coli requires the protonmotive force. EMBO Reports, 2000, 1, 340-346.	2.0	31
544	Structure of a Glycerol-Conducting Channel and the Basis for Its Selectivity. Science, 2000, 290, 481-486.	6.0	938
545	Molecular water pumps. , 2000, 141, 97-151.		37
546	Cation Permeability and Selectivity of a Root Plasma Membrane Calcium Channel. Journal of Membrane Biology, 2000, 174, 71-83.	1.0	28
547	Direct Comparison of NPPB and DPC as Probes of CFTR Expressed in Xenopus Oocytes. Journal of Membrane Biology, 2000, 175, 35-52.	1.0	88
548	The β-Cell K ATP Channel. Journal of Membrane Biology, 2000, 176, 187-206.	1.0	50
549	Temperature Sensitivity of the Tonoplast Ca 2+ -Activated K + Channel in Chara: The Influence of Reversing the Sign of Membrane Potential. Journal of Membrane Biology, 2000, 178, 215-224.	1.0	2
550	Families of Proteins Forming Transmembrane Channels. Journal of Membrane Biology, 2000, 175, 165-180.	1.0	49
551	The β-Cell KATP Channel. Journal of Membrane Biology, 2000, 176, 187-206.	1.0	37
552	The nicotinic acetylcholine receptor: from molecular model to single-channel conductance. European Biophysics Journal, 2000, 29, 29-37.	1.2	20

	CITATION	Report	
#	Article	IF	Citations
553	Ion channels and receptors: molecular targets for behavioral evolution. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 2000, 186, 605-616.	0.7	20
554	Sticky-finger interaction sites on cytosolic lipid-binding proteins?. Cellular and Molecular Life Sciences, 2000, 57, 1379-1387.	2.4	12
555	The plasma membrane proton-translocating ATPase. Cellular and Molecular Life Sciences, 2000, 57, 871-883.	2.4	14
556	Structural Insights Into NMDA Ionotropic Glutamate Receptors via Molecular Modelling. Journal of Molecular Modeling, 2000, 6, 16-25.	0.8	8
557	Cyclic nucleotide-gated channels: intra- and extracellular accessibility to Cd2+ of substituted cysteine residues within the P-loop. Pflugers Archiv European Journal of Physiology, 2000, 440, 556-565.	1.3	27
558	Cs+ block of the cardiac muscarinic K+ channel, GIRK1/GIRK4, is not dependent on the aspartate residue at position 173. Pflugers Archiv European Journal of Physiology, 2000, 440, 740-744.	1.3	3
559	Intracellular regulation of inward rectifier K+ channels. Pflugers Archiv European Journal of Physiology, 2000, 441, 1-11.	1.3	79
560	Modification of $\hat{I}\pm$ subunit of RIIA sodium channels by aconitine. Pflugers Archiv European Journal of Physiology, 2000, 439, 349-355.	1.3	8
561	Modification of wild-type and batrachotoxin-resistant muscle µ1 Na + channels by veratridine. Pflugers Archiv European Journal of Physiology, 2000, 439, 705-713.	1.3	6
562	Cloning, localisation and functional expression of the human orthologue of the TREK-1 potassium channel. Pflugers Archiv European Journal of Physiology, 2000, 439, 714-722.	1.3	33
563	Coupling of SUR1 and K _{IR} 6.2 Specify the Properties of β-Cell K _{ATP} Channels. , 2000, 15, 44-60.		0
564	Mechanisms of <i>I</i> _{Ks} suppression in LQT1 mutants. American Journal of Physiology - Heart and Circulatory Physiology, 2000, 279, H3003-H3011.	1.5	68
565	Structure and function of aquaporin water channels. American Journal of Physiology - Renal Physiology, 2000, 278, F13-F28.	1.3	558
566	The Voltage Sensor in Voltage-Dependent Ion Channels. Physiological Reviews, 2000, 80, 555-592.	13.1	825
567	Anion Transport in Heart. Physiological Reviews, 2000, 80, 31-81.	13.1	208
568	Charged residues in the M2 region of α-hENaC play a role in channel conductance. American Journal of Physiology - Cell Physiology, 2000, 278, C277-C291.	2.1	26
569	Extracellular Surface Charges in Voltage-Gated Ion Channels. Physiology, 2000, 15, 15-19.	1.6	6
570	Measurement and Interpretation of Cytoplasmic [Ca2+] Signals From Calcium-Indicator Dyes. Physiology, 2000, 15, 19-26.	1.6	12

#	Article	IF	CITATIONS
571	Mutants of a Temperature-Sensitive Two-P Domain Potassium Channel. Journal of Neuroscience, 2000, 20, 7517-7524.	1.7	56
572	Modeling of dendritic computation: The single dendrite. AIP Conference Proceedings, 2000, , .	0.3	4
573	One-Hundred Years of Inquiry: The Mechanism of Glucose Absorption in the Intestine. Annual Review of Physiology, 2000, 62, 939-946.	5.6	9
574	Receptor antagonists targeting transmembrane domains. Expert Opinion on Emerging Drugs, 2000, 5, 221-229.	1.1	1
575	Side Chain Orientation in the Selectivity Filter of a Voltage-gated Ca2+ Channel. Journal of Biological Chemistry, 2000, 275, 31778-31785.	1.6	38
576	Manganese Selectivity of Pmr1, the Yeast Secretory Pathway Ion Pump, Is Defined by Residue Gln783 in Transmembrane Segment 6. Journal of Biological Chemistry, 2000, 275, 23933-23938.	1.6	101
577	Design of a potent and selective inhibitor of the intermediate-conductance Ca2+-activated K+ channel, IKCa1: A potential immunosuppressant. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 8151-8156.	3.3	553
578	Structure and Dynamics of the Pore of Inwardly Rectifying KATP Channels. Journal of Biological Chemistry, 2000, 275, 1137-1144.	1.6	87
579	Reversal of charge selectivity in transmembrane protein pores by using noncovalent molecular adapters. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 3959-3964.	3.3	129
580	Architecture of Ca2+ Channel Pore-lining Segments Revealed by Covalent Modification of Substituted Cysteines. Journal of Biological Chemistry, 2000, 275, 34493-34500.	1.6	32
581	A critical residue for isoform difference in tetrodotoxin affinity is a molecular determinant of the external access path for local anesthetics in the cardiac sodium channel. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 2326-2331.	3.3	60
582	An artificial tetramerization domain restores efficient assembly of functional Shaker channels lacking T1. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 3591-3595.	3.3	86
583	Structural Differences of Bacterial and Mammalian K+Channels. Journal of Biological Chemistry, 2000, 275, 39345-39353.	1.6	20
584	The Intrinsic Electrostatic Potential and the Intermediate Ring of Charge in the Acetylcholine Receptor Channel. Journal of General Physiology, 2000, 115, 93-106.	0.9	53
585	Ion Interactions in the High-Affinity Binding Locus of a Voltage-Gated Ca2+ Channel. Journal of General Physiology, 2000, 116, 569-586.	0.9	27
586	Permeation of Large Tetra-Alkylammonium Cations through Mutant and Wild-Type Voltage-Gated Sodium Channels as Revealed by Relief of Block at High Voltage. Journal of General Physiology, 2000, 115, 435-454.	0.9	41
587	The Lipid–Protein Interface of aShaker K+ Channel. Journal of General Physiology, 2000, 115, 51-58.	0.9	119
588	The Barium Site in a Potassium Channel by X-Ray Crystallography. Journal of General Physiology, 2000, 115, 269-272.	0.9	192

#	Article	IF	CITATIONS
589	Crystallographic Analyses of Ion Channels: Lessons and Challenges. Journal of Biological Chemistry, 2000, 275, 713-716.	1.6	41
590	Structure-guided Transformation of Charybdotoxin Yields an Analog That Selectively Targets Ca2+-activated over Voltage-gated K+ Channels. Journal of Biological Chemistry, 2000, 275, 1201-1208.	1.6	94
591	Phosphatidylinositol 4,5-Bisphosphate and Intracellular pH Regulate the ROMK1 Potassium Channel via Separate but Interrelated Mechanisms. Journal of Biological Chemistry, 2000, 275, 10182-10189.	1.6	69
592	Internal packing of helical membrane proteins. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 5796-5801.	3.3	239
593	Localization and Molecular Determinants of the Hanatoxin Receptors on the Voltage-Sensing Domains of a K+ Channel. Journal of General Physiology, 2000, 115, 673-684.	0.9	125
594	Gain of Function Mutants: Ion Channels and G Protein-Coupled Receptors. Annual Review of Neuroscience, 2000, 23, 89-125.	5.0	33
595	LQT2. Circulation Research, 2000, 86, 492-493.	2.0	14
596	TREK-2, a New Member of the Mechanosensitive Tandem-pore K+ Channel Family. Journal of Biological Chemistry, 2000, 275, 17412-17419.	1.6	239
597	Hereditary hypokalemic salt-losing tubulopathies. , 2000, , 327-354.		0
598	Fast Inactivation of Voltage-dependent Calcium Channels. Journal of Biological Chemistry, 2000, 275, 24575-24582.	1.6	92
599	Partial Deletion of a Loop Region in the High Affinity K+ Transporter HKT1 Changes Ionic Permeability Leading to Increased Salt Tolerance. Journal of Biological Chemistry, 2000, 275, 27924-27932.	1.6	32
600	Pharmacological receptors: a century of discovery — and more. Pharmacochemistry Library, 2000, 31, 79-84.	0.1	1
601	Tandem Pore Domain K Channels An Important Site of Volatile Anesthetic Action. Current Drug Targets, 2000, 1, 207-217.	1.0	16
602	K+ channels and colonic function. , 2000, 140, 1-62.		40
603	Synthetic, Sodium-Ion-Conducting Tris(Macrocycle) Channels that Function in a Phospholipid Bilayer Membrane: An Overview. Supramolecular Chemistry, 2000, 12, 13-22.	1.5	1
604	Hetero-concatemeric KIR6.X4/SUR14 Channels Display Distinct Conductivities but Uniform ATP Inhibition. Journal of Biological Chemistry, 2000, 275, 31563-31566.	1.6	24
605	TASK-3, a New Member of the Tandem Pore K+ Channel Family. Journal of Biological Chemistry, 2000, 275, 9340-9347.	1.6	323
606	Dynamic Control of Deactivation Gating by a Soluble Amino-Terminal Domain in HERG K+ Channels. Journal of General Physiology, 2000, 115, 749-758.	0.9	92

#	Article	IF	CITATIONS
607	Comparing and Contrasting Escherichia coliand Mycobacterium tuberculosis Mechanosensitive Channels (MscL). Journal of Biological Chemistry, 2000, 275, 22238-22244.	1.6	60
608	Structure of the Influenza C Virus CM2 Protein Transmembrane Domain Obtained by Site-specific Infrared Dichroism and Global Molecular Dynamics Searching. Journal of Biological Chemistry, 2000, 275, 4225-4229.	1.6	36
609	Glycosylation of GIRK1 at Asn119 and ROMK1 at Asn117 Has Different Consequences in Potassium Channel Function. Journal of Biological Chemistry, 2000, 275, 30677-30682.	1.6	25
610	Spectrum of Mutations in Long-QT Syndrome Genes. Circulation, 2000, 102, 1178-1185.	1.6	1,157
611	Structure and Packing Orientation of Transmembrane Segments in Voltage-Dependent Channels. Journal of General Physiology, 2000, 115, 29-32.	0.9	6
612	μ-Conotoxin Giiia Interactions with the Voltage-Gated Na+ Channel Predict a Clockwise Arrangement of the Domains. Journal of General Physiology, 2000, 116, 679-690.	0.9	93
613	Ion–Ion Interactions at the Selectivity Filter. Journal of General Physiology, 2000, 115, 509-518.	0.9	29
614	The Eeee Locus Is the Sole High-Affinity Ca2+ Binding Structure in the Pore of a Voltage-Gated Ca2+ Channel. Journal of General Physiology, 2000, 116, 349-362.	0.9	47
615	Characterization of the Selectivity Filter of the Epithelial Sodium Channel. Journal of Biological Chemistry, 2000, 275, 8572-8581.	1.6	80
616	Opening and Closing of KcnkÃ~ Potassium Leak Channels Is Tightly Regulated. Journal of General Physiology, 2000, 116, 721-734.	0.9	42
617	General Anesthetic Action at an Internal Protein Site Involving the S4-S5 Cytoplasmic Loop of a Neuronal K+Channel. Journal of Biological Chemistry, 2000, 275, 4928-4936.	1.6	36
618	Voltage Dependence of Slow Inactivation in Shaker Potassium Channels Results from Changes in Relative K+ and Na+ Permeabilities. Journal of General Physiology, 2000, 115, 107-122.	0.9	15
619	Bacteriocin AS-48, a microbial cyclic polypeptide structurally and functionally related to mammalian NK-lysin. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 11221-11226.	3.3	170
620	Structural determinants of scorpion toxin affinity: The charybdotoxin (α-KTX) family of K+-channel blocking peptides. Reviews of Physiology, Biochemistry and Pharmacology, 2000, 140, 135-185.	0.9	30
621	Trapping of a Methanesulfonanilide by Closure of the Herg Potassium Channel Activation Gate. Journal of General Physiology, 2000, 115, 229-240.	0.9	251
622	Effects of Organic Antagonists of Ca2+, Na+, and K+ on Chemotaxis and Motility ofEscherichia coli. Journal of Bacteriology, 2000, 182, 4856-4861.	1.0	40
623	Functional Properties of Recombinant Type I and Type III Inositol 1,4,5-Trisphosphate Receptor Isoforms Expressed in COS-7 Cells. Journal of Biological Chemistry, 2000, 275, 21492-21499.	1.6	77
624	Molecular Coupling of S4 to a K+ Channel's Slow Inactivation Gate. Journal of General Physiology, 2000, 116, 623-636.	0.9	102

#	Article	IF	CITATIONS
625	A structural basis for drug-induced long QT syndrome. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 12329-12333.	3.3	918
626	Constraining the subunit order of rod cyclic nucleotide-gated channels reveals a diagonal arrangement of like subunits. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 895-900.	3.3	36
627	The Accessibility of a Novel Reentrant Loop of the Glutamate Transporter GLT-1 Is Restricted by Its Substrate. Journal of Biological Chemistry, 2000, 275, 9684-9689.	1.6	127
628	Single Amino Acid Substitutions in κ-Conotoxin PVIIA Disrupt Interaction with the Shaker K+ Channel. Journal of Biological Chemistry, 2000, 275, 24639-24644.	1.6	55
629	TASK-3, a Novel Tandem Pore Domain Acid-sensitive K+Channel. Journal of Biological Chemistry, 2000, 275, 16650-16657.	1.6	272
630	Identification of an Aspartic Residue in the P-loop of the Vanilloid Receptor That Modulates Pore Properties. Journal of Biological Chemistry, 2000, 275, 32552-32558.	1.6	160
631	The Na+/Ca2+ Exchanger NCX1 Has Oppositely Oriented Reentrant Loop Domains That Contain Conserved Aspartic Acids Whose Mutation Alters Its Apparent Ca2+Affinity. Journal of Biological Chemistry, 2000, 275, 38571-38580.	1.6	93
632	Effects of pore mutations and permeant ion concentration on the spontaneous gating activity of OmpC porin. Protein Engineering, Design and Selection, 2000, 13, 491-500.	1.0	26
633	α-Helical Structural Elements within the Voltage-Sensing Domains of a K+ Channel. Journal of General Physiology, 2000, 115, 33-50.	0.9	172
634	Permeation Properties of Inward-Rectifier Potassium Channels and Their Molecular Determinants. Journal of General Physiology, 2000, 115, 391-404.	0.9	84
635	Dominant-Negative Mutants Identify a Role for Girk Channels in D3 Dopamine Receptor-Mediated Regulation of Spontaneous Secretory Activity. Journal of General Physiology, 2000, 115, 697-706.	0.9	46
636	Collapse of Conductance Is Prevented by a Glutamate Residue Conserved in Voltage-Dependent K+ Channels. Journal of General Physiology, 2000, 116, 181-190.	0.9	35
637	"Light―Reading. Journal of General Physiology, 2000, 116, 223-226.	0.9	1
638	Effects of Ultraviolet Modification on the Gating Energetics of Cyclic Nucleotide–Gated Channels. Journal of General Physiology, 2000, 116, 253-282.	0.9	10
639	NMR Solution Structure of Butantoxin. Archives of Biochemistry and Biophysics, 2000, 379, 18-27.	1.4	32
640	Solution Structure of BmP01 from the Venom of Scorpion Buthus martensii Karsch. Biochemical and Biophysical Research Communications, 2000, 276, 1148-1154.	1.0	23
641	Structural clues in the sequences of the aquaporins. Journal of Molecular Biology, 2000, 295, 1039-1053.	2.0	147
642	Energetic and structural interactions between δ-dendrotoxin and a voltage-gated potassium channel 1 1Edited by G. von Heijne. Journal of Molecular Biology, 2000, 296, 1283-1294.	2.0	73

#	Article	IF	CITATIONS
643	The Fold of Human Aquaporin 1. Journal of Molecular Biology, 2000, 300, 987-994.	2.0	34
644	Size versus polarizability in protein-ligand interactions: binding of noble gases within engineered cavities in phage T4 lysozyme. Journal of Molecular Biology, 2000, 302, 955-977.	2.0	112
645	A Robust, Detergent-Friendly Method for Mass Spectrometric Analysis of Integral Membrane Proteins. Analytical Chemistry, 2000, 72, 5655-5658.	3.2	164
646	Nicotinic Receptors at the Amino Acid Level. Annual Review of Pharmacology and Toxicology, 2000, 40, 431-458.	4.2	757
647	Three-Dimensional Poisson-Nernst-Planck Theory Studies: Influence of Membrane Electrostatics on Gramicidin A Channel Conductance. Biophysical Journal, 2000, 79, 80-93.	0.2	163
648	Secondary Structure Components and Properties of the Melibiose Permease from Escherichia coli: A Fourier Transform Infrared Spectroscopy Analysis. Biophysical Journal, 2000, 79, 747-755.	0.2	39
649	Replacement of Glycine 232 by Aspartic Acid in the KdpA Subunit Broadens the Ion Specificity of the K+-Translocating KdpFABC Complex. Biophysical Journal, 2000, 79, 802-813.	0.2	22
650	Evidence for a Role of the Lumenal M3-M4 Loop in Skeletal Muscle Ca2+ Release Channel (Ryanodine) Tj ETQq1	1 0,78431 0.2	4 rgBT /Over 141
651	MinK Endows the IKs Potassium Channel Pore with Sensitivity to Internal Tetraethylammonium. Biophysical Journal, 2000, 79, 1369-1378.	0.2	24
652	Residues in Na+ Channel D3-S6 Segment Modulate both Batrachotoxin and Local Anesthetic Affinities. Biophysical Journal, 2000, 79, 1379-1387.	0.2	98
653	Ion Channel Selectivity Using an Electric Stew. Biophysical Journal, 2000, 79, 1691-1692.	0.2	16
654	Molecular Motions in Fourier Transform Space. Biophysical Journal, 2000, 79, 1692-1694.	0.2	2
655	Selectivity in Lipid Binding to the Bacterial Outer Membrane Protein OmpF. Biophysical Journal, 2000, 79, 2066-2074.	0.2	78
656	A High-Na+ Conduction State during Recovery from Inactivation in the K+ Channel Kv1.5. Biophysical Journal, 2000, 79, 2416-2433.	0.2	33
657	The Interaction of Na+ and K+ in the Pore of CyclicNucleotide-Gated Channels. Biophysical Journal, 2000, 79, 2475-2493.	0.2	21
658	Two Mechanisms of K+-Dependent Potentiation in Kv2.1 Potassium Channels. Biophysical Journal, 2000, 79, 2535-2546.	0.2	22
659	Inclusion-Induced Bilayer Deformations: Effects of Monolayer Equilibrium Curvature. Biophysical Journal, 2000, 79, 2583-2604.	0.2	146
660	Serine and Threonine Residues Bend α-Helices in the χ1=gâ^' Conformation. Biophysical Journal, 2000, 79, 2754-2760.	0.2	173

#	Article	IF	CITATIONS
661	A Combined Molecular Dynamics and Diffusion Model of Single Proton Conduction through Gramicidin. Biophysical Journal, 2000, 79, 2840-2857.	0.2	65
662	The First Extracellular Loop Domain Is a Major Determinant of Charge Selectivity in Connexin46 Channels. Biophysical Journal, 2000, 79, 3036-3051.	0.2	121
663	The Anomalous Mole Fraction Effect in Chara: Gating at the Edge of Temporal Resolution. Biophysical Journal, 2000, 79, 3072-3082.	0.2	15
664	Exploring Models of the Influenza A M2 Channel: MD Simulations in a Phospholipid Bilayer. Biophysical Journal, 2000, 78, 55-69.	0.2	98
665	Structure and Dynamics of K Channel Pore-Lining Helices: A Comparative Simulation Study. Biophysical Journal, 2000, 78, 79-92.	0.2	72
666	Acceleration of P/C-Type Inactivation in Voltage-Gated K+ Channels by Methionine Oxidation. Biophysical Journal, 2000, 78, 174-187.	0.2	47
667	Does the KdpA Subunit from the High Affinity K+-Translocating P-Type KDP-ATPase have a Structure Similar to That of K+ Channels?. Biophysical Journal, 2000, 78, 188-199.	0.2	67
668	Simulations of Ion Permeation Through a Potassium Channel: Molecular Dynamics of KcsA in a Phospholipid Bilayer. Biophysical Journal, 2000, 78, 557-570.	0.2	261
669	A Designed Four-α-Helix Bundle That Binds the Volatile General Anesthetic Halothane with High Affinity. Biophysical Journal, 2000, 78, 982-993.	0.2	70
670	Backbone Dipoles Generate Positive Potentials in all Proteins: Origins and Implications of the Effect. Biophysical Journal, 2000, 78, 1126-1144.	0.2	82
671	Properties of the Stochastic Energization-Relaxation Channel Model for Vectorial Ion Transport. Biophysical Journal, 2000, 78, 1166-1175.	0.2	10
672	Protonation of Lysine Residues Inverts Cation/Anion Selectivity in a Model Channel. Biophysical Journal, 2000, 78, 1335-1348.	0.2	42
673	Chloride Channels of Glycine and GABA Receptors with Blockers: Monte Carlo Minimization and Structure-Activity Relationships. Biophysical Journal, 2000, 78, 1786-1803.	0.2	78
674	Local Movement in the S2 Region of the Voltage-Gated Potassium Channel hKv2.1 Studied Using Cysteine Mutagenesis. Biophysical Journal, 2000, 78, 1852-1861.	0.2	17
675	Mutation in Pore Domain Uncovers Cation- and Voltage-Sensitive Recovery from Inactivation in KAT1 Channel. Biophysical Journal, 2000, 78, 1862-1871.	0.2	11
676	The Kinetic and Physical Basis of KATP Channel Gating: Toward a Unified Molecular Understanding. Biophysical Journal, 2000, 78, 2334-2348.	0.2	157
677	Tests of Continuum Theories as Models of Ion Channels. II. Poisson–Nernst–Planck Theory versus Brownian Dynamics. Biophysical Journal, 2000, 78, 2364-2381.	0.2	311
678	Electrostatic Interaction between Charybdotoxin and a Tetrameric Mutant of Shaker K+ Channels. Biophysical Journal, 2000, 78, 2382-2391.	0.2	16

CITATION REPORT IF CITATIONS Molecular Dynamics of the KcsA K+ Channel in a Bilayer Membrane. Biophysical Journal, 2000, 78, 0.2 314 Homology Modeling and Molecular Dynamics Simulation Studies of an Inward Rectifier Potassium Channel. Biophysical Journal, 2000, 78, 2929-2942. 0.2 Molecular Determinants of Anion Selectivity in the Cystic Fibrosis Transmembrane Conductance 0.2 90 Regulator Chloride Channel Pore. Biophysical Journal, 2000, 78, 2973-2982. Modification of delayed rectifier potassium currents by the Kv9.1 potassium channel subunit. Hearing Hinges, swivels and switches: the role of prolines in signalling via transmembrane α-helices. Trends in 4.0 293 Pharmacological Sciences, 2000, 21, 445-451. Taking Apart the Gating of Voltage-Gated K+ Channels. Neuron, 2000, 27, 423-425. 3.8 A Conserved Glutamate Is Important for Slow Inactivation in K+ Channels. Neuron, 2000, 27, 573-583. 101 3.8 Reconstructing Voltage Sensor–Pore Interaction from a Fluorescence Scan of a Voltage-Gated K+ Channel. Neuron, 2000, 27, 585-595. Mechanisms for Activation and Antagonism of an AMPA-Sensitive Glutamate Receptor. Neuron, 2000, 3.8 874

689	Neuron, 2000, 28, 899-909.	3.8	80
690	Ion Channel Surprises. Neuron, 2000, 25, 7-9.	3.8	12
691	A Localized Interaction Surface for Voltage-Sensing Domains on the Pore Domain of a K+ Channel. Neuron, 2000, 25, 411-423.	3.8	119
692	A New Twist in the Saga of Charge Movement in Voltage-Dependent Ion Channels. Neuron, 2000, 25, 511-514.	3.8	38

693	From Ionic Currents to Molecular Mechanisms. Neuron, 2000, 26, 13-25.	3.8	1,920
694	Molecular Basis for K ATP Assembly. Neuron, 2000, 26, 155-167.	3.8	151
695	A pragmatic approach to structure based calculation of coupled proton and electron transfer in proteins. Biochimica Et Biophysica Acta - Bioenergetics, 2000, 1458, 63-87.	0.5	69
696	Structural interpretations of FO rotary function in the Escherichia coli F1FO ATP synthase. Biochimica Et Biophysica Acta - Bioenergetics, 2000, 1458, 387-403.	0.5	59
697	Molecular insights into the structure and function of plant K+ transport mechanisms. Biochimica Et Biophysica Acta - Biomembranes, 2000, 1465, 127-139.	1.4	93

ARTICLE

2900-2917.

Research, 2000, 147, 21-30.

679

681

683

686

688

28, 165-181.

#	ARTICLE Calcium channels in higher plants. Biochimica Et Biophysica Acta - Biomembranes, 2000, 1465, 171-189.	IF 1.4	Citations 303
699	A model of calcium channels. Biochimica Et Biophysica Acta - Biomembranes, 2000, 1509, 1-6.	1.4	33
700	A point mutation in the maxi-K clone dSlo forms a high affinity site for charybdotoxin. Neuropharmacology, 2000, 39, 11-20.	2.0	10
701	The Polar T1 Interface Is Linked to Conformational Changes that Open the Voltage-Gated Potassium Channel. Cell, 2000, 102, 657-670.	13.5	174
702	Neural Science. Cell, 2000, 100, 1-55.	13.5	73
703	Pore mutations affecting tetrameric assembly and functioning of the potassium channel KcsA from Streptomyces lividans. FEBS Letters, 2000, 472, 83-87.	1.3	48
704	Water and potassium dynamics inside the KcsA K+ channel. FEBS Letters, 2000, 477, 37-42.	1.3	108
705	Arginine-rich peptides are blockers of VR-1 channels with analgesic activity. FEBS Letters, 2000, 481, 131-136.	1.3	54
706	Investigation of the molecular assembly of \hat{l}^2 -cell KATP channels. FEBS Letters, 2000, 482, 59-64.	1.3	21
707	Function of the cytosolic N-terminus of sucrose transporter AtSUT2 in substrate affinity. FEBS Letters, 2000, 485, 189-194.	1.3	78
708	Expression, purification, and initial structural characterization of YadQ, a bacterial homolog of mammalian ClC chloride channel proteins. FEBS Letters, 2000, 466, 26-28.	1.3	17
709	Stable cation coordination at a single outer pore residue defines permeation properties in Kir channels. FEBS Letters, 2000, 466, 115-120.	1.3	26
710	Generating a High Affinity Scorpion Toxin Receptor in KcsA-Kv1.3 Chimeric Potassium Channels. Journal of Biological Chemistry, 2000, 275, 16918-16924.	1.6	67
711	Formation of Stable Vesicles fromN- or 3-Alkylindoles:Â Possible Evidence for Tryptophan as a Membrane Anchor in Proteins. Journal of Organic Chemistry, 2000, 65, 5901-5909.	1.7	32
712	A Potassium Channel Protein Encoded by Chlorella Virus PBCV-1. Science, 2000, 287, 1641-1644.	6.0	166
713	Structure of the Cytoplasmic beta SubunitT1 Assembly of Voltage-Dependent K+ Channels. Science, 2000, 289, 123-127.	6.0	311
714	Neuroscience: Breaking Down Scientific Barriers to the Study of Brain and Mind. Science, 2000, 290, 1113-1120.	6.0	200
715	A Century of Thinking About Cell Membranes. Annual Review of Physiology, 2000, 62, 919-926.	5.6	30

#	Article	IF	CITATIONS
716	An overview of the potassium channel family. Genome Biology, 2000, 1, reviews0004.1.	13.9	169
717	Helical Membrane Protein Folding, Stability, and Evolution. Annual Review of Biochemistry, 2000, 69, 881-922.	5.0	582
718	A Decade of CLC Chloride Channels: Structure, Mechanism, and Many Unsettled Questions. Annual Review of Biophysics and Biomolecular Structure, 2000, 29, 411-438.	18.3	167
719	Pharmacology of Ionic Channel Function: Activators and Inhibitors. Handbook of Experimental Pharmacology, 2000, , .	0.9	7
720	Size Selectivity of Narrow Pores. Physical Review Letters, 2000, 85, 1132-1135.	2.9	63
721	Modification of wild-type and batrachotoxin-resistant muscle µ1 Na+ channels by veratridine. Pflugers Archiv European Journal of Physiology, 2000, 439, 705-713.	1.3	11
722	Cloning, localisation and functional expression of the human orthologue of the TREK-1 potassium channel. Pflugers Archiv European Journal of Physiology, 2000, 439, 714-722.	1.3	69
723	Modification of α subunit of RIIA sodium channels by aconitine. Pflugers Archiv European Journal of Physiology, 2000, 439, 349-355.	1.3	10
724	Voltage-Gated Calcium-Modulated Potassium Channels of Large Unitary Conductance: Structure, Diversity, and Pharmacology. Handbook of Experimental Pharmacology, 2000, , 197-223.	0.9	5
725	Channel structure and drug-induced cardiac arrhythmias. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 11683-11684.	3.3	15
726	The central â€~relay' unit in hydraphile channels as a model for the water-and-ion â€~capsule' of channel proteins. Chemical Communications, 2000, , 2371-2372.	2.2	31
727	Pyxophanes: selective gas phase ion complexation by 1,6,13,18-tetraoxa[6.6]paracyclophane-3,15-diyne. Chemical Communications, 2000, , 2377-2378.	2.2	9
728	Aggregate formation from 3-alkylindoles: amphiphilic models for interfacial helix anchoring groups. Chemical Communications, 2000, , 433-434.	2.2	11
729	Role of Aromatic Residues at the Lipidâ^Water Interface in Micelle-Bound Bacteriophage M13 Major Coat Proteinâ€. Biochemistry, 2000, 39, 16155-16162.	1.2	32
730	Solid-State23Na Nuclear Magnetic Resonance of Sodium Complexes with Crown Ethers, Cryptands, and Naturally Occurring Antibiotic Ionophores:Â A Direct Probe to the Sodium-Binding Sites. Journal of Physical Chemistry A, 2000, 104, 11844-11852.	1.1	43
731	KcsA Crystal Structure as Framework for a Molecular Model of the Na+Channel Poreâ€. Biochemistry, 2000, 39, 8161-8170.	1.2	177
732	NMR Studies of the Anti-Apoptotic Protein Bcl-xL in Micelles. Biochemistry, 2000, 39, 11024-11033.	1.2	96
733	Membrane Assembly of the Bacteriophage Pf3 Major Coat Protein. Biochemistry, 2000, 39, 6157-6163.	1.2	10

CITATION REPORT ARTICLE IF CITATIONS Evidence for a Role of Helix IV in Connecting Cation- and Sugar-Binding Sites of Escherichia 1.2 27 coliMelibiose Permeaseâ€. Biochemistry, 2000, 39, 4493-4499. Analysis of the Role of Interfacial Tryptophan Residues in Controlling the Topology of Membrane 1.2 Protéinsâ€. Biochemistry, 2000, 39, 6521-6528. Aspects of Protein Reaction Dynamics:  Deviations from Simple Behavior. Journal of Physical Chemistry 1.2 319 B, 2000, 104, 11-27. How Does Ammonium Interact with Aromatic Groups? A Density Functional Theory (DFT/B3LYP) Investigation. Journal of Physical Chemistry A, 2000, 104, 9573-9580. Transmembrane Biogenesis of Kv1.3. Biochemistry, 2000, 39, 824-836. 1.2 63 Structureâ[°] Activity Relationships for the Interaction of Bovine Pancreatic Trypsin Inhibitor with an Intracellular Site on a Large Conductance Ca2+-Activated K+ Channel. Biochemistry, 2000, 39, 1.2 2001-2012. Introduction of [2]Catenanes into Langmuir Films and Langmuirâ[°]Blodgett Multilayers. A Possible 1.6 76 Strategy for Molecular Information Storage Materials. Langmuir, 2000, 16, 1924-1930. Lateral Reorganization of Fluid Lipid Membranes in Response to the Electric Field Produced by a Buried 1.2 Charge. Journal of Physical Chemistry B, 2000, 104, 11409-11415. Mass Spectrometric Analysis of Mercury Incorporation into Proteins for X-ray Diffraction Phase 3.2 23 Determination. Analytical Chemistry, 2000, 72, 574-579. Male infertility and environmental exposure to lead and cadmium. Human Reproduction Update, 2000, 5.2 291 6, 107-121. A Synthetic Transmembrane Polyether Model Active in Lipid Bilayers. Organic Letters, 2000, 2, 3161-3164. 17 2.4 Ion Channels, Permeation, and Electrostatics: Insight into the Function of KcsA. Biochemistry, 2000, 1.2 39, 13295-13306. PACEMAKER OSCILLATIONS IN HEART AND BRAIN: A KEY ROLE FOR HYPERPOLARIZATION-ACTIVATED CATION 0.9 43 CHANNELS. Chronobiology International, 2000, 17, 453-469. A Hot Spot for the Interaction of Gating Modifier Toxins with Voltage-Dependent Ion Channels. Journal of General Physiology, 2000, 116, 637-644. The Hydration Number of Li+ in Liquid Water. Journal of the American Chemical Society, 2000, 122, 219 6.6 966-967. Conversation between Voltage Sensors and Gates of Ion Channels. Biochemistry, 2000, 39, 15653-15658. 1.2 Two Critical Cysteine Residues Implicated in Disulfide Bond Formation and Proper Folding of Kir2.1. 1.2 51 Biochemistry, 2000, 39, 4649-4657.

751	Proteomics on Full-Length Membrane Proteins Using Mass Spectrometryâ€. Biochemistry, 2000, 39, 4237-4242.	1.2	104
-----	-----------------------------------------------------------------------------------------------------------	-----	-----

#

734

736

738

740

742

743

744

745

746

747

748

749

ARTICLE IF CITATIONS # Monte Carlo Simulations of the Mechanism for Channel Selectivity:Â The Competition between Volume 752 1.2 115 Exclusion and Charge Neutrality. Journal of Physical Chemistry B, 2000, 104, 8903-8910. Interaction between Quaternary Ammonium Ions in the Pore of Potassium Channels. Journal of 753 General Physiology, 2000, 115, 769-782. Coupling ion specificity of chimeras between H+- and Na+-driven motor proteins, MotB and PomB, 754 3.5 53 inVibriopolar flagella. ÉMBO Journal, 2000, 19, 3639-3648. The potassium channel: Structure, selectivity and diffusion. Journal of Chemical Physics, 2000, 112, 1.2 134 8191-8204. Effects of Aromatic Residues at the Ends of Transmembrane α-Helices on Helix Interactions with Lipid 756 1.2 61 Bilayers. Biochemistry, 2000, 39, 2071-2078. Complexation of Na+and K+to Aromatic Amino Acids: A Density Functional Computational Study of Cation-ï€ Interactions. Journal of Physical Chemistry A, 2000, 104, 8067-8074. 1.1 758 Resistive-Pulse SensingFrom Microbes to Molecules. Chemical Reviews, 2000, 100, 2575-2594. 23.0 491 The Croonian Lecture 2000. Nicotinic acetylcholine receptor and the structural basis of fast synaptic transmission, Lecture delivered 5 October 2000 at University College London. Philosophical 1.8 Transactions of the Royal Society B: Biological Sciences, 2000, 355, 1813-1829. 760 Synthetic models of cation-conducting channels. Chemical Society Reviews, 2001, 30, 274-286. 18.7 253 Transmembrane Ion Channels Constructed of Cholic Acid Derivatives. Journal of Organic Chemistry, 1.7 2001, 66, 5094-5101. Molecular Diversity of Pacemaker Ion Channels. Annual Review of Physiology, 2001, 63, 235-257. 762 332 5.6 Recent Developments in the Biology and Medicinal Chemistry of Potassium Channel Modulators:  150 Update from a Decade of Progress. Journal of Medicinal Chemistry, 2001, 44, 1627-1653. Disorders of membrane channels or channelopathies. Clinical Neurophysiology, 2001, 112, 2-18. 764 0.7 59 Dynamics of biochemical and biophysical reactions: insight from computer simulations. Quarterly 2.4 Réviews of Biophysics, 2001, 34, 563-679. Emerging issues of connexin channels: biophysics fills the gap. Quarterly Reviews of Biophysics, 2001, 766 2.4 709 34, 325-472. Properties of Water Solutions of Electrolytes and Nonelectrolytes. Journal of Physical Chemistry B, 200 2001, 105, 7805-7817. Studies on the Structure of the G-Protein-Coupled Receptor Rhodopsin Including the Putative 768 1.2 97 G-Protein Binding Site in Unactivated and Activated Formsâ€. Biochemistry, 2001, 40, 11932-11937. Structure of MsbA from E. coli: A Homolog of the Multidrug Resistance ATP Binding Cassette (ABC) 769 646 Transporters. Science, 2001, 293, 1793-1800.

		CITATION REPORT		
#	Article		IF	CITATIONS
770	Models of permeation in ion channels. Reports on Progress in Physics, 2001, 64, 1427	1472.	8.1	158
772	Generalized solvent boundary potential for computer simulations. Journal of Chemical 114, 2924-2937.	Physics, 2001,	1.2	223
773	Pore-Forming Toxins. Current Topics in Microbiology and Immunology, 2001, , .		0.7	28
774	A Prokaryotic Voltage-Gated Sodium Channel. Science, 2001, 294, 2372-2375.		6.0	461
775	Homology Model of Dihydropyridine Receptor: Implications for L-type Ca2+ Channel M Agonists and Antagonists. Archives of Biochemistry and Biophysics, 2001, 393, 22-41.	odulation by	1.4	67
776	A Putative Prokaryote Voltage-Gated Ca2+ Channel with Only One 6TM Motif per Sub and Biophysical Research Communications, 2001, 281, 741-746.	ınit. Biochemical	1.0	50
777	Asymmetric Arrangement of Auxiliary Subunits of Skeletal Muscle Voltage-Gated L-Typ Biochemical and Biophysical Research Communications, 2001, 282, 284-291.	e Ca2+ Channel.	1.0	28
778	xCT Cystine Transporter Expression in HEK293 Cells: Pharmacology and Localization. B Biophysical Research Communications, 2001, 282, 1132-1137.	iochemical and	1.0	44
779	TASK-5, a New Member of the Tandem-Pore K+ Channel Family. Biochemical and Bioph Communications, 2001, 284, 923-930.	ysical Research	1.0	96
780	Mechanisms for ligand binding to GluR0 ion channels: crystal structures of the glutama complexes and a closed apo state. Journal of Molecular Biology, 2001, 311, 815-836.	ate and serine	2.0	141
781	Helix-helix packing and interfacial pairwise interactions of residues in membrane protei Molecular Biology, 2001, 311, 891-907.	ns. Journal of	2.0	175
782	IKr: The hERG Channel. Journal of Molecular and Cellular Cardiology, 2001, 33, 835-849	Э.	0.9	170
783	The Cardiac Sodium Channel: Gating Function and Molecular Pharmacology. Journal of and Cellular Cardiology, 2001, 33, 599-613.	Molecular	0.9	164
784	Inward Rectifiers in the Heart: An Update on IK1. Journal of Molecular and Cellular Carc 33, 625-638.	iology, 2001,	0.9	238
785	The Molecular Physiology of the Cardiac Transient Outward Potassium Current (Ito) in Diseased Myocardium. Journal of Molecular and Cellular Cardiology, 2001, 33, 851-872		0.9	175
786	Molecular Basis of the Delayed Rectifier Current IKsin Heart. Journal of Molecular and C Cardiology, 2001, 33, 873-882.	Tellular	0.9	39
787	Is the Molecular Composition of KATPChannels more Complex than Originally Thought Molecular and Cellular Cardiology, 2001, 33, 1541-1546.	?. Journal of	0.9	55
788	Single-Particle Approaches in the Analysis of Small 2D Crystals of the Mitochondrial Ch Journal of Structural Biology, 2001, 133, 254-265.	annel VDAC.	1.3	10

#	Article	IF	CITATIONS
789	Stability of Membrane Proteins: Relevance for the Selection of Appropriate Methods for High-Resolution Structure Determinations. Journal of Structural Biology, 2001, 136, 144-157.	1.3	77
790	Structure of Ligand-Gated Ion Channels: Critical Assessment of Biochemical Data Supports Novel Topology. Molecular and Cellular Neurosciences, 2001, 17, 777-792.	1.0	41
791	Molecular biology of sodium channels and their role in cardiac arrhythmias. American Journal of Medicine, 2001, 110, 296-305.	0.6	50
792	Structure of the gating domain of a Ca2+-activated K+ channel complexed with Ca2+/calmodulin. Nature, 2001, 410, 1120-1124.	13.7	561
793	Mechanisms of Permeation and Selectivity in Calcium Channels. Biophysical Journal, 2001, 80, 195-214.	0.2	171
794	Towards the molecular mechanism of Na+/solute symport in prokaryotes. Biochimica Et Biophysica Acta - Bioenergetics, 2001, 1505, 131-143.	0.5	50
795	Extracellular Ba2+ and voltage interact to gate Ca2+ channels at the plasma membrane of stomatal guard cells. FEBS Letters, 2001, 491, 99-103.	1.3	31
796	Modification of Voltage-Dependent Gating of Potassium Channels by Free Form of Tryptophan Side Chain. Biophysical Journal, 2001, 81, 97-106.	0.2	11
797	High-Affinity Zn Block in Recombinant N-Methyl-d-Aspartate Receptors with Cysteine Substitutions at the Q/R/N Site. Biophysical Journal, 2001, 81, 107-116.	0.2	15
798	Modulation of Kv1.5 Potassium Channel Gating by Extracellular Zinc. Biophysical Journal, 2001, 81, 125-136.	0.2	25
799	A Model for 4-Aminopyridine Action on K Channels: Similarities to Tetraethylammonium Ion Action. Biophysical Journal, 2001, 81, 895-904.	0.2	67
800	Unitary Conductance Variation in Kir2.1 and in Cardiac Inward Rectifier Potassium Channels. Biophysical Journal, 2001, 81, 2035-2049.	0.2	26
801	Hierarchical Approach to Predicting Permeation in Ion Channels. Biophysical Journal, 2001, 81, 2473-2483.	0.2	79
802	Calculation of Rigid-Body Conformational Changes Using Restraint-Driven Cartesian Transformations. Biophysical Journal, 2001, 81, 2530-2546.	0.2	21
803	Model Channel Ion Currents in NaCl-Extended Simple Point Charge Water Solution with Applied-Field Molecular Dynamics. Biophysical Journal, 2001, 81, 3077-3089.	0.2	97
804	KCNKÃ~: Single, Cloned Potassium Leak Channels Are Multi-Ion Pores. Biophysical Journal, 2001, 80, 241-253.	0.2	32
805	Regulation of ROMK by Extracellular Cations. Biophysical Journal, 2001, 80, 683-697.	0.2	28
806	Ion Selectivity Filter Regulates Local Anesthetic Inhibition of G-Protein-Gated Inwardly Rectifying K+ Channels. Biophysical Journal, 2001, 80, 707-718.	0.2	22

	СПАНОГ	N KEPORT	
#	Article	IF	CITATIONS
807	ATP Interaction with the Open State of the KATP Channel. Biophysical Journal, 2001, 80, 719-728.	0.2	53
808	Side-Chain Ionization States in a Potassium Channel. Biophysical Journal, 2001, 80, 1210-1219.	0.2	71
809	Brownian Dynamics Simulations of Interaction Between Scorpion Toxin Lq2 and Potassium Ion Channel. Biophysical Journal, 2001, 80, 1659-1669.	0.2	42
810	Localization of the Extracellular End of the Voltage Sensor S4 in a Potassium Channel. Biophysical Journal, 2001, 80, 1802-1809.	0.2	45
811	Mechanism Underlying Slow Kinetics of the OFF Gating Current in Shaker Potassium Channel. Biophysical Journal, 2001, 80, 2167-2175.	0.2	37
812	Revisiting the Role of Ca2+ in Shaker K+ Channel Gating. Biophysical Journal, 2001, 80, 2216-2220.	0.2	6
813	Dilated and Defunct K Channels in the Absence of K+. Biophysical Journal, 2001, 80, 2704-2714.	0.2	56
814	Distribution and expression of TREK-1, a two-pore-domain potassium channel, in the adult rat CNS. Neuroscience, 2001, 103, 899-919.	1.1	143
815	Ammonium in nervous tissue: transport across cell membranes, fluxes from neurons to glial cells, and role in signalling. Progress in Neurobiology, 2001, 64, 157-183.	2.8	98
816	Glutamate receptor channel signatures. Trends in Pharmacological Sciences, 2001, 22, 7-10.	4.0	52
817	HERG K+ channels: friend and foe. Trends in Pharmacological Sciences, 2001, 22, 240-246.	4.0	273
818	Dimers among friends: ion channel regulation by dimerization of tail domains. Trends in Pharmacological Sciences, 2001, 22, 439-441.	4.0	7
819	Properties and modulation of mammalian 2P domain K+ channels. Trends in Neurosciences, 2001, 24, 339-346.	4.2	475
820	Absolute Hydration Free Energy of the Proton from First-Principles Electronic Structure Calculations. Journal of Physical Chemistry A, 2001, 105, 11534-11540.	1.1	277
821	Structure that Opens the Gate and Opens the Door. Neuron, 2001, 29, 547-548.	3.8	3
822	Structure of the RCK Domain from the E. coli K+ Channel and Demonstration of Its Presence in the Human BK Channel. Neuron, 2001, 29, 593-601.	3.8	290
823	Yeast Screen for Constitutively Active Mutant G Protein–Activated Potassium Channels. Neuron, 2001, 29, 657-667.	3.8	134
824	Coupling Gβγ-Dependent Activation to Channel Opening via Pore Elements in Inwardly Rectifying Potassium Channels. Neuron, 2001, 29, 669-680.	3.8	92

ARTICLE IF CITATIONS # Conformational Changes in S6 Coupled to the Opening of Cyclic Nucleotide-Gated Channels. Neuron, 825 3.8 161 2001, 30, 689-698. Tight Steric Closure at the Intracellular Activation Gate of a Voltage-Gated K+ Channel. Neuron, 2001, 3.8 32, 649-656. 827 KCNKÃ~. Neuron, 2001, 32, 635-648. 3.8 80 Ion-channel regulation by G proteins. Trends in Endocrinology and Metabolism, 2001, 12, 391-398. 828 3.1 Phylogeny of ion channels: clues to structure and function. Comparative Biochemistry and 829 0.7 133 Physiology - B Biochemistry and Molecular Biology, 2001, 129, 17-28. Regulation of a mammalianShaker-related potassium channel,hKv1.5, by extracellular potassium and 830 1.3 pH. FEBS Letters, 2001, 488, 45-50. 831 The structure of glutamate transporters shows channel-like features. FEBS Letters, 2001, 492, 183-186. 1.3 26 Monomeric state and ligand binding of recombinant GABA transporter fromEscherichia coli. FEBS 1.3 21 Letters, 2001, 494, 165-169. Mechanisms of tetraethylammonium ion block in the KcsA potassium channel. FEBS Letters, 2001, 495, 833 1.3 78 191-196. Molecular mechanism of translocation through nuclear pore complexes during nuclear protein 834 1.3 101 import. FEBS Letters, 2001, 498, 145-149. Atomic structure of a glycerol channel and implications for substrate permeation in 835 1.3 37 aqua(glycero)porins. FEBS Letters, 2001, 504, 112-117. Overexpression of mammalian integral membrane proteins for structural studies. FEBS Letters, 2001, 1.3 154 504, 94-98. Sodium ion-translocating decarboxylases. Biochimica Et Biophysica Acta - Bioenergetics, 2001, 1505, 837 0.5 82 15-27. Potassium and sodium ions in a potassium channel studied by molecular dynamics simulations. 1.4 79 Biochimica Et Biophysica Acta - Biomembranes, 2001, 1510, 1-9. Lumen geometry of ion channels formed by Vibrio cholerae EL Tor cytolysin elucidated by 839 1.4 27 nonelectrolyte exclusion. Biochimica Et Biophysica Acta - Biomembranes, 2001, 1512, 53-63. Comparison of gramicidin A and gramicidin M channel conductance dispersities. Biochimica Et 840 Biophysica Acta - Biomembranes, 2001, 1513, 185-192. Slippage and uncoupling in P-type cation pumps; implications for energy transduction mechanisms and 841 1.4 41 regulation of metabolism. Biochimica Et Biophysica Acta - Biomembranes, 2001, 1513, 95-121. A high-throughput screen for MscL channel activity and mutational phenotyping. Biochimica Et 842 1.4 Biophysica Acta - Biomembranes, 2001, 1514, 165-169.

#	Article	IF	CITATIONS
843	Brownian dynamics study of an open-state KcsA potassium channel. Biochimica Et Biophysica Acta - Biomembranes, 2001, 1515, 83-91.	1.4	58
844	Functional characterisation of human TASK-3, an acid-sensitive two-pore domain potassium channel. Neuropharmacology, 2001, 40, 551-559.	2.0	92
845	Potassium channels: from scorpion venoms to high-resolution structure. Toxicon, 2001, 39, 739-748.	0.8	103
846	Potassium channels in T lymphocytes: toxins to therapeutic immunosuppressants. Toxicon, 2001, 39, 1269-1276.	0.8	66
847	Entropic selectivity of microporous materials. Physical Chemistry Chemical Physics, 2001, 3, 1644-1654.	1.3	34
848	A critical role for the branched sidechain adjacent to the third arginine of the sodium channel voltage sensor. IEEE Transactions on Dielectrics and Electrical Insulation, 2001, 8, 637-643.	1.8	10
849	Design and Characterization of a Highly Selective Peptide Inhibitor of the Small Conductance Calcium-activated K+Channel, SkCa2. Journal of Biological Chemistry, 2001, 276, 43145-43151.	1.6	106
850	Trace element speciation at cell membranes: aqueous, solid and lipid phase effects. Journal of Environmental Monitoring, 2001, 3, 15-21.	2.1	13
851	The Potassium Ion Channel:Â Comparison of Linear Scaling Semiempirical and Molecular Mechanics Representations of the Electrostatic Potential. Journal of Physical Chemistry B, 2001, 105, 12674-12679.	1.2	25
852	Peptide Backbone Chemistry and Membrane Channel Function:Â Effects of a Single Amide-to-Ester Replacement on Gramicidin Channel Structure and Functionâ€. Biochemistry, 2001, 40, 1460-1472.	1.2	10
853	Pegylation: A Method for Assessing Topological Accessibilities in Kv1.3â€. Biochemistry, 2001, 40, 13288-13301.	1.2	86
854	Electrostatics of Cell Membrane Recognition:Â Structure and Activity of Neutral and Cationic Rigid Push-Pull Rods in Isoelectric, Anionic, and Polarized Lipid Bilayer Membranes. Journal of the American Chemical Society, 2001, 123, 2517-2524.	6.6	78
855	Ab Initio Calculations on a Critical Part of a Protein, with an H5O2Partially Charged Group in a Central Role. Journal of Physical Chemistry B, 2001, 105, 5298-5303.	1.2	6
856	Asymmetric Structure of the Cystic Fibrosis Transmembrane Conductance Regulator Chloride Channel Pore Suggested by Mutagenesis of the Twelfth Transmembrane Regionâ€. Biochemistry, 2001, 40, 6620-6627.	1.2	39
857	Alkali Metal Cationâ^ïi€ Interactions Observed by Using a Lariat Ether Model System. Journal of the American Chemical Society, 2001, 123, 3092-3107.	6.6	140
858	High-Yield Expression and Functional Analysis ofEscherichia coliGlycerol-3-phosphate Transporterâ€. Biochemistry, 2001, 40, 6628-6635.	1.2	78
859	Modeling of the Outer Vestibule and Selectivity Filter of the L-Type Ca2+Channelâ€. Biochemistry, 2001, 40, 6786-6794.	1.2	59
860	Second-Site Revertants of a Low-Sodium-Affinity Mutant of the Na+/H+ Exchanger Reveal the Participation of TM4 into a Highly Constrained Sodium-Binding Site. Biochemistry, 2001, 40, 5095-5101.	1.2	47

#	Article	IF	CITATIONS
861	Binding of Correolide to the Kv1.3 Potassium Channel: Characterization of the Binding Domain by Site-Directed Mutagenesisâ€. Biochemistry, 2001, 40, 11687-11697.	1.2	54
862	Interaction of a Toxin from the Scorpion Tityus serrulatus with a Cloned K+ Channel from Squid (sqKv1A). Biochemistry, 2001, 40, 5942-5953.	1.2	29
863	First Images of a Glutamate Receptor Ion Channel:  Oligomeric State and Molecular Dimensions of GluRB Homomers. Biochemistry, 2001, 40, 13948-13953.	1.2	64
864	A Hydrophobic Gating Mechanism for Nanopores. Journal of Physical Chemistry B, 2001, 105, 12902-12905.	1.2	290
865	Visualization of a water-selective pore by electron crystallography in vitreous ice. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 1398-1403.	3.3	173
866	Phylogenetic Relationships within Cation Transporter Families of Arabidopsis. Plant Physiology, 2001, 126, 1646-1667.	2.3	1,110
867	Thermodynamic Stability of the Bacteriorhodopsin Lattice As Measured by Lipid Dilutionâ€. Biochemistry, 2001, 40, 11923-11931.	1.2	14
868	Hydraphile Synthetic Channel Compounds: Models for Transmembrane, Cation-conducting Transporters. Supramolecular Chemistry, 2001, 13, 391-404.	1.5	1
869	Ion Channels and Signal Transduction. , 0, , 473-493.		1
870	Structural and Gating Changes of the Sodium Channel Induced by Mutation of a Residue in the Upper Third of IVS6, Creating an External Access Path for Local Anesthetics. Molecular Pharmacology, 2001, 59, 684-691.	1.0	37
871	Selective Open-Channel Block of Shaker (Kv1) Potassium Channels by S-Nitrosodithiothreitol (Sndtt). Journal of General Physiology, 2001, 118, 113-134.	0.9	28
872	<i>Escherichia coli</i> as an expression system for K ⁺ transport systems from plants. American Journal of Physiology - Cell Physiology, 2001, 281, C733-C739.	2.1	41
873	Excitability and Conduction. , 2001, , 311-335.		1
874	Molecular Identity and Regulation of Renal Potassium Channels. The Japanese Journal of Physiology, 2001, 51, 631-647.	0.9	10
875	Extracellular nucleotide signaling along the renal epithelium. American Journal of Physiology - Renal Physiology, 2001, 280, F945-F963.	1.3	144
876	Influences of the N- and C-Termini of the Distal Nephron Inward Rectifier, ROMK. Kidney and Blood Pressure Research, 2001, 24, 142-148.	0.9	3
877	Point mutations in the post-M2 region of human α-ENaC regulate cation selectivity. American Journal of Physiology - Cell Physiology, 2001, 281, C64-C74.	2.1	30
878	Identification of a region of strong discrimination in the pore of CFTR. American Journal of Physiology - Lung Cellular and Molecular Physiology, 2001, 281, L852-L867.	1.3	50

#	Article	IF	CITATIONS
879	Ion permeation and selectivity in ClC-type chloride channels. American Journal of Physiology - Renal Physiology, 2001, 280, F748-F757.	1.3	93
880	Voltage-Dependent Calcium Channels. , 2001, , 247-257.		31
881	Channel-Lining Residues of the AMPA Receptor M2 Segment: Structural Environment of the Q/R Site and Identification of the Selectivity Filter. Journal of Neuroscience, 2001, 21, 4162-4172.	1.7	64
882	Molecular Bases of Anesthesia. Anesthesia and Analgesia, 2001, 93, 806-807.	1.1	0
883	Light at the end of the Ca2+-release channel tunnel: structures and mechanisms involved in ion translocation in ryanodine receptor channels. Quarterly Reviews of Biophysics, 2001, 34, 61-104.	2.4	103
884	Anesthetic-sensitive 2P Domain K+Channels. Anesthesiology, 2001, 95, 1013-1021.	1.3	101
885	Regulation of ROMK trafficking and channel activity. Current Opinion in Nephrology and Hypertension, 2001, 10, 693-698.	1.0	7
887	What the structure of a calcium pump tells us about its mechanism. Biochemical Journal, 2001, 356, 665.	1.7	68
888	Structural similarities of Na,K-ATPase and SERCA, the Ca2+-ATPase of the sarcoplasmic reticulum. Biochemical Journal, 2001, 356, 685.	1.7	116
889	Self-association and precursor protein binding of Saccharomyces cerevisiae Tom40p, the core component of the protein translocation channel of the mitochondrial outer membrane. Biochemical Journal, 2001, 356, 207-215.	1.7	24
890	Uterocalin, a lipocalin provisioning the preattachment equine conceptus: fatty acid and retinol binding properties, and structural characterization. Biochemical Journal, 2001, 356, 369-376.	1.7	50
891	What the structure of a calcium pump tells us about its mechanism. Biochemical Journal, 2001, 356, 665-683.	1.7	109
892	Structural similarities of Na,K-ATPase and SERCA, the Ca2+-ATPase of the sarcoplasmic reticulum. Biochemical Journal, 2001, 356, 685-704.	1.7	180
893	Biophysical effects of pore mutations of ROMK1. Clinical Science, 2001, 101, 121-130.	1.8	2
894	Biophysical effects of pore mutations of ROMK1. Clinical Science, 2001, 101, 121.	1.8	1
895	Molecular physiology of oxygen-sensitive potassium channels. European Respiratory Journal, 2001, 18, 221-227.	3.1	135
897	Molecular Pharmacology of T-type Ca2+ Channels. The Japanese Journal of Pharmacology, 2001, 85, 339-350.	1.2	77
900	Chapter 2 The aquaporin superfamily: Structure and function. Current Topics in Membranes, 2001, 51, 39-119.	0.5	3

#	Article	IF	CITATIONS
901	Identification of Specific Pore Residues Mediating KCNQ1 Inactivation. Journal of Biological Chemistry, 2001, 276, 13600-13605.	1.6	62
902	Differential Effects of General Anesthetics on G Protein–coupled Inwardly Rectifying and Other Potassium Channels. Anesthesiology, 2001, 95, 144-153.	1.3	68
903	Three-Dimensional Reconstruction of Single Particle Electron Microscopy: The Voltage Sensitive Sodium Channel Structure. Science Progress, 2001, 84, 291-309.	1.0	1
905	Molecular Determinants of Inactivation and Dofetilide Block in <i>ether a-go-go</i> (EAG) Channels and EAG-Related K ⁺ Channels. Molecular Pharmacology, 2001, 60, 1343-1348.	1.0	82
906	Clinical Anesthesia, 4th Edition. Anesthesia and Analgesia, 2001, 93, 807.	1.1	1
907	Sodium Blocking Induced by a Point Mutation at the C-Terminal End of the Pore Helix of the KAT1 Channel. Journal of Membrane Biology, 2001, 181, 163-170.	1.0	3
908	Molecular Recognition within the Membrane Milieu: Implications for the Structure and Function of Membrane Proteins. Journal of Membrane Biology, 2001, 182, 91-104.	1.0	24
909	Structure and Function of Mitochondrial Anion Transport Proteins. Journal of Membrane Biology, 2001, 179, 165-183.	1.0	76
910	Electrostatics studies and molecular dynamics simulations of a homology model of the Shaker K + channel pore. European Biophysics Journal, 2001, 30, 295-303.	1.2	24
911	Mutations stabilizing an open conformation within the external region of the permeation pathway of the potassium channel KcsA. European Biophysics Journal, 2001, 30, 385-391.	1.2	11
912	Yeast - a panacea for the structure-function analysis of membrane proteins?. Current Genetics, 2001, 40, 157-171.	0.8	49
913	Genomic organization and promoter analysis of human KCNN3 gene. Journal of Human Genetics, 2001, 46, 463-470.	1.1	35
914	Towards an understanding of electrogenic cotransporters: structure-function relationships. Pflugers Archiv European Journal of Physiology, 2001, 443, 163-165.	1.3	2
915	The dipole moment of membrane proteins: potassium channel protein and β-subunit. Biophysical Chemistry, 2001, 94, 209-218.	1.5	3
916	Single-file diffusion and neurotransmitter transporters: Hodgkin and Keynes model revisited. BioSystems, 2001, 62, 57-66.	0.9	23
917	The hydration number of Na+ in liquid water. Fluid Phase Equilibria, 2001, 183-184, 121-132.	1.4	137
918	Application of dwell-time series in studies of long-range correlation in single channel ion transport: analysis of ion current through a big conductance locust potassium channel. Physica A: Statistical Mechanics and Its Applications, 2001, 297, 79-96.	1.2	28
919	Functional heterogeneity of ROMK mutations linked to hyperprostaglandin E syndrome. Kidney International, 2001, 59, 1803-1811.	2.6	59

#	Article	IF	CITATIONS
920	RACTK1: a putative inward rectifier potassium channel of the distal nephron. Investigation in Xenopus laevis oocytes. Nephrology, 2001, 6, 285-289.	0.7	0
921	Insulin release and suppression by tacrolimus, rapamycin and cyclosporin A are through regulation of the ATP-sensitive potassium channel. Diabetes, Obesity and Metabolism, 2001, 3, 393-402.	2.2	50
922	Subunit Assembly and Domain Analysis of Electrically Silent K+ Channel α-Subunits of the Rat Kv9 Subfamily. Journal of Neurochemistry, 2001, 72, 1725-1734.	2.1	47
923	Functional analysis of polar amino-acid residues in membrane associated regions of the NHE1 isoform of the mammalian Na+/H+exchanger. FEBS Journal, 2001, 268, 4674-4685.	0.2	89
925	Extracellular ATP and cAMP as Paracrine and Interorgan Regulators of Renal Function ATP Release Mechanisms, ATP Receptors and Purinergic Signalling along the Nephron. Clinical and Experimental Pharmacology and Physiology, 2001, 28, 340-350.	0.9	96
926	Individual interactions influence the crystalline order for membrane proteins. Acta Crystallographica Section D: Biological Crystallography, 2001, 57, 1281-1286.	2.5	10
927	Quaternary ammonium ions can externally block voltage-gated K+ channels. Establishing a theoretical and experimental model that predicts KDs and the selectivity of K+ over Na+ ions. Journal of Molecular Structure, 2001, 562, 63-78.	1.8	21
928	Approaches to determining membrane protein structures to high resolution: do selections of subpopulations occur?. Micron, 2001, 32, 75-90.	1.1	26
929	Chemogenomic approaches to drug discovery. Current Opinion in Chemical Biology, 2001, 5, 464-470.	2.8	173
930	Spacer chain length dependence in hydraphile channels. Journal of Supramolecular Chemistry, 2001, 1, 23-30.	0.4	10
931	Steered molecular dynamics investigations of protein function. Journal of Molecular Graphics and Modelling, 2001, 19, 13-25.	1.3	327
932	Prediction of membrane protein orientation in lipid bilayers: a theoretical approach. Journal of Molecular Graphics and Modelling, 2001, 20, 235-244.	1.3	25
933	Optimized aminolysis conditions for cleavage of N-protected hydrophobic peptides from solid-phase resins. Chemical Biology and Drug Design, 2001, 57, 519-527.	1.2	19
934	Strategies for Prokaryotic Expression of Eukaryotic Membrane Proteins. Traffic, 2001, 2, 99-104.	1.3	48
935	Analysis of a putative voltage-gated prokaryotic potassium channel. FEBS Journal, 2001, 268, 5386-5396.	0.2	15
936	Bioorganic chemistry à la baguette: Studies on molecular recognition in biological systems using rigid-rod molecules. Chemical Record, 2001, 1, 162-172.	2.9	26
937	Molecular dynamics simulations of antimicrobial peptides: From membrane binding to trans-membrane channels. International Journal of Quantum Chemistry, 2001, 83, 166-179.	1.0	40
938	Proline-induced hinges in transmembrane helices: Possible roles in ion channel gating. Proteins: Structure, Function and Bioinformatics, 2001, 44, 63-72.	1.5	138

#	Article	IF	CITATIONS
939	The molecular interactions of pyrethroid insecticides with insect and mammalian sodium channels. Pest Management Science, 2001, 57, 877-888.	1.7	174
940	KAI1, A prostate metastasis suppressor: Prediction of solvated structure and interactions with binding partners; integrins, cadherins, and cell-surface receptor proteins. Molecular Carcinogenesis, 2001, 32, 139-153.	1.3	73
941	Model of the 3-D structure of the GLUT3 glucose transporter and molecular dynamics simulation of glucose transport. Proteins: Structure, Function and Bioinformatics, 2001, 42, 531-541.	1.5	44
942	Bacterial ion channels and their eukaryotic homologues. BioEssays, 2001, 23, 1148-1158.	1.2	32
947	Hydraphile Channels: Models for Transmembrane, Cation-Conducting Transporters. Chemistry - A European Journal, 2001, 7, 33-39.	1.7	45
948	Novel Resorcin[4]arenes as Potassium-Selective Ion-Channel and Transporter Mimics. Chemistry - A European Journal, 2001, 7, 3474.	1.7	76
949	Self-Assembling Organic Nanotubes. Angewandte Chemie - International Edition, 2001, 40, 988-1011.	7.2	1,053
950	CyclohexyletherĨ-Amino Acids: New Leads for Selectivity Filters in Ion Channels. Angewandte Chemie - International Edition, 2001, 40, 2076-2078.	7.2	35
951	Ligand-Gated Ion Channels. Angewandte Chemie - International Edition, 2001, 40, 3100-3116.	7.2	76
952	Towards Synthetic Adrenaline Receptors—Shape-Selective Adrenaline Recognition in Water. Angewandte Chemie - International Edition, 2001, 40, 3148-3151.	7.2	28
953	ICCC34 — golden edition of coordination chemistry reviews. Coordination chemistry for the neurosciences. Coordination Chemistry Reviews, 2001, 216-217, 333-361.	9.5	141
954	Structural Basis for α-K Toxin Specificity for K+ Channels Revealed through the Solution 1H NMR Structures of Two Noxiustoxinâ^'Iberiotoxin Chimeras. Biochemistry, 2001, 40, 10998-11006.	1.2	20
955	Sensitivity of Single Membrane-Spanning α-Helical Peptides to Hydrophobic Mismatch with a Lipid Bilayer:  Effects on Backbone Structure, Orientation, and Extent of Membrane Incorporation. Biochemistry, 2001, 40, 5000-5010.	1.2	171
956	Molecular properties and physiological roles of ion channels in the immune system. Journal of Clinical Immunology, 2001, 21, 235-252.	2.0	212
957	Transporters of Neurotransmitters: Receptive, Transport, and Channel Functions. Journal of Evolutionary Biochemistry and Physiology, 2001, 37, 328-334.	0.2	2
958	A novel K+ channel expressed in carrot roots with a low susceptibility toward metal ions. Journal of Bioenergetics and Biomembranes, 2001, 33, 63-71.	1.0	14
959	TM Finder: A prediction program for transmembrane protein segments using a combination of hydrophobicity and nonpolar phase helicity scales. Protein Science, 2001, 10, 212-219.	3.1	128
960	Modeling of the structural features of integral-membrane proteins reverse-environment prediction of integral membrane protein structure (REPIMPS). Protein Science, 2001, 10, 1529-1538.	3.1	9

\sim		· ·	Repc	
		ON	I R F D C	1121
\sim	/			

#	Article	IF	CITATIONS
961	Artificial Cation-Conducting Channels: Design, Synthesis, and Characterization. Cell Biochemistry and Biophysics, 2001, 35, 211-231.	0.9	6
962	The projection structure of EmrE, a proton-linked multidrug transporter from Escherichia coli, at 7 A resolution. EMBO Journal, 2001, 20, 77-81.	3.5	101
963	Exploration of the pore structure of a peptide-gated Na+ channel. EMBO Journal, 2001, 20, 5595-5602.	3.5	32
964	Structural basis of water-specific transport through the AQP1 water channel. Nature, 2001, 414, 872-878.	13.7	1,058
965	Probing ion permeation and gating in a K+ channel with backbone mutations in the selectivity filter. Nature Neuroscience, 2001, 4, 239-246.	7.1	123
966	Structure of the KcsA channel intracellular gate in the open state. Nature Structural Biology, 2001, 8, 883-887.	9.7	185
967	Keeping K+ completely comfortable. Nature Structural Biology, 2001, 8, 1011-1013.	9.7	15
968	Molecular physiology of p2x receptors and atp signalling at synapses. Nature Reviews Neuroscience, 2001, 2, 165-174.	4.9	355
969	Potassium leak channels and the KCNK family of two-p-domain subunits. Nature Reviews Neuroscience, 2001, 2, 175-184.	4.9	710
970	The voltage-sensitive sodium channel is a bell-shaped molecule with several cavities. Nature, 2001, 409, 1047-1051.	13.7	255
971	RGS2 regulates signal transduction in olfactory neurons by attenuating activation of adenylyl cyclase III. Nature, 2001, 409, 1051-1055.	13.7	249
972	A 3D view of sodium channels. Nature, 2001, 409, 988-991.	13.7	58
973	Potassium channel receptor site for the inactivation gate and quaternary amine inhibitors. Nature, 2001, 411, 657-661.	13.7	554
974	Cyclic nucleotide-gated channels: shedding light on the opening of a channel pore. Nature Reviews Neuroscience, 2001, 2, 643-651.	4.9	73
975	Rotational movement during cyclic nucleotide-gated channel opening. Nature, 2001, 412, 917-921.	13.7	105
976	Ion conduction pore is conserved among potassium channels. Nature, 2001, 413, 809-813.	13.7	291
977	Energetic optimization of ion conduction rate by the K+ selectivity filter. Nature, 2001, 414, 37-42.	13.7	756
978	Chemistry of ion coordination and hydration revealed by a K+ channel–Fab complex at 2.0 Ã resolution. Nature, 2001, 414, 43-48.	13.7	1,954

# 979	ARTICLE Energetics of ion conduction through the K+ channel. Nature, 2001, 414, 73-77.	IF 13.7	Citations 745
980	See potassium run. Nature, 2001, 414, 23-24.	13.7	73
981	GYGD pore motifs in neighbouring potassium channel subunits interact to determine ion selectivity. Journal of Physiology, 2001, 530, 21-33.	1.3	38
982	Inactivation determinants in segment IIIS6 of Ca v 3.1. Journal of Physiology, 2001, 537, 27-34.	1.3	49
983	The K + channel signature sequence of murine Kir2.1: mutations that affect microscopic gating but not ionic selectivity. Journal of Physiology, 2001, 531, 37-50.	1.3	29
984	Mechanism of Ba2+block of a mouse inwardly rectifying K+channel: differential contribution by two discrete residues. Journal of Physiology, 2001, 534, 381-393.	1.3	84
985	Relationship between anion binding and anion permeability revealed by mutagenesis within the cystic fibrosis transmembrane conductance regulator chloride channel pore. Journal of Physiology, 2001, 531, 51-66.	1.3	81
986	Two open states and rateâ€ŀimiting gating steps revealed by intracellular Na + block of human KCNQ1 and KCNQ1/KCNE1 K + channels. Journal of Physiology, 2001, 533, 135-144.	1.3	22
987	Voltageâ€dependent flickery block of an open cystic fibrosis transmembrane conductance regulator (CFTR) channel pore. Journal of Physiology, 2001, 532, 435-448.	1.3	50
988	Control of rectification and permeation by two distinct sites after the second transmembrane region in Kir2.1 K + channel. Journal of Physiology, 2001, 531, 645-660.	1.3	136
989	K + â€dependent gating of K ir 1.1 channels is linked to pH gating through a conformational change in the pore. Journal of Physiology, 2001, 534, 49-58.	1.3	33
990	Solution structure of micelle-bound H5 peptide (427–452): a primary structure corresponding to the pore forming region of the voltage dependent potassium channel. BBA - Proteins and Proteomics, 2001, 1545, 153-159.	2.1	4
991	K+/Na+ selectivity of the KcsA potassium channel from microscopic free energy perturbation calculations. BBA - Proteins and Proteomics, 2001, 1548, 194-202.	2.1	100
992	Gating of voltage-dependent potassium channels. Progress in Biophysics and Molecular Biology, 2001, 75, 165-199.	1.4	46
993	Molecular genetics of nucleoside transporters in Leishmania and African trypanosomes. Biochemical Pharmacology, 2001, 62, 149-155.	2.0	34
994	Genetic manipulation of key determinants of ion flow in glutamate receptor channels in the mouse. Brain Research, 2001, 907, 233-243.	1.1	75
995	Membrane proteins: Aquaporins — channels without ions. Current Biology, 2001, 11, R71-R73.	1.8	24
996	Channel gating: Twist to open. Current Biology, 2001, 11, R364-R366.	1.8	18

	Сіта	tion Report	
#	Article	IF	CITATIONS
997	Channelopathies: Kir2.1 mutations jeopardize many cell functions. Current Biology, 2001, 11, R747-R75	0. 1.8	46
998	Membrane structure. Current Biology, 2001, 11, R811-R814.	1.8	25
999	Glutamate transporters combine transporter- and channel-like features. Trends in Biochemical Sciences, 2001, 26, 534-539.	3.7	29
1000	Three-Dimensional Structure of a Voltage-Gated Potassium Channel at 2.5 nm Resolution. Structure, 2001, 9, 215-220.	1.6	144
1001	The Mechanism of Glycerol Conduction in Aquaglyceroporins. Structure, 2001, 9, 1083-1093.	1.6	148
1002	Pharmacological techniques for the in vitro study of intestinal smooth muscles. Journal of Pharmacological and Toxicological Methods, 2001, 45, 141-158.	0.3	18
1003	Ion transport and ligand binding by the Na–K–Cl cotransporter, structure–function studies. Comparative Biochemistry and Physiology Part A, Molecular & Integrative Physiology, 2001, 130, 487-497.	0.8	61
1004	Impact of human genome sequencing for in silico target discovery. Drug Discovery Today, 2001, 6, 316-323.	3.2	19
1005	Ion-channel assay technologies: quo vadis?. Drug Discovery Today, 2001, 6, 1278-1287.	3.2	170
1006	Lipid and mechano-gated 2P domain K+ channels. Current Opinion in Cell Biology, 2001, 13, 422-428.	2.6	271
1007	Allosteric mechanisms in normal and pathological nicotinic acetylcholine receptors. Current Opinion in Neurobiology, 2001, 11, 369-377.	2.0	103
1008	Electrostatics calculations: recent methodological advances and applications to membranes. Current Opinion in Structural Biology, 2001, 11, 253-261.	2.6	88
1009	Helical membrane proteins: diversity of functions in the context of simple architecture. Current Opinion in Structural Biology, 2001, 11, 370-376.	2.6	86
1010	Lipids lost, lipids regained. Current Opinion in Structural Biology, 2001, 11, 393-396.	2.6	5
1011	Potassium channels: life in the post-structural world. Current Opinion in Structural Biology, 2001, 11, 408-414.	2.6	28
1012	A family of putative Kir potassium channels in prokaryotes. BMC Evolutionary Biology, 2001, 1, 14.	3.2	43
1013	Evidence in support of a four transmembrane-pore-transmembrane topology model for the Arabidopsis thaliana Na+/K+ translocating AtHKT1 protein, a member of the superfamily of K+ transporters. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 6488-6493	3.3	131
1014	Polarity and permeation profiles in lipid membranes. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 7777-7782.	3.3	181

#	Article	IF	CITATIONS
1015	Controlling potassium channel activities: Interplay between the membrane and intracellular factors. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 11016-11023.	3.3	75
1016	Identification of a trafficking determinant localized to the Kv1 potassium channel pore. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 14055-14059.	3.3	95
1017	Structure/Function Relationships in OxlT, the Oxalate-Formate Transporter of Oxalobacter formigenes. Journal of Biological Chemistry, 2001, 276, 8753-8760.	1.6	25
1018	Mechanism of Dihydropyridine Interaction with Critical Binding Residues of L-type Ca2+ Channel α1 Subunits. Journal of Biological Chemistry, 2001, 276, 12730-12735.	1.6	42
1019	Amino Acids in Segment IVS6 and \hat{l}^2 -Subunit Interaction Support Distinct Conformational Changes during Cav2.1 Inactivation. Journal of Biological Chemistry, 2001, 276, 17076-17082.	1.6	29
1020	Structural Compatibility between the Putative Voltage Sensor of Voltage-gated K+ Channels and the Prokaryotic KcsA Channel. Journal of Biological Chemistry, 2001, 276, 21070-21076.	1.6	28
1021	Identification of Inactivation Determinants in the Domain IIS6 Region of High Voltage-activated Calcium Channels. Journal of Biological Chemistry, 2001, 276, 33001-33010.	1.6	52
1022	K+ Occupancy of the N-Methyl-d-Aspartate Receptor Channel Probed by Mg2+ Block. Journal of General Physiology, 2001, 117, 287-298.	0.9	21
1023	Molecular Architecture of the Voltage-Dependent Na Channel. Journal of General Physiology, 2001, 118, 171-182.	0.9	38
1024	Permeant Ion-Dependent Changes in Gating of Kir2.1 Inward Rectifier Potassium Channels. Journal of General Physiology, 2001, 118, 509-522.	0.9	36
1025	Structural understanding of the transmembrane domains of inositol triphosphate receptors and ryanodine receptors towards calcium channeling. Protein Engineering, Design and Selection, 2001, 14, 867-874.	1.0	24
1026	Probing the mechanism of enzymatic phosphoryl transfer with a chemical trick. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 8170-8171.	3.3	3
1027	Molecular modeling of ligand-gated ion channels: Progress and challenges. International Review of Neurobiology, 2001, 48, 141-166.	0.9	25
1028	Blocker State Dependence and Trapping in Hyperpolarization-Activated Cation Channels. Journal of General Physiology, 2001, 117, 91-102.	0.9	162
1029	Open Channel Block of HERG K ⁺ Channels by Vesnarinone. Molecular Pharmacology, 2001, 60, 244-253.	1.0	137
1030	New Approaches to Antiarrhythmic Therapy, Part II. Circulation, 2001, 104, 2990-2994.	1.6	18
1031	New approaches to antiarrhythmic therapy; emerging therapeutic applications of the cell biology of cardiac arrhythmias. European Heart Journal, 2001, 22, 2148-2163.	1.0	15
1032	Side Chain Effect on Ion Channel Characters of Aib Rich Peptides. Journal of Biochemistry, 2001, 130, 749-755.	0.9	9

#	Article	IF	CITATIONS
1033	Molecular Determinants of Ion Permeation and Selectivity in Inositol 1,4,5-Trisphosphate Receptor Ca2+ Channels. Journal of Biological Chemistry, 2001, 276, 13509-13512.	1.6	78
1034	Location and Orientation of minK within the IKsPotassium Channel Complex. Journal of Biological Chemistry, 2001, 276, 38249-38254.	1.6	68
1035	Calmodulin Regulates Assembly and Trafficking of SK4/IK1 Ca2+-activated K+ Channels. Journal of Biological Chemistry, 2001, 276, 37980-37985.	1.6	101
1036	The Pore of Plant K + Channels Is Involved in Voltage and pH Sensing: Domain-Swapping between Different K + Channel a-Subunits. Plant Cell, 2001, 13, 943.	3.1	0
1037	Chapter 3 Fluctuations in neural systems: From subcellular to network levels. Handbook of Biological Physics, 2001, , 83-129.	0.8	1
1038	Mass Spectrometry as a Tool for Protein Crystallography. Annual Review of Biophysics and Biomolecular Structure, 2001, 30, 67-85.	18.3	62
1039	Simulation approaches to ion channel structure–function relationships. Quarterly Reviews of Biophysics, 2001, 34, 473-561.	2.4	186
1040	PHYSIOLOGY: A One-Domain Voltage-Gated Sodium Channel in Bacteria. Science, 2001, 294, 2306-2308.	6.0	24
1041	Kcsa. Journal of General Physiology, 2001, 118, 303-314.	0.9	314
1042	Inherited muscle and brain channelopathies. Expert Review of Neurotherapeutics, 2001, 1, 247-265.	1.4	0
1042 1043	Inherited muscle and brain channelopathies. Expert Review of Neurotherapeutics, 2001, 1, 247-265. Extracellular Blockade of K+ Channels by Tea. Journal of General Physiology, 2001, 118, 207-218.	1.4 0.9	0
1043	Extracellular Blockade of K+ Channels by Tea. Journal of General Physiology, 2001, 118, 207-218. Amino Acid Residues Outside of the Pore Region Contribute to N-type Calcium Channel Permeation.	0.9	71
1043 1044	Extracellular Blockade of K+ Channels by Tea. Journal of General Physiology, 2001, 118, 207-218. Amino Acid Residues Outside of the Pore Region Contribute to N-type Calcium Channel Permeation. Journal of Biological Chemistry, 2001, 276, 5726-5730. Dynamic mechanisms of the membrane water channel aquaporin-1 (AQP1). Proceedings of the National	0.9	71 45
1043 1044 1045	 Extracellular Blockade of K+ Channels by Tea. Journal of General Physiology, 2001, 118, 207-218. Amino Acid Residues Outside of the Pore Region Contribute to N-type Calcium Channel Permeation. Journal of Biological Chemistry, 2001, 276, 5726-5730. Dynamic mechanisms of the membrane water channel aquaporin-1 (AQP1). Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 14345-14349. Functional Characterization of Mutants in the Predicted Pore Region of the Rabbit Cardiac Muscle Ca2+ Release Channel (Ryanodine Receptor Isoform 2). Journal of Biological Chemistry, 2001, 276, 	0.9 1.6 3.3	71 45 62
1043 1044 1045 1046	 Extracellular Blockade of K+ Channels by Tea. Journal of General Physiology, 2001, 118, 207-218. Amino Acid Residues Outside of the Pore Region Contribute to N-type Calcium Channel Permeation. Journal of Biological Chemistry, 2001, 276, 5726-5730. Dynamic mechanisms of the membrane water channel aquaporin-1 (AQP1). Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 14345-14349. Functional Characterization of Mutants in the Predicted Pore Region of the Rabbit Cardiac Muscle Ca2+ Release Channel (Ryanodine Receptor Isoform 2). Journal of Biological Chemistry, 2001, 276, 31760-31771. Helical Structure of the Cooh Terminus of S3 and Its Contribution to the Gating Modifier Toxin 	0.9 1.6 3.3 1.6	71 45 62 47
1043 1044 1045 1046	 Extracellular Blockade of K+ Channels by Tea. Journal of General Physiology, 2001, 118, 207-218. Amino Acid Residues Outside of the Pore Region Contribute to N-type Calcium Channel Permeation. Journal of Biological Chemistry, 2001, 276, 5726-5730. Dynamic mechanisms of the membrane water channel aquaporin-1 (AQP1). Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 14345-14349. Functional Characterization of Mutants in the Predicted Pore Region of the Rabbit Cardiac Muscle Ca2+ Release Channel (Ryanodine Receptor Isoform 2). Journal of Biological Chemistry, 2001, 276, 31760-31771. Helical Structure of the Cooh Terminus of S3 and Its Contribution to the Gating Modifier Toxin Receptor in Voltage-Gated Ion Channels. Journal of General Physiology, 2001, 117, 205-218. Interchain hydrogen-bonding interactions may facilitate translocation of K+ ions across the potassium channel selectivity filter, as suggested by synthetic modeling chemistry. Proceedings of the 	0.9 1.6 3.3 1.6 0.9	 71 45 62 47 99

#	Article	IF	CITATIONS
1051	Structural Determinants of KvLQT1 Control by the KCNE Family of Proteins. Journal of Biological Chemistry, 2001, 276, 6439-6444.	1.6	103
1052	Delineation of the Clotrimazole/TRAM-34 Binding Site on the Intermediate Conductance Calcium-activated Potassium Channel, IKCa1. Journal of Biological Chemistry, 2001, 276, 32040-32045.	1.6	128
1053	Second Transmembrane Domains of ENaC Subunits Contribute to Ion Permeation and Selectivity. Journal of Biological Chemistry, 2001, 276, 44091-44098.	1.6	43
1054	Topological Organization of the Hyaluronan Synthase fromStreptococcus pyogenes. Journal of Biological Chemistry, 2001, 276, 2037-2046.	1.6	83
1055	Determinants Involved in Kv1 Potassium Channel Folding in the Endoplasmic Reticulum, Glycosylation in the Golgi, and Cell Surface Expression. Journal of Biological Chemistry, 2001, 276, 39419-39427.	1.6	53
1056	Isoform-specific Localization of Voltage-gated K+Channels to Distinct Lipid Raft Populations. Journal of Biological Chemistry, 2001, 276, 8409-8414.	1.6	207
1057	Characterization of Heteromultimeric G Protein-coupled Inwardly Rectifying Potassium Channels of the Tunicate Tadpole with a Unique Pore Property. Journal of Biological Chemistry, 2001, 276, 18529-18539.	1.6	6
1058	Location of a Constriction in the Lumen of a Transmembrane Pore by Targeted Covalent Attachment of Polymer Molecules. Journal of General Physiology, 2001, 117, 239-252.	0.9	79
1059	Tea+-Sensitive Kcnq1 Constructs Reveal Pore-Independent Access to Kcne1 in Assembled IKs Channels. Journal of General Physiology, 2001, 117, 43-52.	0.9	42
1060	Cysteine Mutagenesis Reveals Novel Structure–Function Features within the Predicted Third Extracellular Loop of the Type Iia Na+/Pi Cotransporter. Journal of General Physiology, 2001, 117, 533-546.	0.9	52
1061	Conversion of the Ion Selectivity of the 5-HT3AReceptor from Cationic to Anionic Reveals a Conserved Feature of the Ligand-gated Ion Channel Superfamily. Journal of Biological Chemistry, 2001, 276, 10977-10983.	1.6	115
1062	Do All Voltage-Gated Potassium Channels Use MiRPs?. Circulation Research, 2001, 88, 981-983.	2.0	46
1063	The S4-S5 linker couples voltage sensing and activation of pacemaker channels. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 11277-11282.	3.3	144
1064	Hidden Markov Model Analysis of Intermediate Gating Steps Associated with the Pore Gate of Shaker Potassium Channels. Journal of General Physiology, 2001, 118, 547-564.	0.9	37
1065	Expression and Stress-Dependent Induction of Potassium Channel Transcripts in the Common Ice Plant. Plant Physiology, 2001, 125, 604-614.	2.3	86
1066	Three-dimensional organization of the aquaporin water channel: What can structure tell us about function?. Vitamins and Hormones, 2001, 62, 133-166.	0.7	2
1067	Sucrose transport through maltoporin mutants of Escherichia coli. Protein Engineering, Design and Selection, 2001, 14, 943-948.	1.0	12
1068	Cftr. Journal of General Physiology, 2001, 118, 407-432.	0.9	97

#	Article	IF	CITATIONS
1069	Affinity and Location of an Internal K+ Ion Binding Site in Shaker K Channels. Journal of General Physiology, 2001, 117, 373-384.	0.9	27
1070	Flexibility of the Kir6.2 inward rectifier K+ channel pore. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 4227-4232.	3.3	49
1071	Gating and Conductance Properties of Bk Channels Are Modulated by the S9–S10 Tail Domain of the α Subunit. Journal of General Physiology, 2001, 118, 711-734.	0.9	30
1072	Permeability Properties of Enac Selectivity Filter Mutants. Journal of General Physiology, 2001, 118, 679-692.	0.9	72
1073	Long-QT Syndrome-Associated Missense Mutations in the Pore Helix of the HERG Potassium Channel. Circulation, 2001, 104, 1071-1075.	1.6	48
1074	The Pore of Plant K+ Channels Is Involved in Voltage and pH Sensing: Domain-Swapping between Different K+ Channel α-Subunits. Plant Cell, 2001, 13, 943-952.	3.1	45
1075	Interfacial Positioning and Stability of Transmembrane Peptides in Lipid Bilayers Studied by Combining Hydrogen/Deuterium Exchange and Mass Spectrometry. Journal of Biological Chemistry, 2001, 276, 34501-34508.	1.6	66
1076	Epithelial Sodium Channel Pore Region. Journal of Biological Chemistry, 2001, 276, 1326-1334.	1.6	65
1077	Mutations within the P-Loop of Kir6.2 Modulate the Intraburst Kinetics of the Atp-Sensitive Potassium Channel. Journal of General Physiology, 2001, 118, 341-353.	0.9	88
1078	Electrostatics and the Gating Pore of Shaker Potassium Channels. Journal of General Physiology, 2001, 117, 69-90.	0.9	118
1079	Molecular Determinants of Voltage-dependent Gating and Binding of Pore-blocking Drugs in Transmembrane Segment IIIS6 of the Na+ Channel α Subunit. Journal of Biological Chemistry, 2001, 276, 20-27.	1.6	224
1080	A Three-dimensional Model of the Human Facilitative Glucose Transporter Glut1. Journal of Biological Chemistry, 2001, 276, 44970-44975.	1.6	51
1081	A Conserved Inhibitory and Differential Stimulatory Action of Nucleotides on KIR6.0/SUR Complexes Is Essential for Excitation-Metabolism Coupling by KATP Channels. Journal of Biological Chemistry, 2001, 276, 49083-49092.	1.6	37
1082	Na+ Interaction with the Pore of Shaker B K+ Channels. Journal of General Physiology, 2001, 118, 639-648.	0.9	13
1083	Kinetics of Inward-Rectifier K+ Channel Block by Quaternary Alkylammonium Ions. Journal of General Physiology, 2001, 117, 395-406.	0.9	31
1084	Block of Kcnk3 by Protons. Journal of Biological Chemistry, 2001, 276, 24449-24452.	1.6	107
1085	Dynamic Interaction of S5 and S6 during Voltage-Controlled Gating in a Potassium Channel. Journal of General Physiology, 2001, 118, 157-170.	0.9	22
1086	Disparate Role of Na+ Channel D2-S6 Residues in Batrachotoxin and Local Anesthetic Action. Molecular Pharmacology, 2001, 59, 1100-1107.	1.0	63

	CHATION	ILPOKI	
#	Article	IF	Citations
1087	Molecular Architecture of Full-Length KcsA. Journal of General Physiology, 2001, 117, 165-180.	0.9	235
1088	New approaches to antiarrhythmic therapy: emerging therapeutic applications of the cell biology of cardiac arrhythmias. Cardiovascular Research, 2001, 52, 345-360.	1.8	17
1089	Congenital long QT syndromes and Brugada syndrome: the arrhythmogenic ion channel disorders. Expert Opinion on Pharmacotherapy, 2001, 2, 773-797.	0.9	3
1090	Mean first passage times across a potential barrier in the lumped state approximation. Journal of Chemical Physics, 2001, 114, 76.	1.2	4
1091	Physical model for the gating mechanism of ionic channels. Physical Review E, 2002, 66, 051910.	0.8	3
1092	Intermittent Permeation of Cylindrical Nanopores by Water. Physical Review Letters, 2002, 89, 175502.	2.9	116
1093	A permeation theory for single-file ion channels: Corresponding occupancy states produce Michaelis–Menten behavior. Journal of Chemical Physics, 2002, 117, 11396-11403.	1.2	38
1094	Implications for Mercury Toxicity from the Structure of An Oxacalix[3]arene-HgCl 2 Complex?. Supramolecular Chemistry, 2002, 14, 75-78.	1.5	10
1095	Prediction of ion channel transport from Grote—Hynes and Kramers theories. Molecular Physics, 2002, 100, 2351-2359.	0.8	18
1096	Topology of the Ca2+ release channel of skeletal muscle sarcoplasmic reticulum (RyR1). Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 16725-16730.	3.3	126
1097	Boundary conditions and trajectories of diffusion processes. Journal of Chemical Physics, 2002, 117, 2469-2473.	1.2	20
1098	Channel Blockers Acting atN-Methyl-d-aspartate Receptors: Differential Effects of Mutations in the Vestibule and Ion Channel Pore. Molecular Pharmacology, 2002, 61, 533-545.	1.0	160
1099	Fast and Slow Voltage Sensor Movements in HERG Potassium Channels. Journal of General Physiology, 2002, 119, 275-293.	0.9	107
1100	The Search Is on for the Voltage Sensor-to-gate Coupling. Journal of General Physiology, 2002, 120, 475-481.	0.9	16
1101	Molecular Determinants of Permeation through the Cation Channel TRPV4. Journal of Biological Chemistry, 2002, 277, 33704-33710.	1.6	270
1102	Structural and Functional Role of the Extracellular S5-P Linker in the HERG Potassium Channel. Journal of General Physiology, 2002, 120, 723-737.	0.9	108
1103	The Batrachotoxin Receptor on the Voltage-Gated Sodium Channel is Guarded by the Channel Activation Gate. Molecular Pharmacology, 2002, 61, 905-912.	1.0	35
1104	Cations Affect the Rate of Gating Charge Recovery in Wild-type and W434F Shaker Channels through a Variety of Mechanisms. Journal of General Physiology, 2002, 119, 467-486.	0.9	9

#	Article	IF	CITATIONS
1105	Characterization of a Novel Radiolabeled Peptide Selective for a Subpopulation of Voltage-gated Potassium Channels in Mammalian Brain. Journal of Biological Chemistry, 2002, 277, 3886-3893.	1.6	17
1106	Ligand Binding of the Second PDZ Domain Regulates Clustering of PSD-95 with the Kv1.4 Potassium Channel. Journal of Biological Chemistry, 2002, 277, 3640-3646.	1.6	49
1107	Role of Amino Acid Residues in Transmembrane Segments IS6 and IIS6 of the Na+ Channel α Subunit in Voltage-dependent Gating and Drug Block. Journal of Biological Chemistry, 2002, 277, 35393-35401.	1.6	209
1109	Ser165 in the Second Transmembrane Region of the Kir2.1 Channel Determines its Susceptibility to Blockade by Intracellular Mg2+. Journal of General Physiology, 2002, 120, 677-693.	0.9	34
1110	COUNTING CHANNELS: A TUTORIAL GUIDE ON ION CHANNEL FLUCTUATION ANALYSIS. American Journal of Physiology - Advances in Physiology Education, 2002, 26, 327-341.	0.8	93
1111	Single Amino Acid Change in the Fifth Transmembrane Segment of the TRP Ca2+ Channel Causes Massive Degeneration of Photoreceptors. Journal of Biological Chemistry, 2002, 277, 33884-33889.	1.6	34
1112	Intrinsic flexibility and gating mechanism of the potassium channel KcsA. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 1949-1953.	3.3	58
1113	Histidines 578 and 587 in the S5-S6Linker of the Human Ether-a-gogo Related Gene-1K+ Channels Confer Sensitivity to Reactive Oxygen Species. Journal of Biological Chemistry, 2002, 277, 8912-8919.	1.6	13
1114	Na+ Block and Permeation in a K+ Channel of Known Structure. Journal of General Physiology, 2002, 120, 323-335.	0.9	110
1115	Integration of Shaker-type K+ channel, KAT1, into the endoplasmic reticulum membrane: Synergistic insertion of voltage-sensing segments, S3-S4, and independent insertion of pore-forming segments, S5-P-S6. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 60-65.	3.3	56
1116	An External Determinant in the S5-P Linker of the Pacemaker (HCN) Channel Identified by Sulfhydryl Modification. Journal of Biological Chemistry, 2002, 277, 46233-46242.	1.6	28
1117	Glycine residues in potassium channel-like selectivity filters determine potassium selectivity in four-loop-per-subunit HKT transporters from plants. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 6428-6433.	3.3	257
1118	Autosomal recessive inheritance of <i>RYR1</i> mutations in a congenital myopathy with cores. Neurology, 2002, 59, 284-287.	1.5	157
1119	Single Ion Occupancy and Steady-state Gating of Na Channels in Squid Giant Axon. Journal of General Physiology, 2002, 119, 235-250.	0.9	23
1120	Spermine Block of the Strong Inward Rectifier Potassium Channel Kir2.1. Journal of General Physiology, 2002, 120, 53-66.	0.9	68
1121	Cysteine Mutagenesis and Computer Modeling of the S6 Region of an Intermediate Conductance IKCa Channel. Journal of General Physiology, 2002, 120, 99-116.	0.9	23
1122	Coupling between Voltage Sensors and Activation Gate in Voltage-gated K+ Channels. Journal of General Physiology, 2002, 120, 663-676.	0.9	289
1123	Employing Escherichia coli to functionally express, purify, and characterize a human transporter. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 8597-8601.	3.3	64

#	Article	IF	CITATIONS
1124	Nonlinear partial differential equations and applications: An exchanger-like protein underlies the large Mg2+ current in Paramecium. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 15717-15722.	3.3	25
1125	Splitting the Two Pore Domains from TOK1 Results in Two Cationic Channels with Novel Functional Properties. Journal of Biological Chemistry, 2002, 277, 4797-4805.	1.6	9
1126	Cytoplasmic Vestibule of the Weak Inward Rectifier Kir6.2 Potassium Channel. Journal of Biological Chemistry, 2002, 277, 10523-10530.	1.6	9
1127	Interactions between S4-S5 Linker and S6 Transmembrane Domain Modulate Gating of HERG K+ Channels. Journal of Biological Chemistry, 2002, 277, 18994-19000.	1.6	151
1128	Depolarization Induces Intersubunit Cross-linking in a S4 Cysteine Mutant of the Shaker Potassium Channel. Journal of Biological Chemistry, 2002, 277, 42719-42725.	1.6	26
1129	Molecular Determinants of Voltage-dependent Slow Inactivation of the Ca2+ Channel. Journal of Biological Chemistry, 2002, 277, 6813-6821.	1.6	57
1130	Voltage-Controlled Gating at the Intracellular Entrance to a Hyperpolarization-Activated Cation Channel. Journal of General Physiology, 2002, 119, 83-91.	0.9	98
1131	Probing an Open CFTR Pore with Organic Anion Blockers. Journal of General Physiology, 2002, 120, 647-662.	0.9	62
1132	Site-directed Glycosylation Tagging of Functional Kir2.1 Reveals That the Putative Pore-forming Segment Is Extracellular. Journal of Biological Chemistry, 2002, 277, 24382-24389.	1.6	12
1133	Kinetics of Tethering Quaternary Ammonium Compounds to K+ Channels. Journal of General Physiology, 2002, 120, 203-216.	0.9	21
1134	Molecular Models of Voltage Sensing. Journal of General Physiology, 2002, 120, 455-463.	0.9	115
1135	Convergent Evolution on the Molecular Level. Brain, Behavior and Evolution, 2002, 59, 250-261.	0.9	59
1136	Whole-Genome Analysis of Transporters in the Plant Pathogen Xylella fastidiosa. Microbiology and Molecular Biology Reviews, 2002, 66, 272-299.	2.9	40
1137	F0 of ATP Synthase Is a Rotary Proton Channel. Journal of Biological Chemistry, 2002, 277, 13281-13285.	1.6	83
1138	Molecular Determinants of Voltage-dependent Human Ether-a-Go-Go Related Gene (HERG) K+ Channel Block. Journal of Biological Chemistry, 2002, 277, 23587-23595.	1.6	161
1139	Structure of the BgK-Kv1.1 Complex Based on Distance Restraints Identified by Double Mutant Cycles. Journal of Biological Chemistry, 2002, 277, 37406-37413.	1.6	60
1140	RNA Editing of Neurotransmitter Receptors in the Mammalian Brain. Science Signaling, 2002, 2002, pe26-pe26.	1.6	26
1141	Transmembrane α helices. Current Topics in Membranes, 2002, , 339-370.	0.5	3

#	ARTICLE	IF	CITATIONS
1142	The Identification and Characterization of a Noncontinuous Calmodulin-binding Site in Noninactivating Voltage-dependent KCNQ Potassium Channels. Journal of Biological Chemistry, 2002, 277, 28545-28553.	1.6	179
1143	Two Adaptor Proteins Differentially Modulate the Phosphorylation and Biophysics of Kv1.3 Ion Channel by Src Kinase. Journal of Biological Chemistry, 2002, 277, 13268-13280.	1.6	72
1144	Constitutively active and G-protein coupled inward rectifier K+ channels: Kir2.0 and Kir3.0. , 2002, 145, 47-179.		135
1145	Genes and Proteins for Solute Transport and Sensing. The Arabidopsis Book, 2002, 1, e0092.	0.5	11
1146	Probing CFTR Channel Structure and Function Using the Substituted-Cysteine-Accessibility Method. , 2002, 70, 159-174.		3
1147	Cardiac sodium and calcium channels: a history of excitatory currents. Cardiovascular Research, 2002, 55, 1-8.	1.8	31
1148	A "Minimal―Sodium Channel Construct Consisting of Ligated S5-P-S6 Segments Forms a Toxin-activatable Ionophore. Journal of Biological Chemistry, 2002, 277, 24653-24658.	1.6	27
1149	The α-Helix and the Organization and Gating of Channels. Annual Review of Biophysics and Biomolecular Structure, 2002, 31, 207-233.	18.3	65
1150	Identification of Critical Residues Controlling G Protein-gated Inwardly Rectifying K+ Channel Activity through Interactions with the βγ Subunits of G Proteins. Journal of Biological Chemistry, 2002, 277, 6088-6096.	1.6	92
1151	Structural and Functional Determinants of Conserved Lipid Interaction Domains of Inward Rectifying Kir6.2 Channels. Journal of General Physiology, 2002, 119, 581-591.	0.9	56
1152	Identification of amino acid residues lining the pore of a gap junction channel. Journal of Cell Biology, 2002, 159, 349-360.	2.3	78
1153	The Cation Selectivity Filter of the Bacterial Sodium Channel, NaChBac. Journal of General Physiology, 2002, 120, 845-853.	0.9	141
1154	The Electrocardiogram 100 Years Later. Circulation, 2002, 106, 2173-2179.	1.6	24
1155	The Interaction between the I-II Loop and the III-IV Loop of Cav2.1 Contributes to Voltage-dependent Inactivation in a β-Dependent Manner. Journal of Biological Chemistry, 2002, 277, 10003-10013.	1.6	40
1156	Tail End of the S6 Segment. Journal of General Physiology, 2002, 120, 87-97.	0.9	46
1157	New Binding Site on Common Molecular Scaffold Provides HERG Channel Specificity of Scorpion Toxin BeKm-1. Journal of Biological Chemistry, 2002, 277, 43104-43109.	1.6	59
1158	Control of Outer Vestibule Dynamics and Current Magnitude in the Kv2.1 Potassium Channel. Journal of General Physiology, 2002, 120, 739-755.	0.9	16
1159	Reactions of cysteines substituted in the amphipathic N-terminal tail of a bacterial potassium channel with hydrophilic and hydrophobic maleimides. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 11605-11610.	3.3	22

#	Article	IF	CITATIONS
1160	SUR-dependent Modulation of KATP Channels by an N-terminal KIR6.2 Peptide. Journal of Biological Chemistry, 2002, 277, 43997-44004.	1.6	62
1161	Diurnal and Circadian Regulation of Putative Potassium Channels in a Leaf Moving Organ. Plant Physiology, 2002, 128, 634-642.	2.3	91
1162	Determination of Protein Folds and Conformational Dynamics Using Spin-Labeling EPR Spectroscopy. Biological Magnetic Resonance, 2002, , 185-247.	0.4	12
1163	Critical Molecular Determinants of Voltage-Gated Sodium Channel Sensitivity to μ-Conotoxins GIIIA/B. Molecular Pharmacology, 2002, 61, 1192-1201.	1.0	42
1164	Electrophysiological Analysis of Cloned Cyclic Nucleotide-Gated Ion Channels. Plant Physiology, 2002, 128, 400-410.	2.3	198
1165	Electrostatic and Steric Contributions to Block of the Skeletal Muscle Sodium Channel by μ-Conotoxin. Journal of General Physiology, 2002, 119, 45-54.	0.9	86
1166	STRUCTURAL BIOLOGY: Force and Voltage Sensors in One Structure. Science, 2002, 298, 1562-1563.	6.0	25
1167	Scanning the Intracellular S6 Activation Gate in the Shaker K+ Channel. Journal of General Physiology, 2002, 119, 521-531.	0.9	165
1168	Cysteine-scanning Mutagenesis Reveals a Conformationally Sensitive Reentrant Pore-Loop in the Glutamate Transporter GLT-1. Journal of Biological Chemistry, 2002, 277, 26074-26080.	1.6	61
1169	Characterization of Amino Acid Substitutions in KdpA, the K + -Binding and -Translocating Subunit of the KdpFABC Complex of Escherichia coli. Journal of Bacteriology, 2002, 184, 5491-5494.	1.0	30
1170	A glutamate residue at the C terminus regulates activity of inward rectifier K+ channels: Implication for Andersen's syndrome. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 8430-8435.	3.3	18
1171	Extracellular Sodium Interacts with the HERG Channel at an Outer Pore Site. Journal of General Physiology, 2002, 120, 517-537.	0.9	31
1172	Cation-selective Mutations in the M2 Domain of the Inhibitory Glycine Receptor Channel Reveal Determinants of Ion-Charge Selectivity. Journal of General Physiology, 2002, 119, 393-410.	0.9	89
1173	Amphiphilicity index of polar amino acids as an aid in the characterization of amino acid preference at membrane-water interfaces. Bioinformatics, 2002, 18, 608-616.	1.8	212
1174	Voltage Sensor Movements. Journal of General Physiology, 2002, 120, 465-473.	0.9	133
1175	About the use of protein models. Bioinformatics, 2002, 18, 934-938.	1.8	40
1176	Scanning Mutagenesis of a Janus-faced Atracotoxin Reveals a Bipartite Surface Patch That Is Essential for Neurotoxic Function. Journal of Biological Chemistry, 2002, 277, 22806-22813.	1.6	59
1177	Mapping the Binding Site of a Humanether-a-go-go-related Gene-specific Peptide Toxin (ErgTx) to the Channel's Outer Vestibule. Journal of Biological Chemistry, 2002, 277, 16403-16411.	1.6	96

#		IF	CITATIONS
#	ARTICLE Elucidating the structural basis of membrane transport protein function: light at the end of the	IF	CITATIONS
1178	channel?. Current Opinion in Nephrology and Hypertension, 2002, 11, 523-526.	1.0	0
1179	Characterization of a novel missense mutation E637K in the pore-S6 loop of HERG in a patient with long QT syndrome. Cardiovascular Research, 2002, 54, 67-76.	1.8	25
1180	Aquaglyceroporins: Channel proteins with a conserved core, multiple functions, and variable surfaces. International Review of Cytology, 2002, 215, 75-104.	6.2	74
1182	Localization of the Activation Gate for Small Conductance Ca ²⁺ -activated K ⁺ Channels. Journal of Neuroscience, 2002, 22, 6499-6506.	1.7	71
1183	Identification of Protein Side Chains near the Membraneâ^'Aqueous Interface:  A Site-Directed Spin Labeling Study of KcsA. Biochemistry, 2002, 41, 1123-1128.	1.2	37
1184	Strategies for modeling the interactions of transmembrane helices of G protein-coupled receptors by geometric complementarity using the GRAMM computer algorithm. Methods in Enzymology, 2002, 343, 313-328.	0.4	19
1185	Investigating ion channels using computational methods. Current Topics in Membranes, 2002, , 255-273.	0.5	2
1186	Chapter 3 Basic mechanisms of ion channel function. Supplements To Clinical Neurophysiology, 2002, , 33-42.	2.1	0
1187	Two pore residues mediate acidosis-induced enhancement of C-type inactivation of the Kv1.4 K ⁺ channel. American Journal of Physiology - Cell Physiology, 2002, 283, C1114-C1121.	2.1	20
1188	New Roles for Old Holes: Ion Channel Function in Aquaporin-1. Physiology, 2002, 17, 68-72.	1.6	56
1189	Molecular Identification of O2 Sensors and O2-Sensitive Potassium Channels in the Pulmonary Circulation. Advances in Experimental Medicine and Biology, 2002, 475, 219-240.	0.8	109
1190	Model for a Helical Bundle Channel Based on the High-Resolution Crystal Structure of Trichotoxin_A50E. Biochemistry, 2002, 41, 12934-12941.	1.2	62
1191	Role of Aromatic Side Chains in the Binding of Volatile General Anesthetics to a Four-α-Helix Bundleâ€. Biochemistry, 2002, 41, 4080-4087.	1.2	32
1192	Cyclic Nucleotide-Gated Ion Channels. Physiological Reviews, 2002, 82, 769-824.	13.1	1,064
1193	First-Principles Determination of the Absolute Hydration Free Energy of the Hydroxide Ionâ€. Journal of Physical Chemistry A, 2002, 106, 9737-9744.	1.1	105
1194	Opening the KcsA K+ Channel:  Tryptophan Scanning and Complementation Analysis Lead to Mutants with Altered Gating. Biochemistry, 2002, 41, 13653-13662.	1.2	60
1195	Extracellular Domains, Transmembrane Segments, and Intracellular Domains Interact To Determine the Cation Selectivity of Na,K- and Gastric H,K-ATPaseâ€. Biochemistry, 2002, 41, 9803-9812.	1.2	18
1196	Molecular Dynamics Simulations of a K Channel Model:Â Sensitivity to Changes in Ions, Waters, and Membrane Environment. Journal of Physical Chemistry B, 2002, 106, 4543-4551.	1.2	56

#	Article	IF	CITATIONS
1197	Probing the Topology of the Glycine Receptor by Chemical Modification Coupled to Mass Spectrometryâ€. Biochemistry, 2002, 41, 6140-6148.	1.2	45
1198	Deciphering the Role of Individual Acyl Chains in the Interaction Network between Phosphatidylserines and a Single-Spanning Membrane Protein. Biochemistry, 2002, 41, 13611-13616.	1.2	13
1199	Rectification and voltage gating of ion currents in a nanofabricated pore. Europhysics Letters, 2002, 60, 349-355.	0.7	235
1200	Semisynthesis and Folding of the Potassium Channel KcsA. Journal of the American Chemical Society, 2002, 124, 9113-9120.	6.6	165
1201	Mutating a Critical Lysine in ShK Toxin Alters Its Binding Configuration in the Poreâ^'Vestibule Region of the Voltage-Gated Potassium Channel, Kv1.3. Biochemistry, 2002, 41, 11963-11971.	1.2	64
1202	Synthetic Hydraphile Channels of Appropriate Length KillEscherichiacoli. Journal of the American Chemical Society, 2002, 124, 9022-9023.	6.6	88
1203	The Effects of Hydrophobic Mismatch between Phosphatidylcholine Bilayers and Transmembrane α-Helical Peptides Depend on the Nature of Interfacially Exposed Aromatic and Charged Residuesâ€. Biochemistry, 2002, 41, 8396-8404.	1.2	94
1204	Tyrosine Phosphorylation of the Inactivating Peptide of the Shaker B Potassium Channel:  A Structuralâ~'Functional Correlate. Biochemistry, 2002, 41, 12263-12269.	1.2	9
1205	Molecular Structure and Physiological Function of Chloride Channels. Physiological Reviews, 2002, 82, 503-568.	13.1	1,120
1206	Expression and Initial Structural Insights from Solid-State NMR of the M2 Proton Channel from Influenza A Virus. Biochemistry, 2002, 41, 11294-11300.	1.2	57
1207	Flexible Regions within the Membrane-Embedded Portions of Polytopic Membrane Proteins. Biochemistry, 2002, 41, 3852-3854.	1.2	21
1208	Crystal Structure of Escherichia coli MscS, a Voltage-Modulated and Mechanosensitive Channel. Science, 2002, 298, 1582-1587.	6.0	574
1209	The Binding Site for Channel Blockers That Rescue Misprocessed Human Long QT Syndrome Type 2 ether-a-gogo-related Gene (HERG) Mutations. Journal of Biological Chemistry, 2002, 277, 4989-4998.	1.6	161
1210	Paradigms for Protein-Ligand Interactions. ACS Symposium Series, 2002, , 216-230.	0.5	1
1211	The conformations of polypeptide chains where the main-chain parts of successive residues are enantiomeric. Their occurrence in cation and anion-binding regions of proteins 1 1 Edited by J. Thornton. Journal of Molecular Biology, 2002, 315, 183-191.	2.0	76
1212	Structure–Function Relationships in Ca2+ Cycling Proteins. Journal of Molecular and Cellular Cardiology, 2002, 34, 897-918.	0.9	75
1213	Membrane Topography of Cardiac Triadin. Archives of Biochemistry and Biophysics, 2002, 398, 61-72.	1.4	1
1214	Engineering-Specific Pharmacological Binding Sites for Peptidyl Inhibitors of Potassium Channels into KcsAâ€. Biochemistry, 2002, 41, 15369-15375.	1.2	31

#	Article	IF	CITATIONS
1215	Calix[4]tubes:Â A New Class of Potassium-Selective Ionophore. Journal of the American Chemical Society, 2002, 124, 1341-1353.	6.6	117
1216	Ligand Binding Affinities from MD Simulations. Accounts of Chemical Research, 2002, 35, 358-365.	7.6	348
1217	Ion Channel Formation from a Calix[4]arene Amide That Binds HCl. Journal of the American Chemical Society, 2002, 124, 2267-2278.	6.6	204
1218	Flexible constraints: An adiabatic treatment of quantum degrees of freedom, with application to the flexible and polarizable mobile charge densities in harmonic oscillators model for water. Journal of Chemical Physics, 2002, 116, 9602-9610.	1.2	31
1219	Synthesis, Characterization, and Application of Cy-Dye- and Alexa-Dye-Labeled Hongotoxin1Analogues. The First High Affinity Fluorescence Probes for Voltage-Gated K+Channels. Bioconjugate Chemistry, 2002, 13, 416-425.	1.8	28
1220	Lariat Ether Receptor Systems Show Experimental Evidence for Alkali Metal Cationâ^'Ï€ Interactions. Accounts of Chemical Research, 2002, 35, 878-886.	7.6	226
1221	Enhancing Mineral Content in Plant Food Products. Journal of the American College of Nutrition, 2002, 21, 178S-183S.	1.1	145
1222	Cardiac Ion Channels. Annual Review of Physiology, 2002, 64, 431-475.	5.6	259
1223	Genomic analysis of membrane protein families: abundance and conserved motifs. Genome Biology, 2002, 3, research0054.1.	13.9	65
1224	Water As A Structural Element In A Channel: Gating In The Kcsa Channel, And Implications For Voltage- Gated Ion Channels. Journal of Biomolecular Structure and Dynamics, 2002, 19, 725-730.	2.0	14
1225	Structure and Function of Voltage-Dependent Ion Channel Regulatory Î ² Subunits. Biochemistry, 2002, 41, 2886-2894.	1.2	95
1226	Novel Amphi-ionophore in Aqueous Solution:Â Cyclohexaalanyl. Journal of Physical Chemistry B, 2002, 106, 2061-2064.	1.2	34
1227	TETRAETHYLAMMONIUM BINDING TO THE OUTER MOUTH OF THE KcsA POTASSIUM CHANNEL: IMPLICATIONS FOR ION PERMEATION. Journal of Receptor and Signal Transduction Research, 2002, 22, 315-331.	1.3	17
1228	Monte Carlo simulations of ion selectivity in a biological Na channel: Charge–space competition. Physical Chemistry Chemical Physics, 2002, 4, 5154-5160.	1.3	83
1229	Conransporters as molecular water pumps. International Review of Cytology, 2002, 215, 259-284.	6.2	38
1230	A physical mechanism for large-ion selectivity of ion channels. Physical Chemistry Chemical Physics, 2002, 4, 4763-4769.	1.3	32
1231	Selectivity of calix[4]tubes towards metal ions: A molecular dynamics study. Physical Chemistry Chemical Physics, 2002, 4, 3849-3858.	1.3	20
1232	Differences in Apparent Pore Sizes of Low and High Voltage-activated Ca2+ Channels. Journal of Biological Chemistry, 2002, 277, 45969-45976.	1.6	41

		CITATION F	Report	
#	Article		IF	CITATIONS
1233	Bioinformatics: from genome to drug targets. Annals of Medicine, 2002, 34, 306-312.		1.5	13
1234	Ion channels: structural bioinformatics and modelling. Human Molecular Genetics, 2002	2, 11, 2425-2433.	1.4	49
1235	Molecular Basis for Species-Specific Sensitivity to "Hot―Chili Peppers. Cell, 2002, I	108, 421-430.	13.5	827
1236	Energetics of Pore Opening in a Voltage-Gated K+ Channel. Cell, 2002, 111, 231-239.		13.5	271
1237	Structural Basis of Inward Rectification. Cell, 2002, 111, 957-965.		13.5	356
1238	Transmembrane topology of the NuoL, M and N subunits of NADH:quinone oxidoreduct homologues among membrane-bound hydrogenases and bona fide antiporters. Biochim Biophysica Acta - Bioenergetics, 2002, 1556, 121-132.	ase and their hica Et	0.5	179
1239	Potassium permeation through the KcsA channel: a density functional study. Biochimica Acta - Biomembranes, 2002, 1563, 1-6.	a Et Biophysica	1.4	65
1240	Molecular analysis of the mechanism of potassium uptake through the TRK1 transporte Saccharomyces cerevisiae. Biochimica Et Biophysica Acta - Biomembranes, 2002, 1564,		1.4	60
1241	Residue-specific millisecond to microsecond fluctuations in bacteriorhodopsin induced or disorganized two-dimensional crystalline lattice, through modified lipid–helix and h interactions, as revealed by 13C NMR. Biochimica Et Biophysica Acta - Biomembranes, 2	nélix–helix	1.4	29
1242	Recent advances in ion channel research. Biochimica Et Biophysica Acta - Biomembrane 267-286.	s, 2002, 1565,	1.4	87
1243	The structure of the M2 channel-lining segment from the nicotinic acetylcholine recepto Et Biophysica Acta - Biomembranes, 2002, 1565, 287-293.	or. Biochimica	1.4	21
1244	Potassium channels: structures, models, simulations. Biochimica Et Biophysica Acta - Bio 2002, 1565, 294-307.	omembranes,	1.4	132
1245	Two-pore domain K+ channels—molecular sensors. Biochimica Et Biophysica Acta - Bic 2002, 1566, 152-161.	omembranes,	1.4	83
1246	Kinetic properties of Kv4.3 and their modulation by KChIP2b. Biochemical and Biophysic Communications, 2002, 295, 223-229.	cal Research	1.0	30
1247	Binding symmetry of extracellular divalent cations to conduction pore studied using tar of a CNG channel. Biochemical and Biophysical Research Communications, 2002, 298, 4		1.0	1
1248	Mapping the receptor site for ergtoxin, a specific blocker of ERG channels. FEBS Letters 45-49.	, 2002, 510,	1.3	31
1249	Genome-wide detection and family clustering of ion channels. FEBS Letters, 2002, 514,	129-134.	1.3	12
1250	Components required for membrane assembly of newly synthesized K+channel KcsA. FE 2002, 511, 51-58.	EBS Letters,	1.3	25

#	Article	IF	CITATIONS
1251	Influence of lipids on membrane assembly and stability of the potassium channel KcsA. FEBS Letters, 2002, 525, 33-38.	1.3	74
1252	Progress in the analysis of membrane protein structure and function. FEBS Letters, 2002, 529, 65-72.	1.3	74
1253	The short N-terminus is required for functional expression of the virus-encoded miniature K+channel Kcv. FEBS Letters, 2002, 530, 65-69.	1.3	39
1254	Brownian Dynamics Simulations of the Recognition of the Scorpion Toxin P05 with the Small-conductance Calcium-activated Potassium Channels. Journal of Molecular Biology, 2002, 318, 417-428.	2.0	45
1255	A Novel Scoring Function for Predicting the Conformations of Tightly Packed Pairs of Transmembrane α-Helices. Journal of Molecular Biology, 2002, 321, 363-378.	2.0	74
1256	Ca2+-ATPase structure in the E1 and E2 conformations: mechanism, helix–helix and helix–lipid interactions. Biochimica Et Biophysica Acta - Biomembranes, 2002, 1565, 246-266.	1.4	55
1257	Continuum Electrostatics Fails to Describe Ion Permeation in the Gramicidin Channel. Biophysical Journal, 2002, 83, 1348-1360.	0.2	108
1258	Open-State Models of a Potassium Channel. Biophysical Journal, 2002, 83, 1867-1876.	0.2	55
1259	Pore Topology of the Hyperpolarization-Activated Cyclic Nucleotide-Gated Channel from Sea Urchin Sperm. Biophysical Journal, 2002, 83, 1953-1964.	0.2	15
1260	Noncontact Dipole Effects on Channel Permeation. VI. 5F- and 6F-Trp Gramicidin Channel Currents. Biophysical Journal, 2002, 83, 1974-1986.	0.2	25
1261	Interactions of Phospholipids with the Potassium Channel KcsA. Biophysical Journal, 2002, 83, 2026-2038.	0.2	95
1262	Unclogging a Pipe: Potassium Channel Pinball. Biophysical Journal, 2002, 83, 2-4.	0.2	2
1263	Modeling Diverse Range of Potassium Channels with Brownian Dynamics. Biophysical Journal, 2002, 83, 263-277.	0.2	89
1264	K+ versus Na+ Ions in a K Channel Selectivity Filter: A Simulation Study. Biophysical Journal, 2002, 83, 633-645.	0.2	137
1265	Gating of Heteromeric Retinal Rod Channels by Cyclic AMP: Role of the C-Terminal and Pore Domains. Biophysical Journal, 2002, 83, 920-931.	0.2	3
1266	Brownian Dynamics Simulations of the Recognition of the Scorpion Toxin Maurotoxin with the Voltage-Gated Potassium Ion Channels. Biophysical Journal, 2002, 83, 2370-2385.	0.2	49
1267	Analysis and Evaluation of Channel Models: Simulations of Alamethicin. Biophysical Journal, 2002, 83, 2393-2407.	0.2	123
1268	A Coarse-Grained Normal Mode Approach for Macromolecules:An Efficient Implementation and Application to Ca2+-ATPase. Biophysical Journal, 2002, 83, 2457-2474.	0.2	190

#	Article	IF	CITATIONS
1269	Localization of Divalent Cation-Binding Site in the Pore of a Small Conductance Ca2+-Activated K+ Channel and Its Role in Determining Current-Voltage Relationship. Biophysical Journal, 2002, 83, 2528-2538.	0.2	39
1270	Modeling the Structure of Agitoxin in Complex with the Shaker K+ Channel: A Computational Approach Based on Experimental Distance Restraints Extracted from Thermodynamic Mutant Cycles. Biophysical Journal, 2002, 83, 2595-2609.	0.2	124
1271	Flux Coupling in the Human Serotonin Transporter. Biophysical Journal, 2002, 83, 3268-3282.	0.2	47
1272	Staggering of Subunits in NMDAR Channels. Biophysical Journal, 2002, 83, 3304-3314.	0.2	56
1273	Surface Potentials and the Calculated Selectivity of Ion Channels. Biophysical Journal, 2002, 82, 156-159.	0.2	33
1274	Conducting-State Properties of the KcsA Potassium Channel from Molecular and Brownian Dynamics Simulations. Biophysical Journal, 2002, 82, 628-645.	0.2	134
1275	Spatial Structure of Zervamicin IIB Bound to DPC Micelles: Implications for Voltage-Gating. Biophysical Journal, 2002, 82, 762-771.	0.2	42
1276	The Ionization State and the Conformation of Glu-71 in the KcsA K+ Channel. Biophysical Journal, 2002, 82, 772-780.	0.2	85
1277	On the Potential Functions used in Molecular Dynamics Simulations of Ion Channels. Biophysical Journal, 2002, 82, 1681-1684.	0.2	76
1278	Modeling of the Pore Domain of the GLUR1 Channel: Homology with K+ Channel and Binding of Channel Blockers. Biophysical Journal, 2002, 82, 1884-1893.	0.2	49
1279	Reservoir Boundaries in Brownian Dynamics Simulations of Ion Channels. Biophysical Journal, 2002, 82, 1975-1984.	0.2	60
1280	Molecular Mechanism of H+ Conduction in the Single-File Water Chain of the Gramicidin Channel. Biophysical Journal, 2002, 82, 2304-2316.	0.2	250
1281	Role of the Proposed Pore-Forming Segment of the Ca2+ Release Channel (Ryanodine Receptor) in Ryanodine Interaction*. Biophysical Journal, 2002, 82, 2436-2447.	0.2	61
1282	Three-Dimensional Structure of the S4–S5 Segment of the Shaker Potassium Channel. Biophysical Journal, 2002, 82, 2995-3002.	0.2	25
1283	Inhibition of Single Shaker K Channels by κâ^'Conotoxin-PVIIA. Biophysical Journal, 2002, 82, 3003-3011.	0.2	21
1284	Inactivation and Pharmacological Properties of sqKv1A Homotetramers in Xenopus Oocytes Cannot Account for Behavior of the Squid "Delayed Rectifier―K+ Conductance. Biophysical Journal, 2002, 82, 3022-3036.	0.2	9
1285	Origin of1/fαNoise in Membrane Channel Currents. Physical Review Letters, 2002, 89, 158101.	2.9	154
1286	The βγ Subunits of G Proteins Gate a K+ Channel by Pivoted Bending of a Transmembrane Segment. Molecular Cell 2002, 10, 469-481	4.5	123

#	Article	IF	CITATIONS
1287	Extensive Editing of mRNAs for the Squid Delayed Rectifier K+ Channel Regulates Subunit Tetramerization. Neuron, 2002, 34, 743-757.	3.8	75
1288	Conformational Switch between Slow and Fast Gating Modes. Neuron, 2002, 35, 935-949.	3.8	65
1289	Rod Cyclic Nucleotide-Gated Channels Have a Stoichiometry of Three CNGA1 Subunits and One CNGB1 Subunit. Neuron, 2002, 36, 891-896.	3.8	250
1290	Genes responsible for native depolarization-activated K+ currents in neurons. Neuroscience Research, 2002, 42, 7-14.	1.0	78
1291	Structure and association of ATP-binding cassette transporter nucleotide-binding domains. Biochimica Et Biophysica Acta - Biomembranes, 2002, 1561, 47-64.	1.4	119
1292	Viral ion channels: structure and function. Biochimica Et Biophysica Acta - Biomembranes, 2002, 1561, 27-45.	1.4	119
1293	The diversity in the vanilloid (TRPV) receptor family of ion channels. Trends in Pharmacological Sciences, 2002, 23, 183-191.	4.0	458
1294	Mechanisms of colicin binding and transport through outer membrane porins. Biochimie, 2002, 84, 399-412.	1.3	96
1295	Huperzine A inhibits the sustained potassium current in rat dissociated hippocampal neurons. Neuroscience Letters, 2002, 329, 153-156.	1.0	16
1296	Epithelial Sodium Channel/Degenerin Family of Ion Channels: A Variety of Functions for a Shared Structure. Physiological Reviews, 2002, 82, 735-767.	13.1	963
1297	The molecular basis of the structure and function of the 5-HT 3 receptor: a model ligand-gated ion channel (Review). Molecular Membrane Biology, 2002, 19, 11-26.	2.0	174
1298	Partially Charged H5O2as a Chemical Switch:Â A Bond Order and Atoms in Molecules Study of Hydrogen Bonding Determined by Surrounding Groups. Journal of Physical Chemistry A, 2002, 106, 11221-11226.	1.1	16
1299	Functional Stoichiometry of Glutamate Receptor Desensitization. Journal of Neuroscience, 2002, 22, 3392-3403.	1.7	76
1300	Ion Channels. , 2002, , 599-615.		3
1301	Alternative Splicing of a β4Subunit Proline-Rich Motif Regulates Voltage-Dependent Gating and Toxin Block of Cav2.1 Ca2+Channels. Journal of Neuroscience, 2002, 22, 9331-9339.	1.7	25
1302	Vascular tone. , 2002, , 3-32.		0
1303	Sharing signals: connecting lung epithelial cells with gap junction channels. American Journal of Physiology - Lung Cellular and Molecular Physiology, 2002, 283, L875-L893.	1.3	56
1304	Mutations throughout the S6 region of the hKv1.5 channel alter the stability of the activation gate. American Journal of Physiology - Cell Physiology, 2002, 282, C161-C171.	2.1	19

#	Article	IF	CITATIONS
1305	Three-dimensional reconstruction of ryanodine receptors. Frontiers in Bioscience - Landmark, 2002, 7, d1464.	3.0	23
1306	Ion conduction and selectivity in the ryanodine receptor channel. Frontiers in Bioscience - Landmark, 2002, 7, d1223-1230.	3.0	9
1307	DNA Interacts With <i>Bacillus Subtilis</i> Mechano-sensitive Channels in Native Membrane Patches. Cellular Physiology and Biochemistry, 2002, 12, 127-134.	1.1	8
1308	New Perspectives on the Structure and Function of the Na+ Channel Multigene Family. Current Medicinal Chemistry - Central Nervous System Agents, 2002, 2, 59-81.	0.6	4
1309	The NMDA Receptor M3 Segment Is a Conserved Transduction Element Coupling Ligand Binding to Channel Opening. Journal of Neuroscience, 2002, 22, 2044-2053.	1.7	124
1310	A bas les barrières… d'énergie dans les canaux potassiquesÂ!. Medecine/Sciences, 2002, 18, 605-609.	0.0	1
1311	Subunit modification and association in VR1 ion channels. BMC Neuroscience, 2002, 3, 4.	0.8	30
1312	Forging the link between structure and function of electrogenic cotransporters: the renal type IIa Na+/Pi cotransporter as a case study. Progress in Biophysics and Molecular Biology, 2002, 80, 69-108.	1.4	63
1313	IP3 receptors and their regulation by calmodulin and cytosolic Ca2+. Cell Calcium, 2002, 32, 321-334.	1.1	209
1314	K+ channels as therapeutic drug targets. , 2002, 94, 157-182.		142
1315	Experiments on ion channels at high pressure. BBA - Proteins and Proteomics, 2002, 1595, 387-389.	2.1	13
1316	Ion Channels: Frozen Motion. Current Biology, 2002, 12, R65-R67.	1.8	5
1317	Ion Channels: Open at Last. Current Biology, 2002, 12, R566-R568.	1.8	2
1318	Glutamate Receptors: Desensitizing Dimers. Current Biology, 2002, 12, R631-R632.	1.8	1
1319	Ion channels: does each subunit do something on its own?. Trends in Biochemical Sciences, 2002, 27, 402-409.	3.7	26
1320	The third dimension for protein interactions and complexes. Trends in Biochemical Sciences, 2002, 27, 633-638.	3.7	91
1321	Chloride Channel Function. Structure, 2002, 10, 283-284.	1.6	0
1322	Intra- and Intermolecular Interactions in Sucrose Transporters at the Plasma Membrane Detected by the Split-Ubiquitin System and Functional Assays. Structure, 2002, 10, 763-772.	1.6	54

#	Article	IF	CITATIONS
1323	New Structural Perspectives on K+ Channel Gating. Structure, 2002, 10, 1027-1029.	1.6	29
1324	Voltage Sensing and Activation Gating of HCN Pacemaker Channels. Trends in Cardiovascular Medicine, 2002, 12, 42-45.	2.3	18
1325	KCNE Regulation of KvLQT1 Channels Structure–Function Correlates. Trends in Cardiovascular Medicine, 2002, 12, 182-187.	2.3	55
1326	Structural Basis of Inward Rectifying Potassium Channel Gating. Trends in Cardiovascular Medicine, 2002, 12, 253-258.	2.3	25
1327	Activity-dependent neuronal differentiation prior to synapse formation: the functions of calcium transients. Journal of Physiology (Paris), 2002, 96, 73-80.	2.1	89
1328	Theoretical and computational models of ion channels. Current Opinion in Structural Biology, 2002, 12, 182-189.	2.6	109
1329	Membrane protein complexes. Current Opinion in Structural Biology, 2002, 12, 239-243.	2.6	46
1330	Crystallisation of membrane proteins mediated by antibody fragments. Current Opinion in Structural Biology, 2002, 12, 503-508.	2.6	180
1331	Structure and Function of Water Channels. Current Opinion in Structural Biology, 2002, 12, 509-515.	2.6	246
1332	CLC chloride channels: correlating structure with function. Current Opinion in Structural Biology, 2002, 12, 531-539.	2.6	86
1335	StrukturübergÃ ¤ ge in Clustern. Angewandte Chemie, 2002, 114, 1534-1554.	1.6	12
1336	Towards Synthetic Adrenaline Receptors—Shape-Selective Adrenaline Recognition in Water. Chemistry - A European Journal, 2002, 8, 1485-1499.	1.7	52
1337	Cation-Promoted Hierarchical Formation of Supramolecular Assemblies of Self-Organized Helical Molecular Components. Angewandte Chemie - International Edition, 2002, 41, 1195-1198.	7.2	101
1338	The Determination of the Absolute Configurations of Diastereomers of (S)-Camphanoyl 3-Hydroxy-5-oxohexanoic Acid Derivatives by X-ray Crystallography. Angewandte Chemie - International Edition, 2002, 41, 1198-1202.	7.2	10
1339	Structural Transitions in Clusters. Angewandte Chemie - International Edition, 2002, 41, 1468-1487.	7.2	117
1340	Molekülsonden zur Erforschung von IonenkanÃҟn: Der Weg von Ionen durch die Zellmembran. Biologie in Unserer Zeit, 2002, 32, 102-109.	0.3	1
1341	Dithio-Phospholipids for Biospecific Immobilization of Proteins on Gold Surfaces. Single Molecules, 2002, 3, 119-125.	1.6	17
1342	Structural genomics of "non-standard―proteins: a chance for membrane proteins?. Gene Function & Disease, 2002, 3, 39-48.	0.3	12

#	Article	IF	CITATIONS
1343	Body Shaping under Water Stress: Osmosensing and Osmoregulation of Solute Transport in Bacteria. ChemBioChem, 2002, 3, 384.	1.3	101
1344	Synthesis and NMR Analysis in Solution of Oligo(3-hydroxyalkanoic acid) Derivatives with the Side Chains of Alanine, Valine, and Leucine (β-Depsides): Coming Full Circle from PHB toβ-Peptides to PHB. Helvetica Chimica Acta, 2002, 85, 633-658.	1.0	20
1345	Molecular determinants of the hanatoxin binding in voltage-gated K+-channel drk1. Journal of Molecular Recognition, 2002, 15, 175-179.	1.1	12
1346	Genetic disorders of neuromuscular ion channels. Muscle and Nerve, 2002, 26, 299-325.	1.0	20
1347	Heterologous Expression and Purification Systems for Structural Proteomics of Mammalian Membrane Proteins. Comparative and Functional Genomics, 2002, 3, 511-517.	2.0	13
1348	Conformational dynamics of helix S6 from Shaker potassium channel: Simulation studies. Biopolymers, 2002, 64, 303-313.	1.2	68
1349	Regulation of the K channels by cytoplasmic domains. Biopolymers, 2002, 66, 294-299.	1.2	6
1350	Glycine receptors: Lessons on topology and structural effects of the lipid bilayer. Biopolymers, 2002, 66, 359-368.	1.2	7
1351	A mutational hot spot in theKCNQ4 gene responsible for autosomal dominant hearing impairment. Human Mutation, 2002, 20, 15-19.	1.1	48
1352	Stretch-activated channels in the heart: Their role in arrhythmias and potential as antiarrhythmic drug targets. Drug Development Research, 2002, 55, 53-58.	1.4	5
1353	Voltage-Dependence of Virus-encoded Miniature K+ Channel Kcv. Journal of Membrane Biology, 2002, 187, 15-25.	1.0	29
1354	External Pore Collapse as an Inactivation Mechanism for Kv4.3 K+ Channels. Journal of Membrane Biology, 2002, 188, 73-86.	1.0	25
1355	CFTR is a Monomer: Biochemical and Functional Evidence. Journal of Membrane Biology, 2002, 188, 55-71.	1.0	35
1356	Anomalous Effects of External TEA on Permeation and Gating of the A-Type Potassium Current in H. aspersa Neuronal Somata. Journal of Membrane Biology, 2002, 190, 17-28.	1.0	5
1357	Free energy of a potassium ion in a model of the channel formed by an amphipathic leucine-serine peptide. European Biophysics Journal, 2002, 31, 198-206.	1.2	4
1358	Setting up and optimization of membrane protein simulations. European Biophysics Journal, 2002, 31, 217-227.	1.2	157
1359	Molecular dynamics simulations and KcsA channel gating. European Biophysics Journal, 2002, 31, 207-216.	1.2	33
1360	Ion channels: recent progress and prospects. European Biophysics Journal, 2002, 31, 283-293.	1.2	32

#	Article	IF	CITATIONS
1361	Modulation of voltage sensitivity by N-terminal cytoplasmic residues in human Kv1.2 channels. European Biophysics Journal, 2002, 31, 365-372.	1.2	7
1362	Cumulative inactivation and the pore domain in the Kv1 channels. Pflugers Archiv European Journal of Physiology, 2002, 443, 720-730.	1.3	2
1363	Ion channel-directed therapies in autonomic neurons: a view from the bench. Clinical Autonomic Research, 2002, 12, 59-65.	1.4	1
1364	Ion channels and diseases. Medical Electron Microscopy: Official Journal of the Clinical Electron Microscopy Society of Japan, 2002, 35, 117-126.	1.8	32
1365	Molecular simulation reveals structural determinants of the hanatoxin binding in Kv2.1 channels. Journal of Molecular Modeling, 2002, 8, 253-257.	0.8	11
1366	Synthetic membrane transporters. Current Opinion in Chemical Biology, 2002, 6, 749-756.	2.8	67
1367	Synthetic efficiency and functional selectivity: two goals for synthetic ion channels. Journal of Supramolecular Chemistry, 2002, 2, 29-37.	0.4	3
1368	Voltage-dependent ion channels formed by dodeca- and pentadecaoligopeptides with two charged terminal groups. Journal of Supramolecular Chemistry, 2002, 2, 39-48.	0.4	2
1369	Cloning, purification, crystallization and preliminary X-ray studies of RFC boxes II–VIII of replication factor C fromMethanococcus jannaschii. Acta Crystallographica Section D: Biological Crystallography, 2002, 58, 519-521.	2.5	2
1370	Cation–π interactions between ammonium ion and aromatic rings: an energy decomposition study. Computational and Theoretical Chemistry, 2002, 587, 177-188.	1.5	48
1371	The nature of the receptor site for the reversible K+ channel blocking by aminopyridines. Biophysical Chemistry, 2002, 96, 1-14.	1.5	31
1372	TheKlTrk1gene encodes a low affinity transporter of the K+uptake system in the budding yeastKluyveromyces lactis. Yeast, 2002, 19, 601-609.	0.8	3
1373	A critical analysis of continuum electrostatics: The screened Coulomb potential-implicit solvent model and the study of the alanine dipeptide and discrimination of misfolded structures of proteins. Proteins: Structure, Function and Bioinformatics, 2002, 47, 45-61.	1.5	60
1374	Interhelical hydrogen bonds and spatial motifs in membrane proteins: Polar clamps and serine zippers. Proteins: Structure, Function and Bioinformatics, 2002, 47, 209-218.	1.5	149
1375	Water in protein cavities: A procedure to identify internal water and exchange pathways and application to fatty acid-binding protein. Proteins: Structure, Function and Bioinformatics, 2002, 47, 534-545.	1.5	27
1376	Simulations of ion current in realistic models of ion channels: The KcsA potassium channel. Proteins: Structure, Function and Bioinformatics, 2002, 47, 265-280.	1.5	85
1377	Solution phase synthesis and purification of the minigramicidin ion channels and a succinyl-linked gramicidin. Tetrahedron, 2002, 58, 2789-2801.	1.0	19
1378	Aggregation of lariat ethers attached to a membrane anchoring unit. Tetrahedron, 2002, 58, 10263-10268.	1.0	7

#	Article	IF	CITATIONS
1379	Molecular structure heterogeneity of gramicidin analogs incorporated into SDS micelles: a NMR study. Journal of Molecular Structure, 2002, 602-603, 245-256.	1.8	3
1380	Variable K + channel subunit dysfunction in inherited mutations of KCNA1. Journal of Physiology, 2002, 538, 5-23.	1.3	60
1381	Molecular determinants of the inhibition of human Kv1.5 potassium currents by external protons and Zn 2+. Journal of Physiology, 2002, 541, 9-24.	1.3	54
1382	Passive water and urea permeability of a human Na + –glutamate cotransporter expressed in Xenopus oocytes. Journal of Physiology, 2002, 542, 817-828.	1.3	47
1383	Role of outer ring carboxylates of the rat skeletal muscle sodium channel pore in proton block. Journal of Physiology, 2002, 543, 71-84.	1.3	63
1384	Identification of a site involved in the block by extracellular Mg 2+ and Ba 2+ as well as permeation of K + in the Kir2.1 K + channel. Journal of Physiology, 2002, 544, 665-677.	1.3	34
1385	The voltage-gated potassium channels and their relatives. Nature, 2002, 419, 35-42.	13.7	630
1386	A biological role for prokaryotic CIC chloride channels. Nature, 2002, 419, 715-718.	13.7	204
1387	Competence to replicate in the unfertilized egg is conferred by Cdc6 during meiotic maturation. Nature, 2002, 419, 718-722.	13.7	54
1388	Crystal structure of bacterial multidrug efflux transporter AcrB. Nature, 2002, 419, 587-593.	13.7	893
1389	Chloride channels are different. Nature, 2002, 415, 276-277.	13.7	46
1390	X-ray structure of a ClC chloride channel at 3.0 à reveals the molecular basis of anion selectivity. Nature, 2002, 415, 287-294.	13.7	1,529
1391	Nothing automatic about ion-channel structures. Nature, 2002, 416, 261-262.	13.7	18
1392	Mechanism of glutamate receptor desensitization. Nature, 2002, 417, 245-253.	13.7	650
1393	An open and shut case. Nature, 2002, 417, 501-502.	13.7	17
1394	Model hearing. Nature, 2002, 417, 502-503.	13.7	4
1395	Crystal structure and mechanism of a calcium-gated potassium channel. Nature, 2002, 417, 515-522.	13.7	1,325
1396	The open pore conformation of potassium channels. Nature, 2002, 417, 523-526.	13.7	1,160

#	Article	IF	Citations
1397	They said it couldn't be done Nature, 2002, 418, 268-269.	13.7	8
1398	The structure and function of glutamate receptor ion channels. Nature Reviews Neuroscience, 2002, 3, 91-101.	4.9	338
1399	Potassium channel structures. Nature Reviews Neuroscience, 2002, 3, 115-121.	4.9	173
1400	Three-dimensional structure of a bacterial oxalate transporter. Nature Structural Biology, 2002, 9, 597-600.	9.7	114
1401	Inhibition of slow Ca2+ -activated K+ current by 4-aminopyridine in rat hippocampal CA1 pyramidal neurones. British Journal of Pharmacology, 2002, 135, 1013-1025.	2.7	8
1402	Antibodies and a cysteine-modifying reagent show correspondence of M current in neurons to KCNQ2 and KCNQ3 K+channels. British Journal of Pharmacology, 2002, 137, 1173-1186.	2.7	71
1403	Geometrical modelling of Ohmic conductance in ion channels. Journal of Molecular Graphics and Modelling, 2002, 21, 101-110.	1.3	0
1404	Two novel toxins from the Amazonian scorpion Tityus cambridgei that block Kv1.3 and Shaker B K+-channels with distinctly different affinities. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2002, 1601, 123-131.	1.1	74
1405	Helical ice-sheets inside carbon nanotubes in the physiological condition. Chemical Physics Letters, 2002, 355, 445-448.	1.2	172
1406	K+/Na+ selectivity of KcsA potassium channel analyzed by reference interaction site model (RISM) integral equation theory. Chemical Physics Letters, 2002, 365, 110-116.	1.2	5
1407	Lipids in the Structure, Folding, and Function of the KcsA K+Channelâ€. Biochemistry, 2002, 41, 10771-10777.	1.2	317
1408	Receptors. , 2002, , 33-69.		0
1409	Molecular Dynamics Simulations of Biological Reactions. Accounts of Chemical Research, 2002, 35, 385-395.	7.6	186
1410	Structural characteristics of ionotropic glutamate receptors as identified by channel blockade. Neuroscience and Behavioral Physiology, 2002, 32, 173-182.	0.2	2
1411	Permeation models and structure-function relationships in ion channels. Journal of Biological Physics, 2002, 28, 289-308.	0.7	4
1412	Towards an Understanding of Complex Biological Membranes from Atomistic Molecular Dynamics Simulations. Bioscience Reports, 2002, 22, 151-173.	1.1	83
1413	Molecular mechanisms of potassium and sodium uptake in plants. Plant and Soil, 2002, 247, 43-54.	1.8	151
1414	Molecular architecture of a retinal cGMP-gated channel: the arrangement of the cytoplasmic domains. EMBO Journal, 2002, 21, 2087-2094.	3.5	39

78

ARTICLE IF CITATIONS Mutations in the linker domain of NBD2 of SUR inhibit transduction but not nucleotide binding. EMBO 3.5 29 1415 Journal, 2002, 21, 4250-4258. An inositol 1,4,5-trisphosphate receptor-dependent cation entry pathway in DT40 B lymphocytes. EMBO 1416 3.5 59 Journal, 2002, 21, 4531-4538. The Other Half of Hebb. Molecular Neurobiology, 2002, 25, 051-066. 1.9 1417 28 Effects of Membrane Lipids on Ion Channel Structure and Function. Cell Biochemistry and Biophysics, 1418 0.9 2003, 38, 161-190. Voltage-Gated Sodium Channel Toxins: Poisons, Probes, and Future Promise. Cell Biochemistry and 1419 0.9 59 Biophysics, 2003, 38, 215-238. Functionally-Distinct Proton-Binding in HERG Suggests the Presence of Two Binding Sites. Cell Biochemistry and Biophysics, 2003, 39, 183-194. Specific Mutations Within the α4-α5 Loop of the Bacillus thuringiensis Cry4B Toxin Reveal A Crucial Role 1421 1.3 25 for Asn-166 and Tyr-170. Molecular Biotechnology, 2003, 24, 11-20. Ion Solvation Thermodynamics from Simulation with a Polarizable Force Field. Journal of the 6.6 474 American Chemical Society, 2003, 125, 15671-15682. Toward an understanding of the molecular mechanisms of ventricular fibrillation. Journal of 1423 0.6 12 Interventional Cardiac Electrophysiology, 2003, 9, 119-129. 1424 Physics of Ion Channels. Journal of Biological Physics, 2003, 29, 429-446. Computational Issues in Modeling Ion Transport in Biological Channels: Self-Consistent 1425 1.3 9 Particle-Based Simulations. Journal of Computational Electronics, 2003, 2, 239-243. Ion Channels as Devices. Journal of Computational Electronics, 2003, 2, 245-249. 1426 1.3 49 Calcium Channels: Unanswered Questions. Journal of Bioenergetics and Biomembranes, 2003, 35, 1427 1.0 28 461-475. What are the roles of the many different types of potassium channel expressed in cerebellar granule 1428 1.4 cells?. Cerebellum, 2003, 2, 11-25. Gain-of-function mutations indicate that Escherichia coli Kch forms a functional K+ conduit in vivo. 1429 3.547 EMBO Journal, 2003, 22, 4049-4058. Studies of the structure of glutamate receptor ion channels and the mechanisms of their blockade by 1430 organic cations. Neuroscience and Behavioral Physiology, 2003, 33, 237-246. The potassium channel KcsA and its interaction with the lipid bilayer. Cellular and Molecular Life 1431 2.4 42 Sciences, 2003, 60, 1581-1590. Gating Models of the Anomalous Mole-Fraction Effect of Single-Channel Current in Chara. Journal of 1432 Membrane Biology, 2003, 192, 45-63.

	Ci	tation Report	
#	Article	IF	CITATIONS
1433	A Threonine Residue (Thr71) at the Intracellular End of the M1 Helix Plays a Critical Role in the Gating of Kir6.2 Channels by Intracellular ATP and Protons. Journal of Membrane Biology, 2003, 192, 111-122	2. 1.0	9
1434	Microscopic assessment of membrane protein structure and function. Histochemistry and Cell Biology, 2003, 120, 93-102.	0.8	13
1435	Mechanisms of the inhibition of Shaker potassium channels by protons. Pflugers Archiv European Journal of Physiology, 2003, 447, 44-54.	1.3	34
1436	Voltage-gated sodium channels as primary targets of diverse lipid-soluble neurotoxins. Cellular Signalling, 2003, 15, 151-159.	1.7	269
1437	Sequence motifs, polar interactions and conformational changes in helical membrane proteins. Current Opinion in Structural Biology, 2003, 13, 412-417.	2.6	216
1438	Rotary protein motors. Trends in Cell Biology, 2003, 13, 114-121.	3.6	149
1439	Membrane proteins: the â€~Wild West' of structural biology. Trends in Biochemical Sciences, 200 137-144.	3, 28, _{3.7}	129
1440	Crystal Structure of M. tuberculosis ABC Phosphate Transport Receptor. Structure, 2003, 11, 765-774	ł. 1.6	67
1441	Biological processing of nanostructured silica in diatoms. Progress in Organic Coatings, 2003, 47, 256-266.	1.9	84
1442	Structural Basis of the KcsA K+ Channel and Agitoxin2 Pore-Blocking Toxin Interaction by Using the Transferred Cross-Saturation Method. Structure, 2003, 11, 1381-1392.	1.6	45
1443	A tale of two tails: cytosolic termini and K+ channel function. Progress in Biophysics and Molecular Biology, 2003, 83, 153-170.	1.4	5
1444	The pore of TRP channels: trivial or neglected?. Cell Calcium, 2003, 33, 299-302.	1.1	41
1445	CFTR: What's it like inside the pore?. The Journal of Experimental Zoology, 2003, 300A, 69-75.	1.4	20
1446	Characterization of two new dominant ClC-1 channel mutations associated with myotonia. Muscle and Nerve, 2003, 28, 722-732.	1.0	20
1450	Potassium Selective Calix[4]semitubes. Chemistry - A European Journal, 2003, 9, 2439-2446.	1.7	36
1451	A "Holey―Supramolecular Approach to the Detection of Enzyme Activity. ChemBioChem, 2003, 4 1299-1302.	4, 1.3	3
1452	Potassium Channels: Symmetric, Selective, and Sensitive. Angewandte Chemie - International Edition, 2003, 42, 5671-5675.	7.2	10
1453	Highly Sensitive Recognition of Substrates of Adrenergic Receptors at the Air/Water Interface. Angewandte Chemie - International Edition, 2003, 42, 5509-5513.	7.2	18

#	Article	IF	CITATIONS
1454	Biosynthesis and biophysical analysis of domains of a yeast G protein-coupled receptor. Biopolymers, 2003, 71, 516-531.	1.2	21
1455	Expression, purification and spectroscopic studies of full-length Kir3.1 channel C-terminus. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2003, 1652, 83-90.	1.1	3
1456	Hydrophilic to amphiphilic design in redox protein maquettes. Current Opinion in Chemical Biology, 2003, 7, 741-748.	2.8	48
1457	Structure-Based Discovery of Potassium Channel Blockers from Natural Products. Chemistry and Biology, 2003, 10, 1103-1113.	6.2	50
1458	Structural model of the voltage-gated potassium channel Kv1.1 and molecular docking of Tc1 toxin from Tityus cambridgei to KcsA and Kv1.1. Chemical Physics Letters, 2003, 381, 592-597.	1.2	7
1459	Computational modelling of the open-state Kv1.5 ion channel block by bupivacaine. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2003, 1652, 35-51.	1.1	29
1460	Synthesis of a transmembrane ionophore based on a C2-symmetric polyhydroxysteroid derivative. Tetrahedron, 2003, 59, 1711-1717.	1.0	21
1461	Preparation of synthetic nanopores with transport properties analogous to biological channels. Surface Science, 2003, 532-535, 1061-1066.	0.8	187
1462	Ion channel gating and proton transport. Computational and Theoretical Chemistry, 2003, 630, 297-307.	1.5	21
1463	Molecular origin of the cation selectivity in OmpF porin: single channel conductances vs. free energy calculation. Biophysical Chemistry, 2003, 104, 591-603.	1.5	88
1464	Insertion of X-ray structures of proteins in membranes. Journal of Molecular Graphics and Modelling, 2003, 22, 11-21.	1.3	25
1465	Model studies of the function of blockers on the small conductance potassium ion channel. Chemical Biology and Drug Design, 2003, 62, 125-133.	1.2	2
1466	Molecular modeling of ion channels: structural predictions. Current Opinion in Chemical Biology, 2003, 7, 150-156.	2.8	39
1467	Synthesis and characterization of Pi4, a scorpion toxin from Pandinus imperator that acts on K+ channels. FEBS Journal, 2003, 270, 3583-3592.	0.2	41
1468	What we don't know about the structure of ryanodine receptor calcium release channels. Clinical and Experimental Pharmacology and Physiology, 2003, 30, 713-723.	0.9	41
1469	Tracing pathways of transport protein evolution. Molecular Microbiology, 2003, 48, 1145-1156.	1.2	137
1470	Antiarrhythmic Drugs:. Past, Present, and Future. Journal of Cardiovascular Electrophysiology, 2003, 14, 1389-1396.	0.8	21
1471	Interaction of agitoxin2, charybdotoxin, and iberiotoxin with potassium channels: Selectivity between voltage-gated and Maxi-K channels. Proteins: Structure, Function and Bioinformatics, 2003, 52, 146-154.	1.5	67

#	Article	IF	CITATIONS
1472	Discrimination of native loop conformations in membrane proteins: Decoy library design and evaluation of effective energy scoring functions. Proteins: Structure, Function and Bioinformatics, 2003, 52, 492-509.	1.5	25
1473	Exploring the origin of the ion selectivity of the KcsA potassium channel. Proteins: Structure, Function and Bioinformatics, 2003, 52, 412-426.	1.5	85
1474	Predicting protein quaternary structure by pseudo amino acid composition. Proteins: Structure, Function and Bioinformatics, 2003, 53, 282-289.	1.5	138
1475	Evolutionary trace analysis of scorpion toxins specific for K-channels. Proteins: Structure, Function and Bioinformatics, 2003, 54, 361-370.	1.5	35
1476	The peptaibol antiamoebin as a model ion channel: similarities to bacterial potassium channels. Journal of Peptide Science, 2003, 9, 769-775.	0.8	17
1477	Antiarrhythmic Drugs:. PACE - Pacing and Clinical Electrophysiology, 2003, 26, 2340-2348.	0.5	5
1478	Merging functional studies with structures of inward-rectifier K+ channels. Nature Reviews Neuroscience, 2003, 4, 957-967.	4.9	227
1479	A charged view of voltage-gated ion channels. Nature Structural and Molecular Biology, 2003, 10, 422-424.	3.6	21
1480	Potassium channel gating observed with site-directed mass tagging. Nature Structural and Molecular Biology, 2003, 10, 280-284.	3.6	53
1481	Inhibition of hEAG1 and hERG1 potassium channels by clofilium and its tertiary analogue LY97241. British Journal of Pharmacology, 2003, 138, 161-171.	2.7	37
1482	Pharmacological characterization of the homomeric and heteromeric UNC-49 GABA receptors in C. elegans. British Journal of Pharmacology, 2003, 138, 883-893.	2.7	50
1483	Blockade of HERG potassium currents by fluvoxamine: incomplete attenuation by S6 mutations at F656 or Y652. British Journal of Pharmacology, 2003, 139, 887-898.	2.7	157
1484	A single ring of charged amino acids at one end of the pore can control ion selectivity in the 5-HT3 receptor. British Journal of Pharmacology, 2003, 140, 359-365.	2.7	54
1485	X-ray structure of a voltage-dependent K+ channel. Nature, 2003, 423, 33-41.	13.7	1,781
1486	The principle of gating charge movement in a voltage-dependent K+ channel. Nature, 2003, 423, 42-48.	13.7	784
1487	Structural basis for modulation and agonist specificity of HCN pacemaker channels. Nature, 2003, 425, 200-205.	13.7	540
1488	Novel truncated isoform of SK3 potassium channel is a potent dominant-negative regulator of SK currents: implications in schizophrenia. Molecular Psychiatry, 2003, 8, 524-535.	4.1	66
1489	Kv1.4 channel block by quinidine: evidence for a drugâ€induced allosteric effect. Journal of Physiology, 2003, 546, 387-401.	1.3	39

ARTICLE IF CITATIONS Câ€Type Inactivation Involves a Significant Decrease in the Intracellular Aqueous Pore Volume of Kv1.4 K 1490 1.3 36 + Channels Expressed in Xenopus Oocytes. Journal of Physiology, 2003, 549, 683-695. Coupled Movement of Permeant and Blocking Ions in the CFTR Chloride Channel Pore. Journal of 1491 1.3 Physiology, 2003, 549, 375-385. Molecular Determinants and Role of An Anion Binding Site in the External Mouth of the CFTR 1492 1.3 50 Chloride Channel Pore. Journal of Physiology, 2003, 549, 387-397. Functional identification of ion binding sites at the internal end of the pore in Shaker K + channels. 1493 Journal of Physiology, 2003, 549, 107-120. Molecular Basis of the Effect of Potassium on Heterologously Expressed Pacemaker (HCN) Channels. 1494 1.343 Journal of Physiology, 2003, 547, 349-356. Inward Rectification by Polyamines in Mouse Kir2.1 Channels: Synergy between Blocking Components. 1.3 44 Journal of Physiology, 2003, 550, 67-82. The fightback starts here. Nature, 2003, 426, 754-754. 1496 13.7 1 Trawling through the wreckage. Nature, 2003, 426, 754-755. 13.7 1497 1498 Channel voyager makes waves. Nature, 2003, 426, 755-755. 13.7 2 Rules of conduct for the cystic fibrosis anion channel. Nature Medicine, 2003, 9, 827-828. 15.2 Crystallizing our understanding of partial agonists. Nature Neuroscience, 2003, 6, 788-789. 1501 7.11 An evolutionarily conserved dileucine motif in Shal K+ channels mediates dendritic targeting. Nature 7.1 Neuroscience, 2003, 6, 243-250. Localization of PIP2 activation gate in inward rectifier K+ channels. Nature Neuroscience, 2003, 6, 1503 7.1 78 811-818. Separation methods in the analysis of protein membrane complexes. Journal of Chromatography B: 1504 1.2 Analytical Technologies in the Biomedical and Life Sciences, 2003, 797, 191-216. Mechanisms of Anesthesia: Towards Integrating Network, Cellular, and Molecular Level Modeling. 1505 49 2.8 Neuropsychopharmacology, 2003, 28, S40-S47. Structure of Gramicidin A in a Lipid Bilayer Environment Determined Using Molecular Dynamics 123 Simulations and Solid-State NMR Data. Journal of the American Chemical Society, 2003, 125, 9868-9877. High Throughput Ion-Channel Pharmacology: Planar-Array-Based Voltage Clamp. Assay and Drug 1507 0.6 111 Development Technologies, 2003, 1, 127-135. Electrostatic Tuning of Ion Conductance in Potassium Channels. Biochemistry, 2003, 42, 9263-9268. 1.2

# 1509	ARTICLE K+CHANNELSTRUCTURE-ACTIVITYRELATIONSHIPS ANDMECHANISMS OFDRUG-INDUCEDQT PROLONGATION. Annual Review of Pharmacology and Toxicology, 2003, 43, 441-461.	IF 4.2	CITATIONS 81
1510	Attenuated Total Reflection Fourier Transform Infrared Spectroscopy: A Method of Choice for Studying Membrane Proteins and Lipidsâ€. Biochemistry, 2003, 42, 11898-11907.	1.2	118
1511	Genistein Can Modulate Channel Function by a Phosphorylation-Independent Mechanism:  Importance of Hydrophobic Mismatch and Bilayer Mechanics. Biochemistry, 2003, 42, 13646-13658.	1.2	138
1512	Three-dimensional crystallization of theEscherichia coliglycerol-3-phosphate transporter: A member of the major facilitator superfamily. Protein Science, 2003, 12, 2748-2756.	3.1	98
1513	The Sodium/Iodide Symporter (NIS): Characterization, Regulation, and Medical Significance. Endocrine Reviews, 2003, 24, 48-77.	8.9	719
1514	Selective Binding of Monovalent Cations to the Stacking C-Quartet Structure Formed by Guanosine 5â€~Monophosphate: A Solid-State NMR Study. Journal of the American Chemical Society, 2003, 125, 13895-13905.	6.6	137
1515	Trimeric Subunit Stoichiometry of the Glutamate Transporters fromBacillus caldotenaxandBacillus stearothermophilusâ€. Biochemistry, 2003, 42, 12981-12988.	1.2	93
1516	Functional Dynamics of Ion Channels:Â Modulation of Proton Movement by Conformational Switches. Journal of the American Chemical Society, 2003, 125, 13890-13894.	6.6	9
1517	Challenging accepted ion channel biology: p64 and the CLIC family of putative intracellular anion channel proteins (Review). Molecular Membrane Biology, 2003, 20, 1-11.	2.0	127
1518	Interfacial Anchor Properties of Tryptophan Residues in Transmembrane Peptides Can Dominate over Hydrophobic Matching Effects in Peptideâ^'Lipid Interactionsâ€. Biochemistry, 2003, 42, 5341-5348.	1.2	251
1519	Extracellular conserved cysteine forms an intersubunit disulphide bridge in the KCNK5 (TASK-2) K + channel without having an essential effect upon activity. Molecular Membrane Biology, 2003, 20, 185-191.	2.0	21
1520	Bacterial Ion Channelsâ€. Biochemistry, 2003, 42, 10045-10053.	1.2	44
1521	Dipolar Waves Map the Structure and Topology of Helices in Membrane Proteins. Journal of the American Chemical Society, 2003, 125, 8928-8935.	6.6	99
1522	Intrinsic Tyrosine Fluorescence as a Tool To Study the Interaction of the Shaker B "Ball―Peptide with Anionic Membranesâ€. Biochemistry, 2003, 42, 7124-7132.	1.2	47
1523	Protein Surface Recognition by Rational Design:Â Nanomolar Ligands for Potassium Channels. Journal of the American Chemical Society, 2003, 125, 12668-12669.	6.6	69
1524	A Coarse-Grained Model of Water Confined in a Hydrophobic Tube. Journal of Physical Chemistry B, 2003, 107, 1189-1193.	1.2	124
1525	A Multiply Charged Tetracaine Derivative Blocks Cyclic Nucleotide-Gated Channels at Subnanomolar Concentrationsâ€. Biochemistry, 2003, 42, 265-270.	1.2	12
1526	Effect of Four-α-Helix Bundle Cavity Size on Volatile Anesthetic Binding Energeticsâ€. Biochemistry, 2003, 42, 11203-11213.	1.2	14

#	Article	IF	CITATIONS
1527	Probing the Channel-BoundShakerB Inactivating Peptide by Stereoisomeric Substitution at a Strategic Tyrosine Residueâ€. Biochemistry, 2003, 42, 8879-8884.	1.2	3
1528	Structural Characterisation of Neuronal Voltage-sensitive K+ Channels Heterologously Expressed in Pichia pastoris. Journal of Molecular Biology, 2003, 333, 103-116.	2.0	43
1529	The Occupancy of Ions in the K+ Selectivity Filter: Charge Balance and Coupling of Ion Binding to a Protein Conformational Change Underlie High Conduction Rates. Journal of Molecular Biology, 2003, 333, 965-975.	2.0	377
1530	Fatty acid-sensitive two-pore domain K+ channels. Trends in Pharmacological Sciences, 2003, 24, 648-654.	4.0	113
1531	GÂÂ and KACh: Old Story, New Insights. Science Signaling, 2003, 2003, pe32-pe32.	1.6	12
1532	Overexpression and purification of the vanilloid receptor in yeast (Saccharomyces cerevisiae). Biochemical and Biophysical Research Communications, 2003, 310, 196-201.	1.0	13
1533	A microscopic view of ion conduction through the K+ channel. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 8644-8648.	3.3	222
1534	The Physics of Protein Crystallization. Solid State Physics, 2003, 57, 1-147.	1.3	44
1535	Structural determinants and biophysical properties of HERG and KCNQ1 channel gating. Journal of Molecular and Cellular Cardiology, 2003, 35, 27-35.	0.9	50
1536	Voltage-gated K+ Channel from Mammalian Brain: 3D Structure at 18à of the Complete (α)4(β)4 Complex. Journal of Molecular Biology, 2003, 326, 1005-1012.	2.0	39
1537	Molecular dynamics simulations of a K+ channel blocker: Tc1 toxin from Tityus cambridgei. FEBS Letters, 2003, 535, 29-33.	1.3	19
1538	Interaction of the K+ channel KcsA with membrane phospholipids as studied by ESI mass spectrometry. FEBS Letters, 2003, 541, 28-32.	1.3	57
1539	Preferential closed channel blockade of HERG potassium currents by chemically synthesised BeKm-1 scorpion toxin. FEBS Letters, 2003, 547, 20-26.	1.3	66
1540	MjK1, a K+channel fromM. jannaschii, mediates K+uptake and K+sensitivity inE. coli. FEBS Letters, 2003, 547, 165-169.	1.3	23
1541	The viral potassium channel Kcv: structural and functional features. FEBS Letters, 2003, 552, 12-16.	1.3	47
1542	Structure-function correlates of Vpu, a membrane protein of HIV-1. FEBS Letters, 2003, 552, 47-53.	1.3	35
1543	A prokaryotic glutamate receptor: homology modelling and molecular dynamics simulations of GluRO. FEBS Letters, 2003, 553, 321-327.	1.3	23
1544	Potassium channels. FEBS Letters, 2003, 555, 62-65.	1.3	398

		CITATION RE	PORT	
#	Article		IF	CITATIONS
1545	Membrane protein folding: beyond the two stage model. FEBS Letters, 2003, 555, 122	-125.	1.3	273
1546	Structure-activity relationship for extracellular block of K+ channels by tetraalkylammo FEBS Letters, 2003, 554, 159-164.	nium ions.	1.3	23
1547	The structures of BtuCD and MscS and their implications for transporter and channel f Letters, 2003, 555, 111-115.	unction. FEBS	1.3	22
1548	Ion channel gating: insights via molecular simulations. FEBS Letters, 2003, 555, 85-90.		1.3	119
1549	Symmetry, Selectivity, and the 2003 Nobel Prize. Cell, 2003, 115, 641-646.		13.5	8
1550	Practical aspects of overexpressing bacterial secondary membrane transporters for strustudies. Biochimica Et Biophysica Acta - Biomembranes, 2003, 1610, 23-36.	uctural	1.4	71
1551	Calnexin co-expression and the use of weaker promoters increase the expression of co assembled Shaker potassium channel in insect cells. Biochimica Et Biophysica Acta - Bio 2003, 1610, 124-132.	rrectly omembranes,	1.4	39
1552	Lipid–protein interactions in biological membranes: a structural perspective. Biochim Acta - Biomembranes, 2003, 1612, 1-40.	ica Et Biophysica	1.4	753
1553	Pharmacology of neuronal background potassium channels. Neuropharmacology, 2003	3, 44, 1-7.	2.0	237
1554	Differential interactions of lamotrigine and related drugs with transmembrane segmen voltage-gated sodium channels. Neuropharmacology, 2003, 44, 413-422.	t IVS6 of	2.0	92
1555	Subtle Shades of Permeability. Biophysical Journal, 2003, 84, 2793-2794.		0.2	0
1556	Modeling Permeation Energetics in the KcsA Potassium Channel. Biophysical Journal, 2 2814-2830.	003, 84,	0.2	43
1557	Role of the Dielectric Constants of Membrane Proteins and Channel Water in Ion Perm Biophysical Journal, 2003, 84, 2871-2882.	eation.	0.2	37
1558	Sequence-Function Analysis of the K+-Selective Family of Ion Channels Using a Compre Alignment and the KcsA Channel Structure. Biophysical Journal, 2003, 84, 2929-2942.	hensive	0.2	112
1559	BeKm-1 Is a HERG-Specific Toxin that Shares the Structure with ChTx but the Mechanis ErgTx1. Biophysical Journal, 2003, 84, 3022-3036.	m of Action with	0.2	71
1560	The Pore Helix Is Involved in Stabilizing the Open State of Inwardly Rectifying K+ Chanr Journal, 2003, 85, 300-312.	nels. Biophysical	0.2	40
1561	Crystal Structure of the Bromide-Bound D85S Mutant of Bacteriorhodopsin: Principles Pumping. Biophysical Journal, 2003, 85, 451-458.	of lon	0.2	29
1562	Helix Rotation Model of the Flagellar Rotary Motor. Biophysical Journal, 2003, 85, 843-	852.	0.2	24

#	Article	IF	CITATIONS
1563	Potassium Channel, Ions, and Water: Simulation Studies Based on the High Resolution X-Ray Structure of KcsA. Biophysical Journal, 2003, 85, 2787-2800.	0.2	107
1564	An Implicit Membrane Generalized Born Theory for the Study of Structure, Stability, and Interactions of Membrane Proteins. Biophysical Journal, 2003, 85, 2900-2918.	0.2	384
1565	An Isothermal Titration Calorimetry Study on the Binding of Four Volatile General Anesthetics to the Hydrophobic Core of a Four-α-Helix Bundle Protein. Biophysical Journal, 2003, 85, 3279-3285.	0.2	28
1566	Effect of External pH on Activation of the Kv1.5 Potassium Channel. Biophysical Journal, 2003, 84, 195-204.	0.2	28
1567	Effect of S6 Tail Mutations on Charge Movement in Shaker Potassium Channels. Biophysical Journal, 2003, 84, 295-305.	0.2	43
1568	The Link between Ion Permeation and Inactivation Gating of Kv4 Potassium Channels. Biophysical Journal, 2003, 84, 928-941.	0.2	23
1569	Understanding pH-Dependent Selectivity of Alamethicin K18 Channels by Computer Simulation. Biophysical Journal, 2003, 84, 1464-1469.	0.2	19
1570	Control of Ion Conduction in L-type Ca2+ Channels by the Concerted Action of S5–6 Regions. Biophysical Journal, 2003, 84, 1709-1719.	0.2	13
1571	Gramicidin A Channel as a Test Ground for Molecular Dynamics Force Fields. Biophysical Journal, 2003, 84, 2159-2168.	0.2	105
1572	Filter Flexibility in a Mammalian K Channel: Models and Simulations of Kir6.2 Mutants. Biophysical Journal, 2003, 84, 2345-2356.	0.2	60
1573	Dielectric Self-Energy in Poisson-Boltzmann and Poisson-Nernst-Planck Models of Ion Channels. Biophysical Journal, 2003, 84, 3594-3606.	0.2	98
1574	The Role of the Dielectric Barrier in Narrow Biological Channels: A Novel Composite Approach to Modeling Single-Channel Currents. Biophysical Journal, 2003, 84, 3646-3661.	0.2	111
1575	The neurobiology and control of anxious states. Progress in Neurobiology, 2003, 70, 83-244.	2.8	815
1576	Ca2+ channel moving tail: link between Ca2+-induced inactivation and Ca2+ signal transduction. Trends in Pharmacological Sciences, 2003, 24, 167-171.	4.0	73
1577	Novel interactions between K+ channels and scorpion toxins. Trends in Pharmacological Sciences, 2003, 24, 222-227.	4.0	165
1578	A common architecture for K+ channels and ionotropic glutamate receptors?. Trends in Neurosciences, 2003, 26, 27-32.	4.2	117
1579	The Roles and Regulation of Potassium in Bacteria. Progress in Molecular Biology and Translational Science, 2003, 75, 293-320.	1.9	431
1580	Free Energy Calculations and Ligand Binding. Advances in Protein Chemistry, 2003, 66, 123-158.	4.4	177

#	Article	IF	CITATIONS
1581	Structure and function of potassium channels in plants: some inferences about the molecular origin of inward rectification in KAT1 channels (Review). Molecular Membrane Biology, 2003, 20, 19-25.	2.0	20
1582	Membrane Protein Simulations: Ion Channels And Bacterial Outer Membrane Proteins. Advances in Protein Chemistry, 2003, 66, 159-193.	4.4	49
1583	Permeation and Selectivity in Calcium Channels. Annual Review of Physiology, 2003, 65, 133-159.	5.6	239
1584	Unraveling Monogenic Channelopathies and Their Implications for Complex Polygenic Disease. American Journal of Human Genetics, 2003, 72, 785-803.	2.6	64
1585	Gating the Selectivity Filter in ClC Chloride Channels. Science, 2003, 300, 108-112.	6.0	747
1586	A tyrosine residue in TM6 of the Vanilloid Receptor TRPV1 involved in desensitization and calcium permeability of capsaicin-activated currents. Molecular and Cellular Neurosciences, 2003, 23, 314-324.	1.0	84
1587	Increasing the diffraction limit and internal order of a membrane protein crystal by dehydration. Journal of Structural Biology, 2003, 141, 97-102.	1.3	26
1588	Membrane protein structural biology: the high throughput challenge. Journal of Structural Biology, 2003, 142, 144-153.	1.3	154
1589	A Fluorometric Approach to Local Electric Field Measurements in a Voltage-Gated Ion Channel. Neuron, 2003, 37, 85-98.	3.8	131
1590	Gating Dependence of Inner Pore Access in Inward Rectifier K+ Channels. Neuron, 2003, 37, 953-962.	3.8	55
1591	Defining the Conductance of the Closed State in a Voltage-Gated K+ Channel. Neuron, 2003, 38, 61-67.	3.8	32
1592	Atomic Proximity between S4 Segment and Pore Domain in Shaker Potassium Channels. Neuron, 2003, 39, 467-481.	3.8	179
1593	Answers and Questions from the KvAP Structures. Neuron, 2003, 39, 395-400.	3.8	78
1594	The Birth of a Channel. Neuron, 2003, 40, 265-276.	3.8	94
1595	Charybdotoxin Binding in the IKs Pore Demonstrates Two MinK Subunits in Each Channel Complex. Neuron, 2003, 40, 15-23.	3.8	133
1596	AMPA Receptor Trafficking at Excitatory Synapses. Neuron, 2003, 40, 361-379.	3.8	1,014
1597	The Orientation and Molecular Movement of a K+ Channel Voltage-Sensing Domain. Neuron, 2003, 40, 515-525.	3.8	119
1598	AMPA Receptor Tetramerization Is Mediated by Q/R Editing. Neuron, 2003, 40, 763-774.	3.8	286

#	Article	IF	CITATIONS
1599	The Gárdos channel: a review of the Ca2+-activated K+ channel in human erythrocytes. International Journal of Biochemistry and Cell Biology, 2003, 35, 1182-1197.	1.2	103
1600	X-RAY STRUCTURE OF AN INTACT ABC TRANSPORTER, MSBA**Parts of this chapter are reprinted with permission from the American Association for the Advancement of Science. Please see Acknowledgments section for details , 2003, , 135-146.		0
1601	Liposomes in the Study of Pore-Forming Toxins. Methods in Enzymology, 2003, 372, 99-124.	0.4	26
1602	THE CYSTIC FIBROSIS TRANSMEMBRANE CONDUCTANCE REGULATOR (ABCC7). , 2003, , 589-618.		24
1603	Molecular simulation of LiCl aqueous solutions. Molecular Physics, 2003, 101, 1443-1453.	0.8	32
1604	Unique Structureâ^'Activity Relationship for 4-Isoxazolyl-1,4-dihydropyridines. Journal of Medicinal Chemistry, 2003, 46, 87-96.	2.9	62
1605	Cyclic Nucleotide-Gated Ion Channels. Annual Review of Cell and Developmental Biology, 2003, 19, 23-44.	4.0	216
1606	Identified Ion Channels in the Squid Nervous System. NeuroSignals, 2003, 12, 126-141.	0.5	14
1607	Cationâ^'Ï€ Binding of an Alkali Metal Ion by Pendant α,α-Dimethylbenzyl Groups within a Dinuclear Iron(III) Structural Unit. Journal of the American Chemical Society, 2003, 125, 11142-11143.	6.6	32
1608	HUMANNONSYNDROMICSENSORINEURALDEAFNESS. Annual Review of Genomics and Human Genetics, 2003, 4, 341-402.	2.5	200
1609	Overview of the voltage-gated sodium channel family. Genome Biology, 2003, 4, 207.	13.9	525
1611	Understanding the Structureâ^'Activity Relationship of the Human Ether-a-go-go-Related Gene Cardiac K+Channel. A Model for Bad Behavior. Journal of Medicinal Chemistry, 2003, 46, 2017-2022.	2.9	172
1613	Antiarrhythmic drugs: new agents and evolving concepts. Expert Opinion on Investigational Drugs, 2003, 12, 435-453.	1.9	6
1614	The aromatic sidechains of amino acids as neutral donor groups for alkali metal cations. Chemical Communications, 2003, , 2847.	2.2	84
1615	Synthesis and functional studies of THF–gramicidin hybrid ion channels. Organic and Biomolecular Chemistry, 2003, 1, 2983-2997.	1.5	33
1616	Protein–lipid interactions studied with designed transmembrane peptides: role of hydrophobic matching and interfacial anchoring (Review). Molecular Membrane Biology, 2003, 20, 271-284.	2.0	277
1617	Structure and Mechanism of the Glycerol-3-Phosphate Transporter from Escherichia coli. Science, 2003, 301, 616-620.	6.0	971
1618	Molecular Physiology of Low-Voltage-Activated T-type Calcium Channels. Physiological Reviews, 2003, 83, 117-161.	13.1	1,481

		CITATION REPO	ORT	
#	Article	I	IF	CITATIONS
1619	Nervous System Targets of RNA Editing Identified by Comparative Genomics. Science, 2003, 301, 8	32-836.	6.0	368
1620	Origin of scaling behavior of protein packing density: A sequential Monte Carlo study of compact long chain polymers. Journal of Chemical Physics, 2003, 118, 6102-6109.		1.2	56
1621	Extent of the selectivity filter conferred by the sixth transmembrane region in the CFTR chloride channel pore. Molecular Membrane Biology, 2003, 20, 45-52.	:	2.0	18
1622	Binding of the General Anesthetics Chloroform and 2,2,2-Trichloroethanol to the Hydrophobic Core of a Four–α-Helix Bundle Protein¶. Photochemistry and Photobiology, 2003, 77, 89.		1.3	13
1623	Molecular Movement of the Voltage Sensor in a K Channel. Journal of General Physiology, 2003, 12: 741-748.	2,	0.9	67
1624	Clinical and functional effects of a deletion in a COOH-terminal lumenal loop of the skeletal muscle ryanodine receptor. Human Molecular Genetics, 2003, 12, 379-388.		1.4	35
1625	Movements near the Gate of a Hyperpolarization-activated Cation Channel. Journal of General Physiology, 2003, 122, 501-510.	ſ	0.9	47
1626	Gating Mechanism of KATP Channels. Journal of General Physiology, 2003, 122, 471-480.		0.9	81
1627	Stabilization of the Activity of ATP-sensitive Potassium Channels by Ion Pairs Formed between Adjac Kir6.2 Subunits. Journal of General Physiology, 2003, 122, 225-237.	:ent ,	0.9	51
1628	Reconstitution in planar lipid bilayers of ion channels synthesized in ovo and in vitro. Membrane Science and Technology, 2003, , 391-412.		0.5	0
1629	Generation and Evaluation of a Large Mutational Library from the Escherichia coli Mechanosensitive Channel of Large Conductance, MscL. Journal of Biological Chemistry, 2003, 278, 21076-21082.	:	1.6	65
1630	Molecular Site of Action of the Antiarrhythmic Drug Propafenone at the Voltage-Operated Potassiun Channel Kv2.1. Molecular Pharmacology, 2003, 63, 547-556.	n	1.0	13
1631	Pseudechetoxin Binds to the Pore Turret of Cyclic Nucleotide–gated Ion Channels. Journal of Gene Physiology, 2003, 122, 749-760.	eral	0.9	42
1632	Essential Role of a GXXXG Motif for Membrane Channel Formation by Helicobacter pylori Vacuolatin Toxin. Journal of Biological Chemistry, 2003, 278, 12101-12108.	ng	1.6	144
1633	Crystal Structure of the Potassium Channel KirBac1.1 in the Closed State. Science, 2003, 300, 1922	2-1926.	6.0	763
1634	Dependence of μ-Conotoxin Block of Sodium Channels on Ionic Strength but Not on the Permeati [Na+]. Journal of Biological Chemistry, 2003, 278, 30912-30919.	ng	1.6	13
1635	Functional Analysis of Caenorhabditis elegans Glutamate Receptor Subunits by Domain Transplantation. Journal of Biological Chemistry, 2003, 278, 44691-44701.	:	1.6	15
1636	KtrAB and KtrCD: Two K + Uptake Systems in Bacillus subtilis and Their Role in Adaptation to Hypertonicity. Journal of Bacteriology, 2003, 185, 1289-1298.		1.0	167

#	Article	IF	CITATIONS
1637	Meeting of the minds: Metalloneurochemistry. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 3605-3610.	3.3	255
1638	Molecular Action of Lidocaine on the Voltage Sensors of Sodium Channels. Journal of General Physiology, 2003, 121, 163-175.	0.9	96
1639	Mechanisms Underlying Modulation of Neuronal KCNQ2/KCNQ3 Potassium Channels by Extracellular Protons. Journal of General Physiology, 2003, 122, 775-793.	0.9	62
1640	Structural Determinants of the Regulation of the Voltage-gated Potassium Channel Kv2.1 by the Modulatory α-Subunit Kv9.3. Journal of Biological Chemistry, 2003, 278, 18154-18161.	1.6	38
1641	Molecular Coupling between Voltage Sensor and Pore Opening in the Arabidopsis Inward Rectifier K+ Channel KAT1. Journal of General Physiology, 2003, 122, 459-469.	0.9	48
1642	Topogenesis of Two Transmembrane Type K+ Channels, Kir 2.1 and KcsA. Journal of Biological Chemistry, 2003, 278, 40373-40384.	1.6	18
1643	Metal ion effects on ion channel gating. Quarterly Reviews of Biophysics, 2003, 36, 373-427.	2.4	81
1644	Block of Shaker potassium channels by external calcium ions. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 347-351.	3.3	15
1645	A photochemical approach to the lipid accessibility of engineered cysteinyl residues. Proceedings of the United States of America, 2003, 100, 886-891.	3.3	3
1646	Fast gating in the Shaker K+ channel and the energy landscape of activation. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 7611-7615.	3.3	66
1647	Conformational changes in the C terminus of Shaker K+ channel bound to the rat KvÂ2-subunit. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 12607-12612.	3.3	53
1648	Conformational Changes in Kir2.1 Channels during NH4+-induced Inactivation. Journal of Biological Chemistry, 2003, 278, 908-918.	1.6	6
1649	Identification of a Surface Charged Residue in the S3-S4 Linker of the Pacemaker (HCN) Channel That Influences Activation Gating. Journal of Biological Chemistry, 2003, 278, 13647-13654.	1.6	31
1650	Mapping the Gβγ-binding Sites in GIRK1 and GIRK2 Subunits of the G Protein-activated K+ Channel. Journal of Biological Chemistry, 2003, 278, 29174-29183.	1.6	62
1651	A Cysteine Scan of the Inner Vestibule of Cyclic Nucleotide–gated Channels Reveals Architecture and Rearrangement of the Pore. Journal of General Physiology, 2003, 121, 563-583.	0.9	41
1652	Probing the Pore of ClC-0 by Substituted Cysteine Accessibility Method Using Methane Thiosulfonate Reagents. Journal of General Physiology, 2003, 122, 147-159.	0.9	61
1653	Constitutive Activation of the Shaker Kv Channel. Journal of General Physiology, 2003, 122, 541-556.	0.9	75
1654	Pharmacological Agents That Directly Modulate Insulin Secretion. Pharmacological Reviews, 2003, 55, 105-131.	7.1	217

#	Article	IF	CITATIONS
1655	International Union of Pharmacology. XLIII. Compendium of Voltage-Gated Ion Channels: Transient Receptor Potential Channels. Pharmacological Reviews, 2003, 55, 591-596.	7.1	227
1656	Influence of Pore Residues on Permeation Properties in the Kv2.1 Potassium Channel. Evidence for a Selective Functional Interaction of K+ with the Outer Vestibule. Journal of General Physiology, 2003, 121, 111-124.	0.9	32
1657	Mg2+-dependent Gating and Strong Inward Rectification of the Cation Channel TRPV6. Journal of General Physiology, 2003, 121, 245-260.	0.9	143
1658	Plants Do It Differently. A New Basis for Potassium/Sodium Selectivity in the Pore of an Ion Channel. Plant Physiology, 2003, 132, 1353-1361.	2.3	107
1659	Membrane Protein Crystallization. , 2003, , 143-160.		10
1660	Binding of the Anticonvulsant Drug Lamotrigine and the Neurotoxin Batrachotoxin to Voltage-gated Sodium Channels Induces Conformational Changes Associated with Block and Steady-state Activation. Journal of Biological Chemistry, 2003, 278, 10675-10682.	1.6	40
1662	Applied-field molecular dynamics study of a model calcium channel selectivity filter. Journal of Chemical Physics, 2003, 118, 4213-4220.	1.2	16
1663	Role of the Cytosolic Chaperones Hsp70 and Hsp90 in Maturation of the Cardiac Potassium Channel hERG. Circulation Research, 2003, 92, e87-100.	2.0	293
1664	Distinct Sites Regulating Grayanotoxin Binding and Unbinding to D4S6 of Nav1.4 Sodium Channel as Revealed by Improved Estimation of Toxin Sensitivity. Journal of Biological Chemistry, 2003, 278, 9464-9471.	1.6	66
1665	Modeling the concentration-dependent permeation modes of the KcsA potassium ion channel. Physical Review E, 2003, 68, 061908.	0.8	14
1666	Single-walled Carbon Nanotubes Are a New Class of Ion Channel Blockers. Journal of Biological Chemistry, 2003, 278, 50212-50216.	1.6	291
1667	Molecular Determinants of KCNQ1 Channel Block by a Benzodiazepine. Molecular Pharmacology, 2003, 64, 70-77.	1.0	84
1668	Liquid-vapor oscillations of water in hydrophobic nanopores. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 7063-7068.	3.3	415
1669	Side-chain Charge Effects and Conductance Determinants in the Pore of ClC-0 Chloride Channels. Journal of General Physiology, 2003, 122, 133-145.	0.9	67
1670	Interaction Mechanisms between Polyamines and IRK1 Inward Rectifier K+ Channels. Journal of General Physiology, 2003, 122, 485-500.	0.9	64
1671	Molecular Modeling of Interactions of Dihydropyridines and Phenylalkylamines with the Inner Pore of the L-Type Ca2+Channel. Molecular Pharmacology, 2003, 63, 499-511.	1.0	67
1672	Gating of Shaker-type Channels Requires the Flexibility of S6 Caused by Prolines. Journal of Biological Chemistry, 2003, 278, 50724-50731.	1.6	79
1673	SUR Domains That Associate with and Gate KATP Pores Define a Novel Gatekeeper. Journal of Biological Chemistry, 2003, 278, 41577-41580.	1.6	140

#	Article	IF	Citations
1674	Structure of the HERG K+ Channel S5P Extracellular Linker. Journal of Biological Chemistry, 2003, 278, 42136-42148.	1.6	69
1675	Regulation of the Inward Rectifying Properties of G-protein-activated Inwardly Rectifying K+ (GIRK) Channels by Gβγ Subunits. Journal of Biological Chemistry, 2003, 278, 1037-1043.	1.6	42
1676	External TEA Block of Shaker K+ Channels Is Coupled to the Movement of K+ Ions within the Selectivity Filter. Journal of General Physiology, 2003, 122, 239-246.	0.9	35
1677	Molecular Modeling and Molecular Dynamics Simulations of Membrane Transporter Proteins. , 2003, 227, 335-350.		2
1678	Effects of Irbesartan on Cloned Potassium Channels Involved in Human Cardiac Repolarization. Journal of Pharmacology and Experimental Therapeutics, 2003, 304, 862-873.	1.3	66
1679	Local Anesthetic Block of Kv Channels: Role of the S6 Helix and the S5-S6 Linker for Bupivacaine Action. Molecular Pharmacology, 2003, 63, 1417-1429.	1.0	23
1680	Methanethiosulfonate Ethylammonium Block of Amine Currents through the Ryanodine Receptor Reveals Single Pore Architecture. Journal of Biological Chemistry, 2003, 278, 45528-45538.	1.6	10
1681	Pharmacological Activation of Normal and Arrhythmia-Associated Mutant KCNQ1 Potassium Channels. Circulation Research, 2003, 93, 941-947.	2.0	87
1682	Ligand-induced Closure of Inward Rectifier Kir6.2 Channels Traps Spermine in the Pore. Journal of General Physiology, 2003, 122, 795-805.	0.9	44
1683	Molecular Basis of Ion Selectivity, Block, and Rectification of the Inward Rectifier Kir3.1/Kir3.4 K+ Channel. Journal of Biological Chemistry, 2003, 278, 49537-49548.	1.6	62
1684	From a pump to a pore: How palytoxin opens the gates. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 386-388.	3.3	58
1685	Translocation of Phospholipids Is Facilitated by a Subset of Membrane-spanning Proteins of the Bacterial Cytoplasmic Membrane. Journal of Biological Chemistry, 2003, 278, 24586-24593.	1.6	75
1686	Achromatopsia-associated Mutation in the Human Cone Photoreceptor Cyclic Nucleotide-gated Channel CNGB3 Subunit Alters the Ligand Sensitivity and Pore Properties of Heteromeric Channels. Journal of Biological Chemistry, 2003, 278, 34533-34540.	1.6	52
1687	Altered Gating and Local Anesthetic Block Mediated by Residues in the I-S6 and II-S6 Transmembrane Segments of Voltage-Dependent Na+ Channels. Molecular Pharmacology, 2003, 64, 741-752.	1.0	33
1688	Conotoxins as Sensors of Local pH and Electrostatic Potential in the Outer Vestibule of the Sodium Channel. Journal of General Physiology, 2003, 122, 63-79.	0.9	18
1689	Low pH Potentiates Both Capsaicin Binding and Channel Gating of VR1 Receptors. Journal of General Physiology, 2003, 122, 45-61.	0.9	94
1690	Asymmetric Organization of the Pore Region of the Epithelial Sodium Channel. Journal of Biological Chemistry, 2003, 278, 13867-13874.	1.6	32
1691	Participation of the S4 voltage sensor in the Mg2+-dependent activation of large conductance (BK) K+ channels. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 10488-10493.	3.3	55

#	Article	IF	CITATIONS
1692	Mutation-induced Blocker Permeability and Multiion Block of the CFTR Chloride Channel Pore. Journal of General Physiology, 2003, 122, 673-687.	0.9	41
1693	Influence of Permeant Ions on Gating in Cyclic Nucleotide–gated Channels. Journal of General Physiology, 2003, 121, 61-72.	0.9	16
1694	Drug- and mutagenesis-induced changes in the selectivity filter of a cardiac two-pore background K channel. Cardiovascular Research, 2003, 58, 46-54.	1.8	12
1695	Redesigning the monovalent cation specificity of an enzyme. Proceedings of the National Academy of Sciences of the United States of America, 2003, 100, 13785-13790.	3.3	58
1696	Effect of Phosphatidylserine on Unitary Conductance and Ba2+ Block of the BK Ca2+–activated K+ Channel. Journal of General Physiology, 2003, 121, 375-398.	0.9	47
1697	PAK Paradox: Paramecium Appears To Have More K + -Channel Genes than Humans. Eukaryotic Cell, 2003, 2, 737-745.	3.4	24
1699	Proton Permeation Through the Myocardial Gap Junction. Circulation Research, 2003, 93, 726-735.	2.0	30
1700	Molecular Determinants of Proton-Sensitive N-Methyl-d-aspartate Receptor Gating. Molecular Pharmacology, 2003, 63, 1212-1222.	1.0	94
1701	Mechanism of Rectification in Inward-rectifier K+ Channels. Journal of General Physiology, 2003, 121, 261-276.	0.9	81
1702	Voltage-Gated Proton Channels and Other Proton Transfer Pathways. Physiological Reviews, 2003, 83, 475-579.	13.1	635
1703	Molecular Localization of the Inhibitory Arachidonic Acid Binding Site to the Pore of hIK1. Journal of Biological Chemistry, 2003, 278, 16690-16697.	1.6	49
1704	Conformational Changes in the Pore of CLC-0. Journal of General Physiology, 2003, 122, 277-294.	0.9	82
1705	Key Roles of Phe1112and Ser1115in the Pore-Forming IIIS5-S6 Linker of L-Type Ca2+Channel α1CSubunit (CaV1.2) in Binding of Dihydropyridines and Action of Ca2+Channel Agonists. Molecular Pharmacology, 2003, 64, 235-248.	1.0	51
1706	Voltage-Gated K Channels. Science Signaling, 2003, 2003, re10-re10.	1.6	86
1707	Evidence for Intersubunit Interactions between S4 and S5 Transmembrane Segments of the Shaker Potassium Channel. Journal of Biological Chemistry, 2003, 278, 29079-29085.	1.6	40
1708	The Long-QT Syndrome — Bedside to Bench to Bedside. New England Journal of Medicine, 2003, 348, 1837-1838.	13.9	26
1709	Dissociation of E-4031 from the HERG channel caused by mutations of an amino acid results in greater block at high stimulation frequency. Cardiovascular Research, 2003, 57, 651-659.	1.8	18
1710	State-dependent access to the batrachotoxin receptor on the sodium channel. NeuroReport, 2003, 14, 1353-1356.	0.6	3

#	Article	IF	CITATIONS
1711	Inhaled Anesthetics and Immobility: Mechanisms, Mysteries, and Minimum Alveolar Anesthetic Concentration. Anesthesia and Analgesia, 2003, 97, 718-740.	1.1	265
1712	State-dependent access to the batrachotoxin receptor on the sodium channel. NeuroReport, 2003, 14, 1353-1356.	0.6	9
1713	Basic concepts of ion channel physiology and anaesthetic drug effects. European Journal of Anaesthesiology, 2003, 20, 343-353.	0.7	8
1714	Halothane Inhibits an Intermediate Conductance Ca2+-activated K+Channel by Acting at the Extracellular Side of the Ionic Pore. Anesthesiology, 2003, 99, 1340-1345.	1.3	12
1715	Ion Channels in Digestive Health and Disease. Journal of Pediatric Gastroenterology and Nutrition, 2003, 37, 230-241.	0.9	7
1716	Noninactivating Tandem Pore Domain Potassium Channels as Attractive Targets for General Anesthetics. Anesthesia and Analgesia, 2003, 96, 1248-1250.	1.1	6
1719	Phylogenomic Analysis and Evolution of the Potassium Channel Gene Family. Receptors and Channels, 2003, 9, 363-377.	1.1	23
1720	Insights into ion channels from peptides in planar lipid bilayers. Membrane Science and Technology, 2003, 7, 589-604.	0.5	0
1721	Simultaneous Measurement of Spectroscopic and Physiological Signals from a Planar Bilayer System. Membrane Science and Technology, 2003, 7, 1017-1029.	0.5	0
1722	The ATP synthase: Parts and properties of a rotary motor. The Enzymes, 2003, , 203-275.	0.7	4
1723	Preface. Advances in Protein Chemistry, 2003, 63, xi-xvi.	4.4	0
1724	The ligandâ€sensitive gate of a potassium channel lies close to the selectivity filter. EMBO Reports, 2003, 4, 70-75.	2.0	49
1725	Heterologous Expression Systems and Screening Technologies in Ion Channel Drug Discovery. , 2003, , 227-244.		2
1726	Two Investigators of Pores in Cell Membranes Win Nobel Chemistry Prize. Physics Today, 2003, 56, 27-30.	0.3	0
1727	Dimeric cystic fibrosis transmembrane conductance regulator exists in the plasma membrane. Biochemical Journal, 2003, 374, 793-797.	1.7	41
1728	Isolation and characterization of haemoporin, an abundant haemolymph protein from Aplysia californica. Biochemical Journal, 2003, 375, 681-688.	1.7	3
1729	Trafficking of Kv1.4 potassium channels: interdependence of a pore region determinant and a cytoplasmic C-terminal VXXSL determinant in regulating cell-surface trafficking. Biochemical Journal, 2003, 375, 761-768.	1.7	32
1730	Transmembrane segments 1, 5, 7 and 8 are required for high-affinity glucose transport by Saccharomyces cerevisiae Hxt2 transporter. Biochemical Journal, 2003, 372, 247-252.	1.7	25

#	Article	IF	CITATIONS
1731	The glycerol facilitator GlpF, its aquaporin family of channels, and their selectivity. Advances in Protein Chemistry, 2003, 63, 291-316.	4.4	22
1732	Crystallization of Membrane Proteins. , 2003, , 27-54.		0
1733	The voltage sensor and the gate in ion channels. Advances in Protein Chemistry, 2003, 63, 211-241.	4.4	39
1734	Nobel Prizes for magnetic resonance imaging and channel proteins. Medical Journal of Australia, 2003, 179, 611-613.	0.8	13
1735	<i>Caenorhabditis elegans</i> UNC-103 ERG-Like Potassium Channel Regulates Contractile Behaviors of Sex Muscles in Males before and during Mating. Journal of Neuroscience, 2003, 23, 2696-2705.	1.7	53
1736	Basic concepts of ion channel physiology and anaesthetic drug effects. European Journal of Anaesthesiology, 2003, 20, 343-353.	0.7	8
1737	Different Gating Mechanisms in Glutamate Receptor and K ⁺ Channels. Journal of Neuroscience, 2003, 23, 7559-7568.	1.7	58
1738	Water proton transfer and hydrogen bonding in ion channel gating. Frontiers in Bioscience - Landmark, 2003, 8, s1356-1370.	3.0	24
1739	<i>sup-9, sup-10</i> , and <i>unc-93</i> May Encode Components of a Two-Pore K ⁺ Channel that Coordinates Muscle Contraction in <i>Caenorhabditis elegans</i> . Journal of Neuroscience, 2003, 23, 9133-9145.	1.7	89
1740	The Role of Cardiac Pacemaker Currents in Antiarrhythmic Drug Discovery. , 2003, , 27-46.		1
1741	A negatively charged residue in the outer mouth of rat sodium channel determines the gating kinetics of the channel. American Journal of Physiology - Cell Physiology, 2003, 284, C1247-C1254.	2.1	15
1742	Regulation of N- and C-type inactivation of Kv1.4 by pH _o and K ⁺ : evidence for transmembrane communication. American Journal of Physiology - Heart and Circulatory Physiology, 2003, 284, H71-H80.	1.5	28
1747	Features of transmembrane helices useful for membrane protein prediction. Chem-Bio Informatics Journal, 2004, 4, 110-120.	0.1	8
1748	In situ imaging of mitochondrial outer-membrane pores using atomic force microscopy. BioTechniques, 2004, 37, 564-573.	0.8	17
1749	Electrophysiological Techniques. , 2004, 23, 11.0.1.		0
1750	Alkali Metal Cations in Biochemistry. , 2004, , 1-11.		0
1751	Ion Channels and Their Models. , 2004, , 742-746.		7
1752	Epitope Tagging of the Yeast K+ Carrier Trk2p Demonstrates Folding That Is Consistent with a Channel-like Structure. Journal of Biological Chemistry, 2004, 279, 3003-3013.	1.6	29

#	Article	IF	CITATIONS
1753	Ionotropic Glutamate Receptor Recognition and Activation. Advances in Protein Chemistry, 2004, 68, 313-349.	4.4	32
1754	Structural Bioinformatics and its Impact to Biomedical Science. Current Medicinal Chemistry, 2004, 11, 2105-2134.	1.2	674
1755	Electronic Effects in Biomolecular Simulations:Â Investigation of the KcsA Potassium Ion Channel. Journal of Physical Chemistry B, 2004, 108, 13866-13873.	1.2	22
1756	TRPV4 calcium entry channel: a paradigm for gating diversity. American Journal of Physiology - Cell Physiology, 2004, 286, C195-C205.	2.1	401
1757	Grand canonical Monte Carlo simulations of water in protein environments. Journal of Chemical Physics, 2004, 121, 6392-6400.	1.2	112
1758	Kinetic models of ion transport through a nanopore. Physical Review E, 2004, 70, 021105.	0.8	15
1759	Molecular insights into ion channel function (Review). Molecular Membrane Biology, 2004, 21, 221-225.	2.0	21
1760	Anomalous diffusivity and electric conductivity for low concentration electrolytes in nanopores. Physical Review E, 2004, 69, 051203.	0.8	7
1761	SELECTIVITY AND UPTAKE OF LITHIUM. Comments on Inorganic Chemistry, 2004, 25, 129-146.	3.0	10
1762	On the influence of semirigid environments on proton transfer along molecular chains. Journal of Chemical Physics, 2004, 120, 7085-7094.	1.2	19
1763	Total chemical synthesis and electrophysiological characterization of mechanosensitive channels from Escherichia coli and Mycobacterium tuberculosis. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 4764-4769.	3.3	72
1764	Why Biophysicists Make Models. Journal of General Physiology, 2004, 123, 657-662.	0.9	4
1765	Physicochemical Features of the hERG Channel Drug Binding Site. Journal of Biological Chemistry, 2004, 279, 10120-10127.	1.6	260
1766	Gating Charges in the Activation and Inactivation Processes of the hERG Channel. Journal of General Physiology, 2004, 124, 703-718.	0.9	93
1767	Negatively Charged Amino Acids within the Intraluminal Loop of Ryanodine Receptor Are Involved in the Interaction with Triadin. Journal of Biological Chemistry, 2004, 279, 6994-7000.	1.6	64
1768	The Predicted TM10 Transmembrane Sequence of the Cardiac Ca2+ Release Channel (Ryanodine) Tj ETQq1 1 0.7 3635-3642.	784314 rgB 1.6	T /Overloc 29
1769	TRP channels at a glance. Journal of Cell Science, 2004, 117, 5707-5709.	1.2	24
1770	A quantitative assessment of models for voltage-dependent gating of ion channels. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 17640-17645.	3.3	79

		CITATION RE	EPORT	
#	Article		IF	CITATIONS
1771	PISEMA Solid-State NMR Spectroscopy. Annual Reports on NMR Spectroscopy, 2004,	52, 1-52.	0.7	165
1772	Functional Conversion Between A-Type and Delayed Rectifier K+ Channels by Membrar 2004, 304, 265-270.	ne Lipids. Science,	6.0	301
1773	Small potassium ion channel proteins encoded by chlorella viruses. Proceedings of the Academy of Sciences of the United States of America, 2004, 101, 5318-5324.	National	3.3	69
1774	Molecular Basis of pH and Ca2+ Regulation of Aquaporin Water Permeability. Journal c Physiology, 2004, 123, 573-580.	of General	0.9	140
1775	Molecular Basis of Inward Rectification. Journal of General Physiology, 2004, 124, 541-	-554.	0.9	68
1776	Gαi1 and Gαi3 Differentially Interact with, and Regulate, the G Protein-activated K+ C Biological Chemistry, 2004, 279, 17260-17268.	hannel. Journal of	1.6	64
1777	Molecular Mechanisms of Cl- Transport by the Renal Na+-K+-Cl- Cotransporter. Journal Chemistry, 2004, 279, 5648-5654.	of Biological	1.6	28
1778	Regulation of K+ Flow by a Ring of Negative Charges in the Outer Pore of BKCa Chann Journal of General Physiology, 2004, 124, 185-197.	els. Part II.	0.9	12
1779	Monoglucosyldiacylglycerol, a Foreign Lipid, Can Substitute for Phosphatidylethanolan Essential Membrane-associated Functions in Escherichia coli. Journal of Biological Cher 279, 10484-10493.		1.6	68
1780	Regulation of K+ Flow by a Ring of Negative Charges in the Outer Pore of BKCa Chann Journal of General Physiology, 2004, 124, 173-184.	els. Part I.	0.9	44
1781	Structural Determinants of HERG Channel Block by Clofilium and Ibutilide. Molecular P 2004, 66, 240-249.	harmacology,	1.0	161
1782	External Barium Affects the Gating of KCNQ1 Potassium Channels and Produces a Por Discrete Sites. Journal of General Physiology, 2004, 124, 83-102.	e Block via Two	0.9	28
1783	Unique Inner Pore Properties of BK Channels Revealed by Quaternary Ammonium Bloc General Physiology, 2004, 124, 43-57.	k. Journal of	0.9	75
1784	STAM: simple Transmembrane Alignment Method. Bioinformatics, 2004, 20, 758-769.		1.8	25
1785	Phylogenetic conservation of disulfide-linked, dimeric acetylcholine receptor pentamer ocean electric rays. Journal of Experimental Biology, 2004, 207, 3581-3590.	s in southern	0.8	9
1786	Three Mechanisms Underlie KCNQ2/3 Heteromeric Potassium M-Channel Potentiation Neuroscience, 2004, 24, 9146-9152.	. Journal of	1.7	75
1787	Modulation of the Voltage Sensor of L-type Ca2+ Channels by Intracellular Ca2+. Journ Physiology, 2004, 123, 555-571.	al of General	0.9	22
1788	Regulation of Kir Channels by Intracellular pH and Extracellular K+. Journal of General P 2004, 123, 441-454.	hysiology,	0.9	31

	CITATION		
# 1789	ARTICLE Mouse Bestrophin-2 Is a Bona fide Clâ^' Channel. Journal of General Physiology, 2004, 123, 327-340.	IF 0.9	Citations
1790	Ion Channel Structure and the Promise of Bacteria. Journal of General Physiology, 2004, 124, 199-201.	0.9	3
1791	Y3+ Block Demonstrates an Intracellular Activation Gate for the α1G T-type Ca2+ Channel. Journal of General Physiology, 2004, 124, 631-640.	0.9	23
1792	Anthraquinone Polyamines: Novel Channel Blockers to Study N-Methyl-d-Aspartate Receptors. Journal of Pharmacology and Experimental Therapeutics, 2004, 309, 884-893.	1.3	22
1793	The ion channel of F-ATP synthase is the target of toxic organotin compounds. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 11239-11244.	3.3	88
1794	Functional Characterization of a Prokaryotic Kir Channel. Journal of Biological Chemistry, 2004, 279, 47076-47080.	1.6	52
1795	Molecular Basis for Kv1.5 Channel Block. Journal of Biological Chemistry, 2004, 279, 394-400.	1.6	98
1796	Molecular Determinants for High-Affinity Block of Human EAG Potassium Channels by Antiarrhythmic Agents. Molecular Pharmacology, 2004, 65, 1120-1129.	1.0	30
1797	State-dependent Block of CNG Channels by Dequalinium. Journal of General Physiology, 2004, 123, 295-304.	0.9	18
1798	New Insights on the Voltage Dependence of the KCa3.1 Channel Block by Internal TBA. Journal of General Physiology, 2004, 124, 333-348.	0.9	9
1799	Outer Pore Architecture of a Ca2+-selective TRP Channel. Journal of Biological Chemistry, 2004, 279, 15223-15230.	1.6	115
1800	Ryanodine Receptor Regulation by Intramolecular Interaction between Cytoplasmic and Transmembrane Domains. Molecular Biology of the Cell, 2004, 15, 2627-2638.	0.9	63
1801	Calcium Current in Rat Cardiomyocytes Is Modulated by the Carboxyl-terminal Ahnak Domain. Journal of Biological Chemistry, 2004, 279, 12456-12461.	1.6	36
1802	Theoretical Approaches to the Design of Functional Nanomaterials. Theoretical and Computational Chemistry, 2004, 15, 119-170.	0.2	5
1803	Metabolic Modulation of Potassium Channels. Science Signaling, 2004, 2004, pe22-pe22.	1.6	7
1804	HCN Channels: From Genes to Function. , 2004, , 59-65.		2
1805	Localization of a K+-binding Site Involved in Dephosphorylation of the Sarcoplasmic Reticulum Ca2+-ATPase. Journal of Biological Chemistry, 2004, 279, 46355-46358.	1.6	60
1806	Effects of the Lurcher Mutation on GluR1 Desensitization and Activation Kinetics. Journal of Neuroscience, 2004, 24, 4941-4951.	1.7	62

		CITATION	Report	
#	Article		IF	Citations
1807	Contribution of Calcium Ions to P2X Channel Responses. Journal of Neuroscience, 2004,	, 24, 3413-3420.	1.7	263
1808	Gain and Loss of Channel Function by Alanine Substitutions in the Transmembrane Segr ATP-Gated P2X2 Receptor. Journal of Neuroscience, 2004, 24, 7378-7386.	nents of the Rat	1.7	49
1809	Evolving potassium channels by means of yeast selection reveals structural elements im selectivity. Proceedings of the National Academy of Sciences of the United States of Am 4441-4446.		3.3	41
1810	Unraveling the interface of signal recognition particle and its receptor by using chemical cross-linking and tandem mass spectrometry. Proceedings of the National Academy of S United States of America, 2004, 101, 16454-16459.		3.3	72
1811	Mapping of Maurotoxin Binding Sites on hKv1.2, hKv1.3, and hIKCa1 Channels. Molecula 2004, 66, 1103-1112.	ar Pharmacology,	1.0	48
1812	A Cyclic Nucleotide Modulated Prokaryotic K+ Channel. Journal of General Physiology, 20 203-210.	004, 124,	0.9	82
1813	The Low-Potency, Voltage-Dependent HERG Blocker Propafenone—Molecular Determir Trapping. Molecular Pharmacology, 2004, 66, 1201-1212.	ants and Drug	1.0	112
1814	Transient calnexin interaction confers long-term stability on folded K+ channel protein ir Journal of Cell Science, 2004, 117, 2897-2908.	the ER.	1.2	13
1815	Outer Pore Topology of the ECaC-TRPV5 Channel by Cysteine Scan Mutagenesis. Journa Chemistry, 2004, 279, 6853-6862.	l of Biological	1.6	53
1816	Coordination of Membrane Excitability through a GIRK1 Signaling Complex in the Atria. J Biological Chemistry, 2004, 279, 23630-23636.	ournal of	1.6	51
1817	The Substrate Anion Selectivity Filter in the Human Erythrocyte Clâ^'/HCO3â^' Exchange Journal of Biological Chemistry, 2004, 279, 23565-23573.	Protein, AE1.	1.6	49
1818	Membrane Topology of System Xc- Light Subunit Reveals a Re-entrant Loop with Substra Accessibility. Journal of Biological Chemistry, 2004, 279, 31228-31236.	ate-restricted	1.6	78
1819	Voltage-dependent Gating of Hyperpolarization-activated, Cyclic Nucleotide-gated Pacer Channels. Journal of Biological Chemistry, 2004, 279, 13859-13865.	naker	1.6	110
1820	Nitric Oxide Block of Outward-Rectifying K+ Channels Indicates Direct Control by Protein Nitrosylation in Guard Cells. Plant Physiology, 2004, 136, 4275-4284.	n	2.3	131
1821	Specificity of Charge-carrying Residues in the Voltage Sensor of Potassium Channels. Jou General Physiology, 2004, 123, 205-216.	ırnal of	0.9	81
1822	The Mitochondrial Apoptosis-induced Channel (MAC) Corresponds to a Late Apoptotic E of Biological Chemistry, 2004, 279, 46542-46550.	Ivent. Journal	1.6	38
1823	Stabilizing the Closed S6 Gate in the Shaker K v Channel Through Modification of a Hydr Journal of General Physiology, 2004, 124, 319-332.	ophobic Seal.	0.9	63
1824	Alternating Access and a Pore-Loop Structure in the Na+-Citrate Transporter CitS of Kleb pneumoniae. Journal of Biological Chemistry, 2004, 279, 31113-31120.	siella	1.6	18

#	Article	IF	CITATIONS
1825	Regulation of Sodium Channel Function by Bilayer Elasticity. Journal of General Physiology, 2004, 123, 599-621.	0.9	239
1826	Binding of κ-Conotoxin PVIIA to Shaker K+ Channels Reveals Different K+ and Rb+ Occupancies within the Ion Channel Pore. Journal of General Physiology, 2004, 124, 71-81.	0.9	18
1827	Amino Acid Substitutions in Putative Selectivity Filter Regions III and IV in KdpA Alter Ion Selectivity of the KdpFABC Complex from Escherichia coli. Journal of Bacteriology, 2004, 186, 5519-5522.	1.0	27
1828	Reversed voltage-dependent gating of a bacterial sodium channel with proline substitutions in the S6 transmembrane segment. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 17873-17878.	3.3	59
1829	Long Distance Interactions within the Potassium Channel Pore Are Revealed by Molecular Diversity of Viral Proteins. Journal of Biological Chemistry, 2004, 279, 28443-28449.	1.6	38
1830	K channel gating by an affinity-switching selectivity filter. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 3248-3252.	3.3	41
1831	GABAA Receptor Structure–Function Studies: A Reexamination in Light of New Acetylcholine Receptor Structures. International Review of Neurobiology, 2004, 62, 1-43.	0.9	46
1832	Structure and Function of Kv4-Family Transient Potassium Channels. Physiological Reviews, 2004, 84, 803-833.	13.1	307
1833	Theoretical and computational models of biological ion channels. Quarterly Reviews of Biophysics, 2004, 37, 15-103.	2.4	362
1834	Molecular Surface of Tarantula Toxins Interacting with Voltage Sensors in Kv Channels. Journal of General Physiology, 2004, 123, 455-467.	0.9	100
1835	Glycine as a D-amino acid surrogate in the K+-selectivity filter. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 17045-17049.	3.3	86
1836	Ion homeostasis, channels, and transporters: an update on cellular mechanisms. American Journal of Physiology - Advances in Physiology Education, 2004, 28, 143-154.	0.8	98
1837	Effect of the Pore Region of a Transmembrane Ion Channel on the Physical Properties of a Simple Membrane. Journal of Physical Chemistry B, 2004, 108, 2608-2613.	1.2	21
1838	Dynamics of Ca2+-Calmodulin–dependent Inhibition of Rod Cyclic Nucleotide-gated Channels Measured by Patch-clamp Fluorometry. Journal of General Physiology, 2004, 124, 211-223.	0.9	49
1839	Target class strategies in mass spectrometry-based proteomics. Expert Review of Proteomics, 2004, 1, 57-66.	1.3	10
1840	Computational analysis of Â-helical membrane protein structure: implications for the prediction of 3D structural models. Protein Engineering, Design and Selection, 2004, 17, 613-624.	1.0	41
1841	The milestone of membrane protein research: Nobel Prize in Chemistry for 2003. Science Bulletin, 2004, 49, 647.	1.7	0
1842	Inhibition of CFTR channels by a peptide toxin of scorpion venom. American Journal of Physiology - Cell Physiology, 2004, 287, C1328-C1341.	2.1	20

#	Article	IF	CITATIONS
1843	Sodium Transporters in Plants. Diverse Genes and Physiological Functions. Plant Physiology, 2004, 136, 2457-2462.	2.3	199
1844	Repositioning of charged I-II loop amino acid residues within the electric field by beta subunit as a novel working hypothesis for the control of fast P/Q calcium channel inactivation. European Journal of Neuroscience, 2004, 19, 1759-1772.	1.2	14
1845	HETEROGENEOUS EXPRESSION OF TANDEM-PORE K+ CHANNEL GENES IN ADULT AND EMBRYONIC RAT HEART QUANTIFIED BY REAL-TIME POLYMERASE CHAIN REACTION. Clinical and Experimental Pharmacology and Physiology, 2004, 31, 174-178.	0.9	52
1846	Channels in microbes: so many holes to fill. Molecular Microbiology, 2004, 53, 373-380.	1.2	44
1847	Potassium, sodium, calcium and glutamateâ€gated channels: pore architecture and ligand action. Journal of Neurochemistry, 2004, 88, 782-799.	2.1	112
1848	Light-activated ion channels for remote control of neuronal firing. Nature Neuroscience, 2004, 7, 1381-1386.	7.1	660
1849	The state of ion channel research in 2004. Nature Reviews Drug Discovery, 2004, 3, 239-278.	21.5	11
1850	Biology, structure and mechanism of P-type ATPases. Nature Reviews Molecular Cell Biology, 2004, 5, 282-295.	16.1	498
1851	Molecular mechanism of voltage sensor movements in a potassium channel. EMBO Journal, 2004, 23, 4717-4726.	3.5	36
1852	A mechanism for the activation of the Na/H exchanger NHEâ€1 by cytoplasmic acidification and mitogens. EMBO Reports, 2004, 5, 91-96.	2.0	84
1853	Electron and atomic force microscopy of the trimeric ammonium transporter AmtB. EMBO Reports, 2004, 5, 1153-1158.	2.0	47
1854	Towards a structural view of gating in potassium channels. Nature Reviews Neuroscience, 2004, 5, 905-916.	4.9	156
1855	Whither structural biology?. Nature Structural and Molecular Biology, 2004, 11, 12-15.	3.6	64
1856	Opening the gate in potassium channels. Nature Structural and Molecular Biology, 2004, 11, 499-501.	3.6	15
1857	And the oskar goes to Nature Structural and Molecular Biology, 2004, 11, 501-501.	3.6	0
1858	RNA editing of a human potassium channel modifies its inactivation. Nature Structural and Molecular Biology, 2004, 11, 915-916.	3.6	5
1859	Control of human potassium channel inactivation by editing of a small mRNA hairpin. Nature Structural and Molecular Biology, 2004, 11, 950-956.	3.6	219
1860	Intracellular gate opening in Shaker K+ channels defined by high-affinity metal bridges. Nature, 2004, 428, 864-868.	13.7	203

		CITATION REPORT		
#	Article		IF	CITATIONS
1861	Self-assembly of amphiphilic dendritic dipeptides into helical pores. Nature, 2004, 430	, 764-768.	13.7	613
1862	Control of ion selectivity in potassium channels by electrostatic and dynamic propertieligands. Nature, 2004, 431, 830-834.	es of carbonyl	13.7	528
1863	Cell signal control of the G protein-gated potassium channel and its subcellular localiza Journal of Physiology, 2004, 554, 285-294.	ation.	1.3	42
1864	Small conductance Ca2+-activated K+channels and calmodulin. Journal of Physiology, 255-261.	2004, 554,	1.3	159
1865	Activation properties of Kv4.3 channels: time, voltage and [K+]odependence. Journal o 2004, 557, 705-717.	of Physiology,	1.3	29
1866	Density-dependent changes of the pore properties of the P2X2receptor channel. Journ 2004, 558, 31-43.	al of Physiology,	1.3	76
1867	Accessibility of mid-segment domain IV S6 residues of the voltage-gated Na+channel t methanethiosulfonate reagents. Journal of Physiology, 2004, 561, 403-413.	0	1.3	27
1868	Effects of permeating ions and cGMP on gating and conductance of rod-type cyclic nu (CNGA1) channels. Journal of Physiology, 2004, 560, 605-616.	cleotide-gated	1.3	11
1869	Regulation of gating by negative charges in the cytoplasmic pore in the Kir2.1 channel Physiology, 2004, 561, 159-168.	. Journal of	1.3	10
1870	Crystal Structures of Apocalmodulin and an Apocalmodulin/SK Potassium Channel Gat Complex. Structure, 2004, 12, 849-860.	ing Domain	1.6	123
1871	Computational Studies of Membrane Channels. Structure, 2004, 12, 1343-1351.		1.6	136
1872	Cytoplasmic gatekeepers of K+-channel flux: a structural perspective. Trends in Bioche 2004, 29, 39-45.	mical Sciences,	3.7	50
1873	IP3 receptors: the search for structure. Trends in Biochemical Sciences, 2004, 29, 210-	-219.	3.7	144
1874	Energy transduction in transmembrane ion pumps. Trends in Biochemical Sciences, 20	04, 29, 445-451.	3.7	13
1875	Potassium channel structures: do they conform?. Current Opinion in Structural Biology 440-446.	y, 2004, 14,	2.6	31
1876	Structural comparison of lactose permease and the glycerol-3-phosphate antiporter: major facilitator superfamily. Current Opinion in Structural Biology, 2004, 14, 413-419	embers of the 9.	2.6	80
1877	Ligand-gated ion channels: mechanisms underlying ion selectivity. Progress in Biophysi Molecular Biology, 2004, 86, 161-204.	ics and	1.4	175
1878	Super-channel in bacteria: Structural and functional aspects of a novel biosystem for the depolymerization of macromolecules. Journal of Bioscience and Bioengineering, 2004,		1.1	10

#	Article	IF	CITATIONS
1879	Adenylyl cyclases from Plasmodium, Paramecium and Tetrahymena are novel ion channel/enzyme fusion proteins. Cellular Signalling, 2004, 16, 115-125.	1.7	78
1880	Strategies to identify ion channel modulators: current and novel approaches to target neuropathic pain. Drug Discovery Today, 2004, 9, 410-418.	3.2	45
1881	Genetic methods for illuminating the function of neural circuits. Current Opinion in Neurobiology, 2004, 14, 395-402.	2.0	53
1882	Acquired QT interval prolongation and HERG: implications for drug discovery and development. European Journal of Pharmacology, 2004, 500, 129-142.	1.7	124
1883	The role of lipids in membrane insertion and translocation of bacterial proteins. Biochimica Et Biophysica Acta - Molecular Cell Research, 2004, 1694, 97-109.	1.9	58
1884	Structural insights into the regulatory mechanism of IP3 receptor. Biochimica Et Biophysica Acta - Molecular Cell Research, 2004, 1742, 89-102.	1.9	102
1885	Molecular regulation of cardiac ryanodine receptor ion channel. Cell Calcium, 2004, 35, 621-628.	1.1	161
1886	Membrane Topology and Membrane Retention of the Ryanodine Receptor Calcium Release Channel. Cell Biochemistry and Biophysics, 2004, 40, 207-224.	0.9	18
1887	Regulation of Recombinant and Native Hyperpolarization-Activated Cation Channels. Molecular Neurobiology, 2004, 30, 279-306.	1.9	48
1888	Crown Ethers:Â Sensors for Ions and Molecular Scaffolds for Materials and Biological Models. Chemical Reviews, 2004, 104, 2723-2750.	23.0	1,314
1889	The selectivity filter of the tandem pore potassium channel TASK-1 and its pH-sensitivity and ionic selectivity. Pflugers Archiv European Journal of Physiology, 2004, 448, 63-69.	1.3	16
1890	The 2P-domain K + channels: role in apoptosis and tumorigenesis. Pflugers Archiv European Journal of Physiology, 2004, 448, 261-273.	1.3	129
1891	The milestone of membrane protein research: Nobel Prize in Chemistry for 2003. Science Bulletin, 2004, 49, 647-652.	1.7	0
1892			
	Ion channels and lymphocyte activation. Immunology Letters, 2004, 92, 55-66.	1.1	101
1893	Ion channels and lymphocyte activation. Immunology Letters, 2004, 92, 55-66. Myelin basic protein—diverse conformational states of an intrinsically unstructured protein and its roles in myelin assembly and multiple sclerosis. Micron, 2004, 35, 503-542.	1.1	101 230
	Myelin basic protein—diverse conformational states of an intrinsically unstructured protein and its		
1893	Myelin basic protein—diverse conformational states of an intrinsically unstructured protein and its roles in myelin assembly and multiple sclerosis. Micron, 2004, 35, 503-542. Potassium Channels and the Atomic Basis of Selective Ion Conduction. Bioscience Reports, 2004, 24,	1.1	230

#	Article	IF	CITATIONS
1897	Molecular Mechanisms of Electrogenic Sodium Bicarbonate Cotransport: Structural and Equilibrium Thermodynamic Considerations. Journal of Membrane Biology, 2004, 197, 77-90.	1.0	29
1898	Orientation of Arabidopsis thaliana KAT1 Channel in the Plasma Membrane. Journal of Membrane Biology, 2004, 201, 157-165.	1.0	5
1899	The HERG K + channel: progress in understanding the molecular basis of its unusual gating kinetics. European Biophysics Journal, 2004, 33, 89-97.	1.2	57
1900	KcsA closed and open: modelling and simulation studies. European Biophysics Journal, 2004, 33, 238-46.	1.2	25
1901	The roles of intracellular regions in the activation of voltage-dependent potassium channels. European Biophysics Journal, 2004, 33, 194-200.	1.2	22
1902	lon permeation of pores in model membranes: selectivity, fluctuations and the role of surface charge. European Biophysics Journal, 2004, 33, 280-2.	1.2	5
1903	Arranging the elements of the potassium channel: the T1 domain occludes the cytoplasmic face of the channel. European Biophysics Journal, 2004, 33, 370-6.	1.2	5
1904	Structural themes in ion channels. European Biophysics Journal, 2004, 33, 175-9.	1.2	28
1905	Homology modelling and molecular dynamics simulations: comparative studies of human aquaporin-1. European Biophysics Journal, 2004, 33, 477-489.	1.2	27
1906	A set of homology models of pore loop domain of six eukaryotic voltage-gated potassium channels Kv1.1-Kv1.6. Proteins: Structure, Function and Bioinformatics, 2004, 55, 558-567.	1.5	11
1907	Solution structure of BmKK2, a new potassium channel blocker from the venom of chinese scorpion Buthus martensi Karsch. Proteins: Structure, Function and Bioinformatics, 2004, 55, 835-845.	1.5	11
1908	The solution structure of BmTx3B, a member of the scorpion toxin subfamily α-KTx 16. Proteins: Structure, Function and Bioinformatics, 2004, 58, 489-497.	1.5	14
1909	Blocker efflux through blocked pores. Journal of Physical Organic Chemistry, 2004, 17, 978-982.	0.9	11
1910	Computer simulations of voltage-gated potassium channel KvAP. International Journal of Quantum Chemistry, 2004, 100, 1071-1078.	1.0	14
1911	Structure of theThermus thermophilusputative periplasmic glutamate/glutamine-binding protein. Acta Crystallographica Section D: Biological Crystallography, 2004, 60, 1846-1854.	2.5	23
1912	Potassium Channels and the Atomic Basis of Selective Ion Conduction (Nobel Lecture). Angewandte Chemie - International Edition, 2004, 43, 4265-4277.	7.2	329
1913	Semisynthesis of a Functional K+ Channel. Angewandte Chemie - International Edition, 2004, 43, 2504-2507.	7.2	53
1914	Liquid Crystals with Complex Superstructures. Angewandte Chemie - International Edition, 2004, 43, 4621-4625.	7.2	61

#	Article	IF	CITATIONS
1915	The World ofÎ ² - andÎ ³ -Peptides Comprised of Homologated Proteinogenic Amino Acids and Other Components. Chemistry and Biodiversity, 2004, 1, 1111-1239.	1.0	870
1916	Towards a three-?-helix bundle protein that binds volatile general anesthetics. Biopolymers, 2004, 75, 338-354.	1.2	2
1920	Hyperinsulinemic hypoglycemia of infancy: the challenge continues. Diabetes/Metabolism Research and Reviews, 2004, 20, 189-195.	1.7	15
1921	Critical protein domains and amino acid residues for gating the KIR6.2 channel by intracellular ATP. Journal of Cellular Physiology, 2004, 198, 73-81.	2.0	5
1922	AMPA receptor ligands: Synthetic and pharmacological studies of polyamines and polyamine toxins. Medicinal Research Reviews, 2004, 24, 589-620.	5.0	65
1923	Adrenaline Recognition in Water. Chemistry - A European Journal, 2004, 10, 4225-4232.	1.7	24
1924	Functional, synthetic organic chemical models of cellular ion channels. Bioorganic and Medicinal Chemistry, 2004, 12, 1291-1304.	1.4	50
1925	A model for identifying HERG K+ channel blockers. Bioorganic and Medicinal Chemistry, 2004, 12, 2307-2315.	1.4	137
1926	Ultrasound-induced cell membrane porosity. Ultrasound in Medicine and Biology, 2004, 30, 519-526.	0.7	306
1927	Tools for channels: moving towards molecular calculations of gating and permeation in ion channel biophysics. Journal of Molecular Graphics and Modelling, 2004, 22, 359-368.	1.3	16
1928	Dynamical properties of water molecules in the hydration shells of Na+ and K+: ab initio QM/MM molecular dynamics simulations. Chemical Physics Letters, 2004, 385, 378-383.	1.2	47
1929	Ab initio investigation of the atomic charges in the KcsA channel selectivity filter. Chemical Physics Letters, 2004, 397, 510-515.	1.2	23
1930	Engineering charge selectivity in model ion channels. Bioorganic and Medicinal Chemistry, 2004, 12, 1337-1342.	1.4	10
1931	Water molecules in hydroxy/acid networks as a competition between dynamics and bonding. Synthesis of a wet hydrophobic pore. Bioorganic and Medicinal Chemistry, 2004, 12, 1305-1314.	1.4	5
1932	The dipole moments of membrane proteins: potassium channel proteins. II. T1 assembly. Search for the voltage sensor. Biophysical Chemistry, 2004, 107, 63-69.	1.5	1
1933	Beyond the diffusion limit: Water flow through the empty bacterial potassium channel. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 4805-4809.	3.3	71
1934	Modulation of HERG potassium channel function by drug action. Annals of Medicine, 2004, 36, 41-46.	1.5	7
1935	Additivity of Cationâ^'ï€ Interactions: An ab Initio Computational Study on ï€â^'Cationâ~'ï€ Sandwich Complexes. Journal of Physical Chemistry A, 2004, 108, 9400-9405.	1.1	29

#	Article	IF	CITATIONS
1936	DNA-Functionalized Nanotube Membranes with Single-Base Mismatch Selectivity. Science, 2004, 305, 984-986.	6.0	309
1937	Synchrotron and neutron techniques in biological crystallography. Chemical Society Reviews, 2004, 33, 548.	18.7	30
1938	Comparison of Dynamic Lattice Monte Carlo Simulations and the Dielectric Self-Energy Poissonâ^'Nernstâ^'Planck Continuum Theory for Model Ion Channels. Journal of Physical Chemistry B, 2004, 108, 2006-2015.	1.2	93
1939	The Cation/Ca2+ Exchanger Superfamily: Phylogenetic Analysis and Structural Implications. Molecular Biology and Evolution, 2004, 21, 1692-1703.	3.5	211
1940	Quasi-particles in the selectivity filter can explain permeation in a channel with multiple occupancy. Physical Chemistry Chemical Physics, 2004, 6, 3111.	1.3	11
1941	Chloride complexation by heptapeptides: influence of C- and N-terminal sidechains and counterion. Chemical Communications, 2004, , 160.	2.2	18
1942	Andersenâ€Tawil syndrome: a model of clinical variability, pleiotropy, and genetic heterogeneity. Annals of Medicine, 2004, 36, 92-97.	1.5	85
1943	Calcium Block of Sodium Current in a Model Calcium Channel: Cylindrical Atomistic Pore with Glutamate Side Chains. Molecular Simulation, 2004, 30, 75-80.	0.9	6
1944	Techniques and applications of NMR to membrane proteins (Review). Molecular Membrane Biology, 2004, 21, 129-141.	2.0	37
1945	Two-dimensional hydration shells of alkali metal ions at a hydrophobic surface. Journal of Chemical Physics, 2004, 121, 12572.	1.2	25
1946	Influence of C-Terminal Protein Domains and Proteinâ ''Lipid Interactions on Tetramerization and Stability of the Potassium Channel KcsAâ€. Biochemistry, 2004, 43, 14924-14931.	1.2	58
1947	Direct Time-Resolved and Spatially Resolved Monitoring of Molecular Transport in a Crystalline Nanochannel System. Journal of the American Chemical Society, 2004, 126, 11124-11125.	6.6	44
1948	Density Functional Theory Investigations on the Chemical Basis of the Selectivity Filter in the K+Channel Protein. Journal of the American Chemical Society, 2004, 126, 4711-4716.	6.6	26
1949	Small Alcohols Destabilize the KcsA Tetramer via Their Effect on the Membrane Lateral Pressureâ€. Biochemistry, 2004, 43, 5937-5942.	1.2	45
1950	Emerging structural explanations of ionotropic glutamate receptor function. FASEB Journal, 2004, 18, 428-438.	0.2	54
1951	Topological Changes of Hydrogen Bonding of Water with Acetic Acid:  AIM and NBO Studies. Journal of Physical Chemistry A, 2004, 108, 6543-6553.	1.1	17
1952	Topology Scanning and Putative Three-Dimensional Structure of the Extracellular Binding Domains of the Apical Sodium-Dependent Bile Acid Transporter (SLC10A2)â€. Biochemistry, 2004, 43, 11380-11392.	1.2	62
1953	Computational design of water-soluble analogues of the potassium channel KcsA. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 1828-1833.	3.3	106

#	Article	IF	Citations
1954	Conus Venoms: A Rich Source of Novel Ion Channel-Targeted Peptides. Physiological Reviews, 2004, 84, 41-68.	13.1	866
1955	Artificial Ion Channel Formed by Cucurbit[n]uril Derivatives with a Carbonyl Group Fringed Portal Reminiscent of the Selectivity Filter of K+Channels. Journal of the American Chemical Society, 2004, 126, 15944-15945.	6.6	169
1956	Ion Binding Affinity in the Cavity of the KcsA Potassium Channel. Biochemistry, 2004, 43, 4978-4982.	1.2	82
1957	Role of Secondary Level Chiral Structure in the Process of Molecular Recognition of Ligand:Â Study of Model Helical Peptide. Journal of Physical Chemistry B, 2004, 108, 789-797.	1.2	16
1958	Stability of KcsA Tetramer Depends on Membrane Lateral Pressure. Biochemistry, 2004, 43, 4240-4250.	1.2	82
1959	The influence of geometry, surface character, and flexibility on the permeation of ions and water through biological pores. Physical Biology, 2004, 1, 42-52.	0.8	227
1960	Microbial Genomics and the Periodic Table. Applied and Environmental Microbiology, 2004, 70, 647-655.	1.4	138
1961	Competitive Na+and Rb+Binding in the Minor Groove of DNA. Journal of the American Chemical Society, 2004, 126, 6739-6750.	6.6	80
1962	Short Variable Sequence Acquired in Evolution Enables Selective Inhibition of Various Inward-Rectifier K+ Channels. Biochemistry, 2004, 43, 10701-10709.	1.2	31
1963	Conserved Gating Hinge in Ligand- and Voltage-Dependent K+Channelsâ€. Biochemistry, 2004, 43, 13242-13247.	1.2	81
1964	Insights from Modeling Three-Dimensional Structures of the Human Potassium and Sodium Channels. Journal of Proteome Research, 2004, 3, 856-861.	1.8	92
1965	Synthetic Ion Channel Activity Documented by Electrophysiological Methods in Living Cells. Journal of the American Chemical Society, 2004, 126, 15747-15753.	6.6	45
1966	Characterization of the outer pore region of the apamin-sensitive Ca2+-activated K+ channel rSK2. Toxicon, 2004, 43, 951-951.	0.8	0
1967	An Evolutionarily Conserved Network of Amino Acids Mediates Gating in Voltage-dependent Potassium Channels. Journal of Mathematical Analysis and Applications, 2004, 294, .	0.5	0
1968	Sonoporation of Cells for Drug and Gene delivery. , 2004, 2004, 3531-4.		11
1969	Genetic methods for illuminating the function of neural circuits. Current Opinion in Neurobiology, 2004, , .	2.0	0
1970	Myelin basic protein?diverse conformational states of an intrinsically unstructured protein and its roles in myelin assembly and multiple sclerosis. Micron, 2004, , .	1.1	0
1971	Differential diagnosis and management of neonatal hypoglycemia. Pediatric Clinics of North America, 2004, 51, 703-723.	0.9	47

#	Article	IF	CITATIONS
1972	Voltage sensor mutations differentially target misfolded K+ channel subunits to proteasomal and non-proteasomal disposal pathways. FEBS Letters, 2004, , .	1.3	0
1973	Antiarrhythmic drugs: Past, present and future. Heart Rhythm, 2004, 1, C57-C66.	0.3	3
1974	Applied field nonequilibrium molecular dynamics simulations of ion exit from a \$beta;-barrel model of the L-type calcium channel. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1664, 1-1.	1.4	0
1975	Structural Isomerism and Competitive Proton Solvation between Methanol and Water in H+(CH3OH)m(H2O)n,m+n= 4â€. Journal of Physical Chemistry A, 2004, 108, 2859-2866.	1.1	33
1976	Resiniferatoxin Binds to the Capsaicin Receptor (TRPV1) near the Extracellular Side of the S4 Transmembrane Domain. Biochemistry, 2004, 43, 2501-2511.	1.2	116
1977	Molecular Docking of the Scorpion Toxin Tc1 to the Structural Model of the Voltage-gated Potassium Channel Kv1.1 from HumanHomo sapiens. Journal of Biomolecular Structure and Dynamics, 2004, 21, 639-650.	2.0	8
1978	Overview of Protein Structural and Functional Folds. Current Protocols in Protein Science, 2004, 35, Unit 17.1.	2.8	25
1979	Energy-landscape-model analysis for irreversibility and its pulse-width dependence in cells subjected to a high-intensity ultrashort electric pulse. Physical Review E, 2004, 69, 051901.	0.8	30
1980	Structure and Function of Glutamate Receptor Ion Channels. Annual Review of Physiology, 2004, 66, 161-181.	5.6	379
1981	Specificity of Anion Binding in the Substrate Pocket of Bacteriorhodopsin. Biochemistry, 2004, 43, 4934-4943.	1.2	12
1982	Bilayer Thickness Modulates the Conductance of the BK Channel in Model Membranes. Biophysical Journal, 2004, 86, 3620-3633.	0.2	52
1983	Peptaibol Zervamicin IIB Structure and Dynamics Refinement from Transhydrogen Bond J Couplings. Biophysical Journal, 2004, 86, 3687-3699.	0.2	12
1984	In Silico Activation of KcsA K+ Channel by Lateral Forces Applied to the C-Termini of Inner Helices. Biophysical Journal, 2004, 87, 1526-1536.	0.2	28
1985	Simulation of the Interaction Between ScyTx and Small Conductance Calcium-Activated Potassium Channel by Docking and MM-PBSA. Biophysical Journal, 2004, 87, 105-112.	0.2	61
1986	lonic Permeation Free Energy in Gramicidin: A Semimicroscopic Perspective. Biophysical Journal, 2004, 86, 3529-3541.	0.2	26
1987	Computational Simulations of Interactions of Scorpion Toxins with the Voltage-Gated Potassium Ion Channel. Biophysical Journal, 2004, 86, 3542-3555.	0.2	55
1988	Functional Characterization of a Small Conductance GIRK Channel in Rat Atrial Cells. Biophysical Journal, 2004, 87, 3122-3136.	0.2	4
1989	Coupled Motions between Pore and Voltage-Sensor Domains: A Model for Shaker B, a Voltage-Gated Potassium Channel. Biophysical Journal, 2004, 87, 2365-2379.	0.2	45

#	Article	IF	CITATIONS
1990	Filter Flexibility and Distortion in a Bacterial Inward Rectifier K+ Channel: Simulation Studies of KirBac1.1. Biophysical Journal, 2004, 87, 256-267.	0.2	60
1991	A Model of Voltage Gating Developed Using the KvAP Channel Crystal Structure. Biophysical Journal, 2004, 87, 2255-2270.	0.2	34
1992	Models of the Structure and Voltage-Gating Mechanism of the Shaker K+ Channel. Biophysical Journal, 2004, 87, 2116-2130.	0.2	56
1993	Monitoring Gramicidin Conformations in Membranes: A Fluorescence Approach. Biophysical Journal, 2004, 87, 831-843.	0.2	76
1994	A Model of the Putative Pore Region of the Cardiac Ryanodine Receptor Channel. Biophysical Journal, 2004, 87, 2335-2351.	0.2	56
1995	The External TEA Binding Site and C-Type Inactivation in Voltage-Gated Potassium Channels. Biophysical Journal, 2004, 87, 3148-3161.	0.2	38
1996	A Model Membrane Protein for Binding Volatile Anesthetics. Biophysical Journal, 2004, 87, 4065-4074.	0.2	14
1998	Mechanosensitive ion channels: molecules of mechanotransduction. Journal of Cell Science, 2004, 117, 2449-2460.	1.2	470
1999	A nanodevice for rectification and pumping ions. American Journal of Physics, 2004, 72, 567-574.	0.3	151
2000	The Ustilago maydis killer toxins. Topics in Current Genetics, 0, , 157-174.	0.7	5
2001	MODELING AND SIMULATION OF BIOMATERIALS. Annual Review of Materials Research, 2004, 34, 279-314.	4.3	38
2002	Computational Modeling Evidence of a Nonthermal Electromagnetic Interaction Mechanism With Living Cells: Microwave Nonlinearity in the Cellular Sodium Ion Channel. IEEE Transactions on Microwave Theory and Techniques, 2004, 52, 2040-2045.	2.9	7
2003	Minimalist Molecular Model for Nanopore Selectivity. Physical Review Letters, 2004, 93, 168104.	2.9	57
2004	Automated protein structure homology modeling: a progress report. Pharmacogenomics, 2004, 5, 405-416.	0.6	105
2005	Thermodynamic and Kinetic Stability of Synthetic Multifunctional Rigid-Rod β-Barrel Pores:  Evidence for Supramolecular Catalysis. Journal of the American Chemical Society, 2004, 126, 10067-10075.	6.6	92
2006	Structural Basis of Ion Pumping by Ca2+-ATPase of the Sarcoplasmic Reticulum. Annual Review of Biochemistry, 2004, 73, 269-292.	5.0	345
2007	Structural Basis of Ligand Activation in a Cyclic Nucleotide Regulated Potassium Channel. Cell, 2004, 119, 615-627.	13.5	121
2008	Voltage sensor mutations differentially target misfolded K+ channel subunits to proteasomal and		

#	Article	IF	Citations
2009	2.6 Ã resolution crystal structure of the bacterioferritin fromAzotobacter vinelandii. FEBS Letters, 2004, 573, 93-98.	1.3	42
2010	Functional properties of a pore mutant in theDrosophila melanogasterinositol 1,4,5-trisphosphate receptor. FEBS Letters, 2004, 575, 95-98.	1.3	9
2011	Loop X/XI, the largest cytoplasmic loop in the membrane-bound melibiose carrier of Escherichia coli, is a functional re-entrant loop. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1660, 106-117.	1.4	15
2012	Molecular dynamics study of the KcsA channel at 2.0-Ã resolution: stability and concerted motions within the pore. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1661, 26-39.	1.4	45
2013	Regulation of connexin biosynthesis, assembly, gap junction formation, and removal. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1662, 3-21.	1.4	263
2014	Applied field nonequilibrium molecular dynamics simulations of ion exit from a β-barrel model of the L-type calcium channel. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1664, 1-8.	1.4	11
2015	Computer simulations of membrane proteins. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1666, 158-189.	1.4	217
2016	Nonbilayer lipids affect peripheral and integral membrane proteins via changes in the lateral pressure profile. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1666, 275-288.	1.4	372
2017	On the role of lipid in colicin pore formation. Biochimica Et Biophysica Acta - Biomembranes, 2004, 1666, 239-249.	1.4	64
2018	Streptomyces lividans potassium channel KcsA is regulated by the potassium electrochemical gradient. Biochemical and Biophysical Research Communications, 2004, 316, 429-436.	1.0	26
2019	Functional evidence for a supramolecular structure for the Streptomyces lividans potassium channel KcsA. Biochemical and Biophysical Research Communications, 2004, 322, 1059-1065.	1.0	32
2020	Functional expression of TREK-2 in insulin-secreting MIN6 cells. Biochemical and Biophysical Research Communications, 2004, 323, 323-331.	1.0	23
2021	Results from screening over 9000 mutation-bearing mice for defects in the electroretinogram and appearance of the fundus. Vision Research, 2004, 44, 3335-3345.	0.7	23
2022	A pedestrian guide to membrane protein crystallization. Methods, 2004, 34, 364-372.	1.9	165
2023	Presynaptic K+ channels: electrifying regulators of synaptic terminal excitability. Trends in Neurosciences, 2004, 27, 210-217.	4.2	166
2024	Stirring up controversy with a voltage sensor paddle. Trends in Neurosciences, 2004, 27, 303-307.	4.2	81
2025	Permeation in ion channels: the interplay of structure and theory. Trends in Neurosciences, 2004, 27, 308-314.	4.2	41
2026	Structural changes during ion channel gating. Trends in Neurosciences, 2004, 27, 298-302.	4.2	73

#	Article	IF	CITATIONS
2027	Structure and gating of the glutamate receptor ion channel. Trends in Neurosciences, 2004, 27, 321-328.	4.2	193
2028	Transporter structure and mechanism. Trends in Neurosciences, 2004, 27, 352-359.	4.2	56
2029	Targeting of ion channels to membrane microdomains: localization of KV channels to lipid rafts. Trends in Pharmacological Sciences, 2004, 25, 16-21.	4.0	166
2030	The TREK K2P channels and their role in general anaesthesia and neuroprotection. Trends in Pharmacological Sciences, 2004, 25, 601-608.	4.0	196
2031	Molecular basis of α-KTx specificity. Toxicon, 2004, 43, 877-886.	0.8	44
2032	Identification of a mammalian target of κM-conotoxin RIIIK. Toxicon, 2004, 43, 915-921.	0.8	22
2033	Block of maurotoxin and charybdotoxin on human intermediate-conductance calcium-activated potassium channels (hIKCa1). Toxicon, 2004, 43, 973-980.	0.8	9
2034	Modulation of Kv4.2 channels by a peptide isolated from the venom of the giant bird-eating tarantula Theraphosa leblondi. Toxicon, 2004, 43, 923-932.	0.8	34
2035	Australian funnel-web spiders: master insecticide chemists. Toxicon, 2004, 43, 601-618.	0.8	125
2036	Characterization of the outer pore region of the apamin-sensitive Ca2+-activated K+ channel rSK2. Toxicon, 2004, 43, 951-960.	0.8	15
2037	Using the deadly μ-conotoxins as probes of voltage-gated sodium channels. Toxicon, 2004, 44, 117-122.	0.8	49
2038	Comparison of sea anemone and scorpion toxins binding to Kv1 channels: an example of convergent evolution. Toxicon, 2004, 43, 901-908.	0.8	30
2039	Linker-Gating Ring Complex as Passive Spring and Ca2+-Dependent Machine for a Voltage- and Ca2+-Activated Potassium Channel. Neuron, 2004, 42, 745-756.	3.8	162
2040	BK Channels. Neuron, 2004, 42, 699-701.	3.8	0
2041	KCNE1 Binds to the KCNQ1 Pore to Regulate Potassium Channel Activity. Neuron, 2004, 42, 927-937.	3.8	133
2042	Sites in the fourth membrane-associated domain regulate alcohol sensitivity of the NMDA receptor. Neuropharmacology, 2004, 46, 647-654.	2.0	46
2043	The MinK-related peptides. Neuropharmacology, 2004, 47, 787-821.	2.0	241
2044	Molecular physiology and modulation of somatodendritic A-type potassium channels. Molecular and Cellular Neurosciences, 2004, 27, 343-369.	1.0	262

#	Article	IF	CITATIONS
2045	A Mutant KcsA K+ Channel with Altered Conduction Properties and Selectivity Filter Ion Distribution. Journal of Molecular Biology, 2004, 338, 839-846.	2.0	117
2046	Electrostatics of Ion Stabilization in a CIC Chloride Channel Homologue from Escherichia coli. Journal of Molecular Biology, 2004, 339, 981-1000.	2.0	111
2047	An Evolutionarily Conserved Network of Amino Acids Mediates Gating in Voltage-dependent Potassium Channels. Journal of Molecular Biology, 2004, 340, 307-318.	2.0	59
2048	Structural Determinants of Proton Blockage in Aquaporins. Journal of Molecular Biology, 2004, 343, 493-510.	2.0	105
2049	Localization of Voltage-Gated Ion Channels IN Mammalian Brain. Annual Review of Physiology, 2004, 66, 477-519.	5.6	423
2050	Molecular Architecture of the KvAP Voltage-Dependent K+ Channel in a Lipid Bilayer. Science, 2004, 306, 491-495.	6.0	219
2051	The functional dyad of scorpion toxin Pi1 is not itself a prerequisite for toxin binding to the voltage-gated Kv1.2 potassium channels. Biochemical Journal, 2004, 377, 25-36.	1.7	74
2052	High-throughput technologies for studying potassium channels – progresses and challenges. Drug Discovery Today: TARGETS, 2004, 3, 32-38.	0.5	7
2053	A Gating Hinge in Na+ Channels. Neuron, 2004, 41, 859-865.	3.8	134
2054	Structural basis for ion conduction and gating in CIC chloride channels. FEBS Letters, 2004, 564, 229-233.	1.3	54
2055	Structure of cation channels, revealed by single particle electron microscopy. FEBS Letters, 2004, 564, 251-256.	1.3	11
2056	Computer simulation of the KvAP voltage-gated potassium channel: steered molecular dynamics of the voltage sensor. FEBS Letters, 2004, 564, 325-332.	1.3	49
2057	Critical assessment of a proposed model of Shaker. FEBS Letters, 2004, 564, 257-263.	1.3	35
2058	Mechanism of Rectification in Inward-Rectifier K+ Channels. Annual Review of Physiology, 2004, 66, 103-129.	5.6	179
2059	Molecular Properties of Ion Channels. , 2004, , 141-160.		0
2060	Functional engineered channels and pores (Review). Molecular Membrane Biology, 2004, 21, 209-220.	2.0	182
2061	Kv channel S6 helix as a molecular switch: simulation studies. IET Nanobiotechnology, 2004, 151, 17.	2.1	17
2062	Ab initio QM/MM molecular dynamics simulation of preferential K+ solvation in aqueous ammonia solution. Physical Chemistry Chemical Physics, 2004, 6, 411.	1.3	13

#	Article	IF	CITATIONS
2063	Phylogeny as a guide to structure and function of membrane transport proteins (Review). Molecular Membrane Biology, 2004, 21, 171-181.	2.0	157
2064	The VGL-Chanome: A Protein Superfamily Specialized for Electrical Signaling and Ionic Homeostasis. Science Signaling, 2004, 2004, re15-re15.	1.6	341
2065	Structure and Function of the Glycine Receptor and Related Nicotinicoid Receptors. Journal of Biological Chemistry, 2004, 279, 19383-19386.	1.6	72
2066	Gating Gramicidin Channels in Lipid Bilayers: Reaction Coordinates and the Mechanism of Dissociation. Biophysical Journal, 2004, 86, 92-104.	0.2	47
2067	Mechanism of Anionic Conduction across ClC. Biophysical Journal, 2004, 86, 836-845.	0.2	84
2068	Conduction Mechanisms of Chloride Ions in ClC-Type Channels. Biophysical Journal, 2004, 86, 846-860.	0.2	71
2069	Ionic Permeation and Conduction Properties of Neuronal KCNQ2/KCNQ3 Potassium Channels. Biophysical Journal, 2004, 86, 1454-1469.	0.2	38
2070	Concerted Gating Mechanism Underlying KATP Channel Inhibition by ATP. Biophysical Journal, 2004, 86, 2101-2112.	0.2	32
2071	Functional Influence of the Pore Helix Glutamate in the KcsA K+ Channel. Biophysical Journal, 2004, 86, 2137-2144.	0.2	23
2072	Voltage sensing in ion channels: a 50-year-old mystery resolved?. Lancet, The, 2004, 363, 1221-1223.	6.3	10
2073	Effects of trypsin on large-conductance Ca2+-activated K+ channels of guinea-pig outer hair cells. Hearing Research, 2004, 190, 115-127.	0.9	12
2074	On the Importance of Atomic Fluctuations, Protein Flexibility, and Solvent in Ion Permeation. Journal of General Physiology, 2004, 124, 679-690.	0.9	141
2075	Bridging Natural Nano-Tubes with Designed Nanotubes. , 2004, , 161-174.		0
2076	Toward Linking Structure With Function in ATP-Sensitive K+ Channels. Diabetes, 2004, 53, S104-S112.	0.3	93
2077	Activation kinetics of T-type calcium channel by a path probability approximation. NeuroReport, 2004, 15, 1451-1455.	0.6	2
2078	Compared to Synthetic Polymers, Proteins Are Awesome. Journal of the Chinese Chemical Society, 2004, 51, 1051-1057.	0.8	1
2079	Characterization of Inward-Rectifier K+Channel Inhibition by Antiarrhythmic Piperazineâ€. Biochemistry, 2004, 43, 15577-15583.	1.2	4
2080	Assembly, Maturation, and Turnover of KATP Channel Subunits. Journal of Biological Chemistry, 2004, 279, 9080-9090.	1.6	67

#	Article	IF	CITATIONS
2081	Molecular and functional insights into voltage-gated calcium channels. Advances in Molecular and Cell Biology, 2004, 32, 381-406.	0.1	0
2082	A Two-Holed Story: Structural Secrets About ClC Proteins Become Unraveled?. Physiology, 2004, 19, 293-299.	1.6	9
2083	An improved non-linear thermodynamic model of voltage-dependent ionic currents. NeuroReport, 2004, 15, 1953-1957.	0.6	2
2084	Cobatoxin 1 from Centruroides noxius scorpion venom: chemical synthesis, three-dimensional structure in solution, pharmacology and docking on K+ channels. Biochemical Journal, 2004, 377, 37-49.	1.7	53
2085	Structural elements involved in activation of the γ-aminobutyric acid type A (GABAA) receptor. Biochemical Society Transactions, 2004, 32, 540-546.	1.6	50
2088	From Penicillin to the Ribosome: Revolutions in the Determination and Use of Molecular Structure in Chemistry and Biology. Australian Journal of Chemistry, 2004, 57, 829.	0.5	2
2089	Towards a natural history of calcium-activated potassium channels. Advances in Molecular and Cell Biology, 2004, , 51-71.	0.1	2
2092	Structure-Function Relationships in Sugar-Specific Porins. , 2005, , 169-181.		0
2094	Acid-Sensing Ion Channels. , 2005, , 57-72.		0
2096	Ca 2+ signalling, voltage-gated Ca 2+ channels and praziquantel in flatworm neuromusculature. Parasitology, 2005, 131, S97.	0.7	52
2097	Novel Insights Into Protein Structure and Dynamics Utilizing the Red Edge Excitation Shift Approach. , 2005, , 199-222.		30
2098	Two-Pore Domain Potassium Channels. Regional Anesthesia and Pain Medicine, 2005, 30, 261-274.	1.1	1
2100	Elastic Cycles as Flexible Hosts: How Tubes Built by Cyclic Chalcogenaalkynes Individually Host Their Guests. Chemistry Letters, 2005, 34, 126-131.	0.7	29
2101	Novel Separation System of Trivalent Actinides-combined Effects of Substituted Tris(2-pyridylmethyl)amine Ligand and Hydrophobic Counter-anion. Chemistry Letters, 2005, 34, 1112-1113.	0.7	14
2102	Amino acids in the pore region of Kv1 potassium channels dictate cell-surface protein levels: a possible trafficking code in the Kv1 subfamily. Biochemical Journal, 2005, 388, 355-362.	1.7	18
2103	Bacteriophage-encoded glucosyltransferase Gtrll of Shigella flexneri: membrane topology and identification of critical residues. Biochemical Journal, 2005, 389, 137-143.	1.7	27
2104	Topology of transmembrane segments 1–4 in the human chloride/bicarbonate anion exchanger 1 (AE1) by scanning N-glycosylation mutagenesis. Biochemical Journal, 2005, 390, 137-144.	1.7	48
2105	Arabidopsis AtCNGC10 rescues potassium channel mutants of E. coli, yeast and Arabidopsis and is regulated by calcium/calmodulin and cyclic GMP in E. coli. Functional Plant Biology, 2005, 32, 643.	1.1	67

#	Article	IF	CITATIONS
2106	Diffraction, crystallography and microscopy beyond three dimensions: structural dynamics in space and time. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2005, 363, 315-329.	1.6	57
2107	A comparative tool for the validity of rate kinetics in ion channels by Onsager reciprocity theorem. Journal of Theoretical Biology, 2005, 233, 237-243.	0.8	9
2108	Membrane protein structure quality in molecular dynamics simulation. Journal of Molecular Graphics and Modelling, 2005, 24, 157-165.	1.3	58
2109	Self-organized hybrid membranes forming anionic and cationic permeation paths for the transport of biological solutes. Journal of Membrane Science, 2005, 247, 87-94.	4.1	2
2110	Separating particles according to their physical properties: Transverse drift of over-damped interacting particles through two-dimensional ratchets. Physica C: Superconductivity and Its Applications, 2005, 426-431, 147-152.	0.6	2
2111	Determination of rate kinetics in ion channels by the path probability method and Onsager reciprocity theorem. Physica A: Statistical Mechanics and Its Applications, 2005, 357, 397-414.	1.2	1
2112	The influence of aromatic residues in hydraphile spacer units: assay by ion selective electrode methods and in bacteria. Bioorganic and Medicinal Chemistry, 2005, 13, 3321-3327.	1.4	3
2113	Prokaryotic K+channels: From crystal structures to diversity. FEMS Microbiology Reviews, 2005, 29, 961-985.	3.9	97
2114	A theoretical study of potassium cation binding to prolylglycine (PG) and glycylproline (GP) dipeptide. Computational and Theoretical Chemistry, 2005, 729, 193-202.	1.5	11
2115	Preparation of novel 3H-trifluoromethyldiazirine-based photoactivatable potassium channel antagonists. Tetrahedron, 2005, 61, 11244-11252.	1.0	6
2116	Modeling of benzocaine analog interactions with the D4S6 segment of NaV4.1 voltage-gated sodium channels. Biophysical Chemistry, 2005, 113, 1-7.	1.5	7
2117	Barrier-less knock-on conduction in ion channels: peculiarity or general mechanism?. Chemical Physics, 2005, 312, 127-133.	0.9	17
2118	Memory effects in Brownian dynamics simulations of ion transport. Chemical Physics Letters, 2005, 401, 175-179.	1.2	9
2119	Ions and blockers in potassium channels: insights from free energy simulations. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2005, 1747, 109-120.	1.1	25
2120	The effect of interaction between K+ ions and gramicidin D on the lecithin membrane interfacial tension. Bioelectrochemistry, 2005, 65, 143-148.	2.4	3
2121	Protein semi-synthesis: New proteins for functional and structural studies. New Biotechnology, 2005, 22, 153-172.	2.7	63
2122	Toward a Molecular Understanding of the Structure–Function of Ryanodine Receptor Ca ²⁺ Release Channels: Perspectives From Recombinant Expression Systems. Cell Biochemistry and Biophysics, 2005, 42, 197-222.	0.9	23
2123	Constitutive Inactivation of the hKv1.5 Mutant Channel, H463C, in K ⁺ -Free Solutions at Physiological pH. Cell Biochemistry and Biophysics, 2005, 43, 221-230.	0.9	8

#	Article	IF	Citations
2124	Synergistic Inhibition of the Maximum Conductance of Kv1.5 Channels by Extracellular K ⁺ Reduction and Acidification. Cell Biochemistry and Biophysics, 2005, 43, 231-242.	0.9	12
2125	CALCIUM-ACTIVATED CHLORIDE CHANNELS. Annual Review of Physiology, 2005, 67, 719-758.	5.6	560
2126	Ion Solvation in Water from Molecular Dynamics Simulation with the ABEEM/MM Force Field. Journal of Physical Chemistry A, 2005, 109, 3517-3520.	1.1	44
2127	Pathways modulating neural KCNQ/M (Kv7) potassium channels. Nature Reviews Neuroscience, 2005, 6, 850-862.	4.9	597
2128	Structural basis of TEA blockade in a model potassium channel. Nature Structural and Molecular Biology, 2005, 12, 454-459.	3.6	128
2129	Internal structure and visualization of transmembrane domains of the RyR1 calcium release channel by cryo-EM. Nature Structural and Molecular Biology, 2005, 12, 539-544.	3.6	179
2130	MPS-1 is a K+ channel β-subunit and a serine/threonine kinase. Nature Neuroscience, 2005, 8, 1503-1509.	7.1	31
2131	Solid-state NMR in drug design and discovery for membrane-embedded targets. Nature Reviews Drug Discovery, 2005, 4, 555-568.	21.5	113
2132	Conformational changes of pore helix coupled to gating of TRPV5 by protons. EMBO Journal, 2005, 24, 3224-3234.	3.5	87
2133	Selectivity and interactions of Ba2+and Cs+with wild-type and mutant TASK1 K+channels expressed inXenopusoocytes. Journal of Physiology, 2005, 562, 687-696.	1.3	15
2134	Mutation of colocalized residues of the pore helix and transmembrane segments S5 and S6 disrupt deactivation and modify inactivation of KCNQ1 K+channels. Journal of Physiology, 2005, 563, 359-368.	1.3	54
2135	Transient outward potassium current, †Ito', phenotypes in the mammalian left ventricle: underlying molecular, cellular and biophysical mechanisms. Journal of Physiology, 2005, 569, 7-39.	1.3	168
2136	Activation of olfactory-type cyclic nucleotide-gated channels is highly cooperative. Journal of Physiology, 2005, 569, 91-102.	1.3	39
2137	Dynamic conformational changes of extracellular S5-P linkers in the hERG channel. Journal of Physiology, 2005, 569, 75-89.	1.3	51
2138	Structure and different conformational states of native AMPA receptor complexes. Nature, 2005, 433, 545-549.	13.7	247
2139	Molecular Modelling of Drug Targets: The Past, the Present and the Future. Basic and Clinical Pharmacology and Toxicology, 2005, 96, 151-155.	1.2	28
2140	The inositol 1,4,5-trisphosphate receptors. Cell Calcium, 2005, 38, 261-272.	1.1	207
2141	Are Ca2+ channels targets of praziquantel action?. International Journal for Parasitology, 2005, 35, 1-9.	1.3	149

		ITATION REPORT	
#	Article	IF	CITATIONS
2142	K2P channels and their protein partners. Current Opinion in Neurobiology, 2005, 15, 326-333.	2.0	61
2143	Use-dependent blockade of Cav2.2 voltage-gated calcium channels for neuropathic pain. Biochemica Pharmacology, 2005, 70, 489-499.	al 2.0	81
2144	Inhibitory modulation of ATP-sensitive potassium channels by gallate-ester moiety of (â^')-epigallocatechin-3-gallate. Biochemical Pharmacology, 2005, 70, 1560-1567.	2.0	23
2145	Predictive in silico modeling for hERG channel blockers. Drug Discovery Today, 2005, 10, 149-155.	3.2	274
2146	A Gate in the Selectivity Filter of Potassium Channels. Structure, 2005, 13, 591-600.	1.6	190
2147	The α Helix Dipole: Screened Out?. Structure, 2005, 13, 849-855.	1.6	89
2148	The Pore Structure of the Closed RyR1 Channel. Structure, 2005, 13, 1203-1211.	1.6	142
2149	Two Different Conformational States of the KirBac3.1 Potassium Channel Revealed by Electron Crystallography. Structure, 2005, 13, 1463-1472.	1.6	100
2150	One Channel: Open and Closed. Structure, 2005, 13, 1398-1400.	1.6	6
2151	The voltage-sensor structure in a voltage-gated channel. Trends in Biochemical Sciences, 2005, 30, 166-168.	3.7	53
2152	Axonal excitability revisited. Progress in Biophysics and Molecular Biology, 2005, 88, 59-90.	1.4	54
2153	Molecular dynamics simulations of proteins in lipid bilayers. Current Opinion in Structural Biology, 2005, 15, 423-431.	2.6	180
2154	Contributions of Lipid Bilayer Hosts to Structure and Activity of Multifunctional Supramolecular Guests. Chemistry and Biodiversity, 2005, 2, 717-729.	1.0	18
2155	Elevation of intracellular Ca2+ modulates A-currents in rat cerebellar granule neurons. Journal of Neuroscience Research, 2005, 81, 530-540.	1.3	11
2156	QT prolongation through hERG K+ channel blockade: Current knowledge and strategies for the early prediction during drug development. Medicinal Research Reviews, 2005, 25, 133-166.	5.0	258
2157	Electrogenic Glutamate Transporters in the CNS: Molecular Mechanism, Pre-steady-state Kinetics, an their Impact on Synaptic Signaling. Journal of Membrane Biology, 2005, 203, 1-20.	ıd 1.0	136
2158	Determinant Role of Membrane Helices in KATP Channel Gating. Journal of Membrane Biology, 2005, 204, 1-10.	, 1.0	4
2159	A Role for the 2′ Residue in the Second Transmembrane Helix of the GABAA Receptor γ2S Subuni Channel Conductance and Gating. Journal of Membrane Biology, 2005, 205, 17-28.	t in 1.0	10

#	Article	IF	Citations
2160	Interactions Between Charged Residues in the Transmembrane Segments of the Voltage-sensing Domain in the hERG Channel. Journal of Membrane Biology, 2005, 207, 169-181.	1.0	48
2161	Inhibition of CIC-2 Chloride Channels by a Peptide Component or Components of Scorpion Venom. Journal of Membrane Biology, 2005, 208, 65-76.	1.0	15
2162	Site-Specific Evolutionary Rate Inference: Taking Phylogenetic Uncertainty into Account. Journal of Molecular Evolution, 2005, 60, 345-353.	0.8	34
2163	Influence of protein flexibility on the electrostatic energy landscape in gramicidin A. European Biophysics Journal, 2005, 34, 208-216.	1.2	17
2164	Test of molecular dynamics force fields in gramicidin A. European Biophysics Journal, 2005, 34, 377-382.	1.2	15
2165	Mutation of the pore glutamate affects both cytoplasmic and external dequalinium block in the rat olfactory CNGA2 channel. European Biophysics Journal, 2005, 34, 442-453.	1.2	3
2166	The EBSA prize lecture. European Biophysics Journal, 2005, 34, 515-530.	1.2	50
2167	Mechanism-based targeting of NMDA receptor functions. Cellular and Molecular Life Sciences, 2005, 62, 2100-2111.	2.4	19
2168	Comparative study of azobenzene and stilbene bridged crown ether p-tert-butylcalix[4]arene. Tetrahedron, 2005, 61, 1317-1324.	1.0	21
2169	K+-dependent stability and ion conduction of Shab K+ channels: a comparison with Shaker channels. Pflugers Archiv European Journal of Physiology, 2005, 450, 255-261.	1.3	10
2170	In the yeast potassium channel, Tok1p, the external ring of aspartate residues modulates both gating and conductance*. Pflugers Archiv European Journal of Physiology, 2005, 451, 362-370.	1.3	6
2171	Homo- and heteromeric assembly of TRP channel subunits. Pflugers Archiv European Journal of Physiology, 2005, 451, 35-42.	1.3	124
2172	Differential expression of K+ channels between guard cells and subsidiary cells within the maize stomatal complex. Planta, 2005, 222, 968-976.	1.6	47
2173	Ion channels and D-amino acids. Journal of Biosciences, 2005, 30, 147-149.	0.5	32
2174	The Use of Synthetic Nanometer Pores for Modeling the Conduction Block of Cation-Selective Channels of Cell Membranes by Ruthenium Red. Doklady Biochemistry and Biophysics, 2005, 405, 454-457.	0.3	1
2175	The Mechanism of Allosteric Interaction of Cytoplasmic and Extracellular Cl- in the Glial Glycine Transporter (hGlyTlb). Doklady Biological Sciences, 2005, 402, 163-166.	0.2	1
2176	Unusual twinning in an acetyl coenzyme A synthetase (ADP-forming) fromPyrococcus furiosus. Acta Crystallographica Section D: Biological Crystallography, 2005, 61, 350-354.	2.5	5
2177	Structural organization and interactions of transmembrane domains in tetraspanin proteins. BMC Structural Biology, 2005, 5, 11.	2.3	97

#	Article	IF	CITATIONS
2178	Computational identification of residues that modulate voltage sensitivity of voltage-gated potassium channels. , 2005, 5, 16.		10
2179	Cooperative effects in hydrogen-bonding of protein secondary structure elements: A systematic analysis of crystal data using Secbase. Proteins: Structure, Function and Bioinformatics, 2005, 61, 310-317.	1.5	45
2180	Recent developments in structural proteomics for protein structure determination. Proteomics, 2005, 5, 2056-2068.	1.3	63
2181	Channel Function in Mammalian Axons and Support Cells. , 2005, , 95-112.		3
2182	Channels and Pumps Early in Evolution. , 2005, , 1-10.		2
2184	Molecular and Cellular Basis of Cardiac Electrophysiology. , 2005, , 1-31.		1
2186	Compounds acting on ion channels. , 2005, , 141-145.		0
2187	Investigating the Modular Basis of BK Channel Activation by Calcium. , 2005, , 79-91.		0
2188	Ion Channels. , 2005, , 465-486.		0
2189	Molecular Diversity and Regulation of Renal Potassium Channels. Physiological Reviews, 2005, 85, 319-371.	13.1	284
2190	Organic Cation Permeation through the Channel Formed by Polycystin-2. Journal of Biological Chemistry, 2005, 280, 29488-29493.	1.6	46
2191	Two Stable, Conducting Conformations of the Selectivity Filter in Shaker K+ Channels. Journal of General Physiology, 2005, 125, 619-629.	0.9	7
2192	ATP-Sensitive Potassium Channels. Current Pharmaceutical Design, 2005, 11, 1915-1940.	0.9	103
2194	Mechanism of Local Anesthetic Drug Action on Voltage-Gated Sodium Channels. Current Pharmaceutical Design, 2005, 11, 2671-2686.	0.9	171
2195	Insulin Secretagogues, Sulfonylurea Receptors and KATP Channels. Current Pharmaceutical Design, 2005, 11, 2699-2716.	0.9	118
2196	N type rapid inactivation in human Kv1.4 channels: functional role of a putative C-terminal helix. Molecular Membrane Biology, 2005, 22, 389-400.	2.0	5
2197	Knowledge-Driven Lead Discovery. Mini-Reviews in Medicinal Chemistry, 2005, 5, 1045-1052.	1.1	7
2198	Redesigning an integral membrane K+ channel into a soluble protein. Protein Engineering, Design and Selection, 2005, 18, 79-84.	1.0	9

#	Article	IF	CITATIONS
2199	All Four Putative Selectivity Filter Glycine Residues in KtrB Are Essential for High Affinity and Selective K+ Uptake by the KtrAB System from Vibrio alginolyticus. Journal of Biological Chemistry, 2005, 280, 41146-41154.	1.6	71
2200	The New Anticonvulsant Retigabine Favors Voltage-Dependent Opening of the Kv7.2 (KCNQ2) Channel by Binding to Its Activation Gate. Molecular Pharmacology, 2005, 67, 1009-1017.	1.0	249
2201	The Selectivity Filter of the Cation Channel TRPM4. Journal of Biological Chemistry, 2005, 280, 22899-22906.	1.6	120
2202	Electrostatics in the Cytoplasmic Pore Produce Intrinsic Inward Rectification in Kir2.1 Channels. Journal of General Physiology, 2005, 126, 551-562.	0.9	17
2203	Structure and Anticipatory Movements of the S6 Gate in K v Channels. Journal of General Physiology, 2005, 126, 413-417.	0.9	12
2204	Investigating the Putative Glycine Hinge in Shaker Potassium Channel. Journal of General Physiology, 2005, 126, 213-226.	0.9	83
2205	Conduction through the Inward Rectifier Potassium Channel, Kir2.1, Is Increased by Negatively Charged Extracellular Residues. Journal of General Physiology, 2005, 125, 493-503.	0.9	20
2206	An Inactivation Stabilizer of the Na+ Channel Acts as an Opportunistic Pore Blocker Modulated by External Na+. Journal of General Physiology, 2005, 125, 465-481.	0.9	21
2207	Molecular Determinants of KCNQ (Kv7) K+ Channel Sensitivity to the Anticonvulsant Retigabine. Journal of Neuroscience, 2005, 25, 5051-5060.	1.7	235
2208	The Origin of Subconductance Levels in Voltage-gated K+ Channels. Journal of General Physiology, 2005, 126, 83-86.	0.9	7
2209	Crystal structure of the archaeal ammonium transporter Amt-1 from Archaeoglobus fulgidus. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 14994-14999.	3.3	201
2211	An Arginine Residue in the Pore Region Is a Key Determinant of Chloride Dependence in Cardiac Pacemaker Channels. Journal of Biological Chemistry, 2005, 280, 13694-13700.	1.6	22
2212	How ion channels sense membrane potential. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 4929-4930.	3.3	16
2213	Side Chain Orientation of Residues Lining the Selectivity Filter of Epithelial Na+ Channels. Journal of Biological Chemistry, 2005, 280, 8513-8522.	1.6	30
2214	Regulation by External K+ in a Maize Inward Shaker Channel Targets Transport Activity in the High Concentration Range. Plant Cell, 2005, 17, 1532-1548.	3.1	33
2215	Transmembrane glycine zippers: Physiological and pathological roles in membrane proteins. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 14278-14283.	3.3	240
2216	Activation-coupled inactivation in the bacterial potassium channel KcsA. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 17630-17635.	3.3	70
2217	TPK1 Is a Vacuolar Ion Channel Different from the Slow-Vacuolar Cation Channel. Plant Physiology, 2005, 139, 417-424.	2.3	76

#	Article	IF	CITATIONS
2218	Functional Architecture of the Inner Pore of a Voltage-gated Ca2+ Channel. Journal of General Physiology, 2005, 126, 193-204.	0.9	43
2219	A Phenylalanine Clamp Catalyzes Protein Translocation Through the Anthrax Toxin Pore. Science, 2005, 309, 777-781.	6.0	270
2220	Localization of the Activation Gate of a Voltage-gated Ca2+ Channel. Journal of General Physiology, 2005, 126, 205-212.	0.9	34
2221	Optical detection of rate-determining ion-modulated conformational changes of the ether-a-go-go K+ channel voltage sensor. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 18718-18723.	3.3	41
2222	Detection and Identification of Stable Oligomeric Protein Complexes in Escherichi coli Inner Membranes. Journal of Biological Chemistry, 2005, 280, 28742-28748.	1.6	24
2223	Status of the Intracellular Gate in the Activated-not-open State of Shaker K+ Channels. Journal of General Physiology, 2005, 126, 419-428.	0.9	57
2224	ConSurf 2005: the projection of evolutionary conservation scores of residues on protein structures. Nucleic Acids Research, 2005, 33, W299-W302.	6.5	1,255
2225	Identification of a Novel Pharmacophore for Peptide Toxins Interacting with K+ Channels. Journal of Biological Chemistry, 2005, 280, 21246-21255.	1.6	31
2226	A Single Residue in the S6 Transmembrane Domain Governs the Differential Flecainide Sensitivity of Voltage-Gated Potassium Channels. Molecular Pharmacology, 2005, 68, 305-316.	1.0	18
2227	Activating Mutations in Kir6.2 and Neonatal Diabetes: New Clinical Syndromes, New Scientific Insights, and New Therapy. Diabetes, 2005, 54, 2503-2513.	0.3	399
2228	The Design and Docking of Virtual Compound Libraries to Structures of Drug Targets. Current Computer-Aided Drug Design, 2005, 1, 103-127.	0.8	22
2229	Viral Membrane Proteins: Structure, Function, and Drug Design. , 2005, , .		9
2230	NMR Techniques for Identifying the Interface of a Larger Protein–Protein Complex: Cross-Saturation and Transferred Cross-Saturation Experiments. Methods in Enzymology, 2005, 394, 483-506.	0.4	50
2231	Dynamic Membrane Topology of the Escherichia coli β-Glucoside Transporter BglF. Journal of Biological Chemistry, 2005, 280, 19306-19318.	1.6	17
2232	Cardiac pacemaker /fcurrent and its inhibition by heart rate-reducing agents. Current Medical Research and Opinion, 2005, 21, 1115-1122.	0.9	65
2233	Phylogeny of Na+/Ca2+ exchanger (NCX) genes from genomic data identifies new gene duplications and a new family member in fish species. Physiological Genomics, 2005, 21, 161-173.	1.0	29
2234	Homology Models of the Tetramerization Domain of Six Eukaryotic Voltage-gated Potassium Channels Kv1.1-Kv1.6. Journal of Biomolecular Structure and Dynamics, 2005, 22, 387-398.	2.0	7
2235	Permeation of particle through a four-helix-bundle model channel. Journal of Chemical Physics, 2005, 122, 104703.	1.2	0

#	Article	IF	CITATIONS
2236	An approximate but fast method to impose flexible distance constraints in molecular dynamics simulations. Journal of Chemical Physics, 2005, 122, 144106.	1.2	15
2237	Targeted molecular dynamics of an open-state KcsA channel. Journal of Chemical Physics, 2005, 122, 134707.	1.2	34
2238	On soliton propagation in biomembranes and nerves. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 9790-9795.	3.3	449
2239	Researching on Selectivity Mechanism of Potassium Channel to Monovalent Cations in Signal Transduction. , 2005, 2005, 1182-4.		0
2240	Conductance of Ion Channels and Nanopores with Charged Walls: A Toy Model. Physical Review Letters, 2005, 95, 148101.	2.9	48
2241	Physics of Size Selectivity. Physical Review Letters, 2005, 95, 247801.	2.9	56
2242	Potassium Channels. IEEE Transactions on Nanobioscience, 2005, 4, 21-33.	2.2	19
2243	Non-Michaelis-Menten kinetics model for conductance of low-conductance potassium ion channels. Physical Review E, 2005, 71, 021912.	0.8	4
2244	Structure and Function of Bacterial Super-Biosystem Responsible for Import and Depolymerization of Macromolecules. Bioscience, Biotechnology and Biochemistry, 2005, 69, 673-692.	0.6	21
2245	Controlling the motion of interacting particles: Homogeneous systems and binary mixtures. Chaos, 2005, 15, 026112.	1.0	23
2246	Permeation and gating in proteins: Kinetic Monte Carlo reaction path following. Journal of Chemical Physics, 2005, 122, 214901.	1.2	8
2247	Analysis of K+/Na+selectivity of KcsA potassium channel with reference interaction site model theory. Molecular Physics, 2005, 103, 191-201.	0.8	2
2248	Human Ether-a-go-go Related Gene (HERG): A Chemist's Perspective. Progress in Medicinal Chemistry, 2005, 43, 1-18.	4.1	24
2249	Structural Basis for Competition between Drug Binding and Kvβ1.3 Accessory Subunit-Induced N-Type Inactivation of Kv1.5 Channels. Molecular Pharmacology, 2005, 68, 995-1005.	1.0	28
2250	The NH2 Terminus of RCK1 Domain Regulates Ca2+-dependent BKCa Channel Gating. Journal of General Physiology, 2005, 126, 227-241.	0.9	34
2251	Probing the Geometry of the Inner Vestibule of BK Channels with Sugars. Journal of General Physiology, 2005, 126, 105-121.	0.9	47
2252	The Gln4863Ala Mutation within a Putative, Pore-Lining Trans-Membrane Helix of the Cardiac Ryanodine Receptor Channel Alters Both the Kinetics of Ryanoid Interaction and the Subsequent Fractional Conductance. Molecular Pharmacology, 2005, 68, 840-846.	1.0	8
2253	K Channel Subconductance Levels Result from Heteromeric Pore Conformations. Journal of General Physiology, 2005, 126, 87-103.	0.9	57

#	Article	IF	CITATIONS
2254	Essential Role of a Ca 2+ -Selective, Store-Operated Current (I SOC) in Endothelial Cell Permeability. Circulation Research, 2005, 96, 856-863.	2.0	71
2255	Coupling of Voltage Sensing to Channel Opening Reflects Intrasubunit Interactions in Kv Channels. Journal of General Physiology, 2005, 125, 71-80.	0.9	15
2256	Intracellular K+ Is Required for the Inactivation-Induced High-Affinity Binding of Cisapride to HERG Channels. Molecular Pharmacology, 2005, 68, 855-865.	1.0	18
2257	Gating of acetylcholine receptor channels: Brownian motion across a broad transition state. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 1408-1412.	3.3	92
2258	Molecular Basis of Inward Rectification: Structural Features of the Blocker Defined by Extended Polyamine Analogs. Molecular Pharmacology, 2005, 68, 298-304.	1.0	19
2259	Determination of the Functional Unit of the Cystic Fibrosis Transmembrane Conductance Regulator Chloride Channel. Journal of Biological Chemistry, 2005, 280, 458-468.	1.6	26
2260	Chimeric Mutations in the M2 Segment of the 5-Hydroxytryptamine-gated Chloride Channel MOD-1 Define a Minimal Determinant of Anion/Cation Permeability. Journal of Biological Chemistry, 2005, 280, 27502-27507.	1.6	15
2261	Novel Mutation in the Per-Arnt-Sim Domain of KCNH2 Causes a Malignant Form of Long-QT Syndrome. Circulation, 2005, 111, 961-968.	1.6	40
2262	The Origin and Early Evolution of Membrane Channels. Astrobiology, 2005, 5, 1-17.	1.5	47
2263	Gramicidin Channels. IEEE Transactions on Nanobioscience, 2005, 4, 10-20.	2.2	115
2263 2264	Gramicidin Channels. IEEE Transactions on Nanobioscience, 2005, 4, 10-20. Adaptive Controlled Brownian Dynamics Approach for Permeation in Bio-Nanotubes. , 0, , .	2.2	115 O
		2.2	
2264	Adaptive Controlled Brownian Dynamics Approach for Permeation in Bio-Nanotubes. , 0, , .	2.2	0
2264 2265	Adaptive Controlled Brownian Dynamics Approach for Permeation in Bio-Nanotubes. , 0, , . A leaf cell consists of several metabolic compartments. , 2005, , 1-43. Characterization of Bacterial Drug Antiporters Homologous to Mammalian Neurotransmitter		0
2264 2265 2266	Adaptive Controlled Brownian Dynamics Approach for Permeation in Bio-Nanotubes. , 0, , . A leaf cell consists of several metabolic compartments. , 2005, , 1-43. Characterization of Bacterial Drug Antiporters Homologous to Mammalian Neurotransmitter Transporters. Journal of Bacteriology, 2005, 187, 7518-7525. The 2-Hydroxycarboxylate Transporter Family: Physiology, Structure, and Mechanism. Microbiology	1.0	0 1 18
2264 2265 2266 2268	Adaptive Controlled Brownian Dynamics Approach for Permeation in Bio-Nanotubes. , 0, , . A leaf cell consists of several metabolic compartments. , 2005, , 1-43. Characterization of Bacterial Drug Antiporters Homologous to Mammalian Neurotransmitter Transporters. Journal of Bacteriology, 2005, 187, 7518-7525. The 2-Hydroxycarboxylate Transporter Family: Physiology, Structure, and Mechanism. Microbiology and Molecular Biology Reviews, 2005, 69, 665-695. Inherited and Acquired Vulnerability to Ventricular Arrhythmias: Cardiac Na+ and K+ Channels.	1.0	0 1 18 59
2264 2265 2266 2268 2269	Adaptive Controlled Brownian Dynamics Approach for Permeation in Bio-Nanotubes. , 0, , . A leaf cell consists of several metabolic compartments. , 2005, , 1-43. Characterization of Bacterial Drug Antiporters Homologous to Mammalian Neurotransmitter Transporters. Journal of Bacteriology, 2005, 187, 7518-7525. The 2-Hydroxycarboxylate Transporter Family: Physiology, Structure, and Mechanism. Microbiology and Molecular Biology Reviews, 2005, 69, 665-695. Inherited and Acquired Vulnerability to Ventricular Arrhythmias: Cardiac Na+ and K+ Channels. Physiological Reviews, 2005, 85, 33-47.	1.0 2.9 13.1	0 1 18 59 92

#	Article	IF	CITATIONS
2273	Molecular Compatibility of the Channel Gate and the N Terminus of S5 Segment for Voltage-gated Channel Activity. Journal of Biological Chemistry, 2005, 280, 18253-18264.	1.6	13
2274	Generation, characterization, and molecular cloning of the <i>Noerg-1</i> mutation of rhodopsin in the mouse. Visual Neuroscience, 2005, 22, 619-629.	0.5	21
2275	Secondary Structure and Gating Rearrangements of Transmembrane Segments in Rat P2X4 Receptor Channels. Journal of General Physiology, 2005, 125, 347-359.	0.9	65
2276	Evidence for Sequential Ion-binding Loci along the Inner Pore of the IRK1 Inward-rectifier K+ Channel. Journal of General Physiology, 2005, 126, 123-135.	0.9	27
2277	Functional Role and Affinity of Inorganic Cations in Stabilizing the Tetrameric Structure of the KcsA K+ Channel. Journal of General Physiology, 2005, 126, 271-283.	0.9	35
2278	Long Polyamines Act as Cofactors in PIP2 Activation of Inward Rectifier Potassium (Kir2.1) Channels. Journal of General Physiology, 2005, 126, 541-549.	0.9	37
2279	Semimicroscopic Modeling of Permeation Energetics in Ion Channels. IEEE Transactions on Nanobioscience, 2005, 4, 94-101.	2.2	5
2280	Molecular Modeling of Local Anesthetic Drug Binding by Voltage-Gated Sodium Channels. Molecular Pharmacology, 2005, 68, 1611-1622.	1.0	167
2281	Divalent Cation Sensitivity of BK Channel Activation Supports the Existence of Three Distinct Binding Sites. Journal of General Physiology, 2005, 125, 273-286.	0.9	137
2282	Extracellular Acid Block and Acid-enhanced Inactivation of the Ca2+-activated Cation Channel TRPM5 Involve Residues in the S3-S4 and S5-S6 Extracellular Domains. Journal of Biological Chemistry, 2005, 280, 20691-20699.	1.6	53
2283	Modelling of short QT syndrome in a heterogeneous model of the human ventricular wall. Europace, 2005, 7, S105-S117.	0.7	38
2284	Staurosporine Inhibits Voltage-Dependent K+ Current Through a PKC-Independent Mechanism in Isolated Coronary Arterial Smooth Muscle Cells. Journal of Cardiovascular Pharmacology, 2005, 45, 260-269.	0.8	31
2285	CAMPO, SCR_FIND and CHC_FIND: a suite of web tools for computational structural biology. Nucleic Acids Research, 2005, 33, W50-W55.	6.5	22
2286	Principles of Selective Ion Transport in Channels and Pumps. Science, 2005, 310, 1461-1465.	6.0	853
2287	Ion Conduction and Selectivity in K+ Channels. Annual Review of Biophysics and Biomolecular Structure, 2005, 34, 153-171.	18.3	167
2288	The C-and N-terminal residues of synthetic heptapeptide ion channels influence transport efficacy through phospholipid bilayers. New Journal of Chemistry, 2005, 29, 291.	1.4	51
2289	OPTICAL IMAGING AND CONTROL OF GENETICALLY DESIGNATED NEURONS IN FUNCTIONING CIRCUITS. Annual Review of Neuroscience, 2005, 28, 533-563.	5.0	132
2290	Crystal Structure of a Mammalian Voltage-Dependent Shaker Family K+ Channel. Science, 2005, 309, 897-903.	6.0	2,042

#	Article	IF	CITATIONS
2291	Structure of the Rotor Ring of F-Type Na+-ATPase from Ilyobacter tartaricus. Science, 2005, 308, 659-662.	6.0	369
2292	Deletions in L-type calcium channel α1 subunit testicular transcripts correlate with testicular cadmium and apoptosis in infertile men with varicoceles. Fertility and Sterility, 2005, 83, 622-634.	0.5	33
2293	Drugs effects on ventricular repolarization: A critical evaluation of the strengths and weaknesses of current methodologies and regulatory practices. Journal of Pharmacological and Toxicological Methods, 2005, 52, 12-21.	0.3	37
2294	Ion channels in smooth muscle: regulators of intracellular calcium and contractility. Canadian Journal of Physiology and Pharmacology, 2005, 83, 215-242.	0.7	165
2295	Brownian Dynamics Simulation for Modeling Ion Permeation Across Bionanotubes. IEEE Transactions on Nanobioscience, 2005, 4, 102-111.	2.2	11
2296	Reviews in Fluorescence 2005. Reviews in Fluorescence, 2005, , .	0.5	7
2297	Molecular Dynamics Simulation Approaches to K Channels: Conformational Flexibility and Physiological Function. IEEE Transactions on Nanobioscience, 2005, 4, 112-120.	2.2	20
2298	NMR and ion selective electrode studies of hydraphile channels correlate with biological activity in E. coli and B. subtilis. Chemical Communications, 2005, , 89.	2.2	36
2299	Structure and medium effects on hydraphile synthetic ion channel toxicity to the bacterium E. coli. New Journal of Chemistry, 2005, 29, 205.	1.4	22
2300	Synthetic ion channels: Functional analysis and structural studies. Physical Chemistry Chemical Physics, 2005, 7, 1501.	1.3	20
2301	Three computational methods for studying permeation, selectivity and dynamics in biological ion channels. Soft Matter, 2005, 1, 417.	1.2	29
2302	Protein sequence entropy is closely related to packing density and hydrophobicity. Protein Engineering, Design and Selection, 2005, 18, 59-64.	1.0	64
2303	Modeling Voltage-gated KcsA Ion Channels as Solid-State Nanodevices. , 0, , .		0
2304	Interacting particles on a rocked ratchet: Rectification by condensation. Physical Review E, 2005, 71, 011107.	0.8	42
2305	Topological Equilibria of Ion Channel Peptides in Oriented Lipid Bilayers Revealed by 15N Solid-State NMR Spectroscopy. Biochemistry, 2005, 44, 12120-12127.	1.2	15
2306	An Accurate and Efficient Empirical Approach for Calculating the Dielectric Self-Energy and Ionâ^'Ion Pair Potential in Continuum Models of Biological Ion Channels. Journal of Physical Chemistry B, 2005, 109, 488-498.	1.2	35
2307	Unfolding and Refolding in Vitro of a Tetrameric, α-Helical Membrane Protein: The Prokaryotic Potassium Channel KcsAâ€. Biochemistry, 2005, 44, 14344-14352.	1.2	60
2308	Functional Reconstitution of Protein Ion Channels into Planar Polymerizable Phospholipid Membranes. Nano Letters, 2005, 5, 1181-1185.	4.5	45

#	Article	IF	CITATIONS
2309	Separating particles according to their physical properties: Transverse drift of underdamped and overdamped interacting particles diffusing through two-dimensional ratchets. Physical Review B, 2005, 71, .	1.1	56
2310	Through the Channel and around the Channel:Â Validating and Comparing Microscopic Approaches for the Evaluation of Free Energy Profiles for Ion Penetration through Ion Channels. Journal of Physical Chemistry B, 2005, 109, 19516-19522.	1.2	44
2311	Direct Introduction of Single Protein Channels and Pores into Lipid Bilayers. Journal of the American Chemical Society, 2005, 127, 6502-6503.	6.6	56
2312	Electrostatic Recognition and Induced Fit in the κ-PVIIA Toxin Binding toShakerPotassium Channel. Journal of the American Chemical Society, 2005, 127, 6836-6849.	6.6	45
2313	Expression and Characterization of a Four-α-Helix Bundle Protein That Binds the Volatile General Anesthetic Halothane. Biomacromolecules, 2005, 6, 1516-1523.	2.6	12
2314	Selectivity Filter Residues Contribute Unequally to Pore Stabilization in Voltage-Gated Sodium Channelsâ€. Biochemistry, 2005, 44, 13874-13882.	1.2	25
2315	Ion Solvation by Channel Carbonyls Characterized by 17O Solid-State NMR at 21 T. Journal of the American Chemical Society, 2005, 127, 11922-11923.	6.6	56
2316	Cation Dependence of Chloride Ion Complexation by Open-Chained Receptor Molecules in Chloroform Solution. Journal of the American Chemical Society, 2005, 127, 18281-18295.	6.6	32
2317	Structure, Assembly, and Topology of the G185R Mutant of the Fourth Transmembrane Domain of Divalent Metal Transporter. Journal of the American Chemical Society, 2005, 127, 1414-1423.	6.6	18
2318	Calcium Absorption Across Epithelia. Physiological Reviews, 2005, 85, 373-422.	13.1	746
2319	(De)constructing the Ryanodine Receptor:Â Modeling Ion Permeation and Selectivity of the Calcium Release Channel. Journal of Physical Chemistry B, 2005, 109, 15598-15610.	1.2	121
2320	Effects of Deglycosylation of Sodium Channels on Their Structure and Function. Biochemistry, 2005, 44, 441-449.	1.2	44
2321	Solvation Dynamics of Li+and Cl-Ions in Liquid Methanol. Journal of Physical Chemistry B, 2005, 109, 7475-7481.	1.2	30
2322	Conformation-Dependent Swinging of the Matrix Loop m2 of the MitochondrialSaccharomyces cerevisiaeADP/ATP Carrierâ€. Biochemistry, 2005, 44, 16310-16320.	1.2	24
2323	Blocking Effect and Crystal Structure of Natrin Toxin, a Cysteine-Rich Secretory Protein from Naja atra Venom that Targets the BKCa Channel,. Biochemistry, 2005, 44, 10145-10152.	1.2	99
2324	A Perspective on the Slow Vacuolar Channel in Vacuoles from Higher Plant Cells. Journal of Chemical Information and Modeling, 2005, 45, 1502-1506.	2.5	16
2325	Modifications to the Tetracaine Scaffold Produce Cyclic Nucleotide-Gated Channel Blockers with Widely Varying Efficacies. Journal of Medicinal Chemistry, 2005, 48, 5805-5812.	2.9	12
2326	Rigid-Rod Molecules in Biomembrane Models:Â From Hydrogen-Bonded Chains to Synthetic Multifunctional Pores. Accounts of Chemical Research, 2005, 38, 79-87.	7.6	241

#	Article	IF	CITATIONS
2327	Conformational Dynamics of M2 Helices in KirBac Channels:Â Helix Flexibility in Relation to Gating via Molecular Dynamics Simulationsâ€. Biochemistry, 2005, 44, 14586-14594.	1.2	52
2328	Overview of Molecular Relationships in the Voltage-Gated Ion Channel Superfamily. Pharmacological Reviews, 2005, 57, 387-395.	7.1	436
2329	An Inhibitor of TRPV1 Channels Isolated from Funnel Web Spider Venomâ€. Biochemistry, 2005, 44, 15544-15549.	1.2	67
2330	Construction of a Cyclic Nucleotide-gated KcsA K+ Channel. Journal of Molecular Biology, 2005, 350, 857-865.	2.0	18
2331	Electrostatics of the Intracellular Vestibule of K+ Channels. Journal of Molecular Biology, 2005, 354, 272-288.	2.0	58
2332	Structural and mechanistic diversity of secondary transporters. Current Opinion in Microbiology, 2005, 8, 161-167.	2.3	37
2333	Structural elements governing activation and modulation of GABAA receptors. International Congress Series, 2005, 1283, 26-31.	0.2	0
2334	A model of sodium channels. Biochimica Et Biophysica Acta - Biomembranes, 2005, 1668, 106-116.	1.4	29
2335	Electrostatic basis of valence selectivity in cationic channels. Biochimica Et Biophysica Acta - Biomembranes, 2005, 1711, 72-86.	1.4	40
2336	Structural organization of gap junction channels. Biochimica Et Biophysica Acta - Biomembranes, 2005, 1711, 99-125.	1.4	204
2337	Self-association of glutamic acid-rich fusion peptide analogs of influenza hemagglutinin in the membrane-mimic environments: Effects of positional difference of glutamic acids on side chain ionization constant and intra- and inter-peptide interactions deduced from NMR and gel electrophoresis measurements. Biochimica Et Biophysica Acta - Biomembranes, 2005, 1712, 37-51.	1.4	14
2338	Computational analysis of mutations in the transmembrane region of Vpu from HIV-1. Biochimica Et Biophysica Acta - Biomembranes, 2005, 1716, 1-10.	1.4	10
2339	A novel potassium channel encoded by Ectocarpus siliculosus virus. Biochemical and Biophysical Research Communications, 2005, 326, 887-893.	1.0	11
2340	Pore-to-gate coupling of HCN channels revealed by a pore variant that contributes to gating but not permeation. Biochemical and Biophysical Research Communications, 2005, 327, 1131-1142.	1.0	18
2341	Membrane topology of the electrogenic aspartate–alanine antiporter AspT of Tetragenococcus halophilus. Biochemical and Biophysical Research Communications, 2005, 328, 20-26.	1.0	12
2342	Biophysical properties of menthol-activated cold receptor TRPM8 channels. Biochemical and Biophysical Research Communications, 2005, 333, 374-382.	1.0	40
2343	Structural basis of gating of CNG channels. FEBS Letters, 2005, 579, 1968-1972.	1.3	24
2344	Exploring blocker binding to a homology model of the open hERG K+channel using docking and molecular dynamics methods. FEBS Letters, 2005, 579, 2939-2944.	1.3	103

#	Article	IF	CITATIONS
2345	The influence of a membrane environment on the structure and stability of a prokaryotic potassium channel, KcsA. FEBS Letters, 2005, 579, 5199-5204.	1.3	24
2346	Molecular modeling and docking simulations of scorpion toxins and related analogs on human SKCa2 and SKCa3 channels. Peptides, 2005, 26, 1095-1108.	1.2	17
2347	Antiepileptic popular ketogenic diet: emerging twists in an ancient story. Progress in Neurobiology, 2005, 75, 1-28.	2.8	56
2348	Regulation of the ATP-sensitive K channel Kir6.2 by ATP and PIP. Journal of Molecular and Cellular Cardiology, 2005, 39, 71-77.	0.9	26
2349	Pas de deux in groups of four—the biogenesis of K channels. Journal of Molecular and Cellular Cardiology, 2005, 38, 887-894.	0.9	18
2350	K channels "vingt ans après― ATG to PDB to Mechanism. Journal of Molecular and Cellular Cardiology, 2005, 39, 79-98.	0.9	23
2351	Shedding light on membrane proteins. Trends in Neurosciences, 2005, 28, 472-479.	4.2	27
2352	Predicting drug–hERG channel interactions that cause acquired long QT syndrome. Trends in Pharmacological Sciences, 2005, 26, 119-124.	4.0	286
2353	Structure and function of two-pore-domain K channels: contributions from genetic model organisms. Trends in Pharmacological Sciences, 2005, 26, 361-367.	4.0	50
2354	Voltage-Sensing Arginines in a Potassium Channel Permeate and Occlude Cation-Selective Pores. Neuron, 2005, 45, 379-388.	3.8	248
2355	The Pore Helix Dipole Has a Minor Role in Inward Rectifier Channel Function. Neuron, 2005, 47, 833-843.	3.8	50
2356	Differential binding properties of [3H]dextrorphan and [3H]MK-801 in heterologously expressed NMDA receptors. Neuropharmacology, 2005, 49, 1-16.	2.0	37
2357	Modulation of plant ion channels by oxidizing and reducing agents. Archives of Biochemistry and Biophysics, 2005, 434, 43-50.	1.4	37
2358	A Homology Model of the Pore Region of HCN Channels. Biophysical Journal, 2005, 89, 932-944.	0.2	36
2359	Modeling P-Loops Domain of Sodium Channel: Homology with Potassium Channels and Interaction with Ligands. Biophysical Journal, 2005, 88, 184-197.	0.2	123
2360	State-Dependent Changes in the Electrostatic Potential in the Pore of a GluR Channel. Biophysical Journal, 2005, 88, 235-242.	0.2	34
2361	The Transmembrane Domain of the Acetylcholine Receptor: Insights from Simulations on Synthetic Peptide Models. Biophysical Journal, 2005, 88, 959-970.	0.2	23
2362	Effect of Graded Hydration on the Dynamics of an Ion Channel Peptide: A Fluorescence Approach. Biophysical Journal, 2005, 88, 1070-1080.	0.2	24

#	Article	IF	CITATIONS
2363	Conformational Dynamics of the Ligand-Binding Domain of Inward Rectifier K Channels as Revealed by Molecular Dynamics Simulations: Toward an Understanding of Kir Channel Gating. Biophysical Journal, 2005, 88, 3310-3320.	0.2	42
2364	Precious Natural Peptides from Spider Venoms: New Tools for Studying Potassium Channels. Toxin Reviews, 2005, 24, 289-312.	1.5	4
2365	Structure–activity relationships, kinetics, selectivity, and mechanistic studies of synthetic hydraphile channels in bacterial and mammalian cells. Organic and Biomolecular Chemistry, 2005, 3, 3544.	1.5	30
2366	Role of Glycosylation and Membrane Environment in Nicotinic Acetylcholine Receptor Stability. Biophysical Journal, 2005, 88, 1755-1764.	0.2	24
2367	Homology Modeling and Molecular Dynamics Simulations of Transmembrane Domain Structure of Human Neuronal Nicotinic Acetylcholine Receptor. Biophysical Journal, 2005, 88, 1009-1017.	0.2	41
2368	Oxidation and Reduction Control of the Inactivation Gating of Torpedo ClC-0 Chloride Channels. Biophysical Journal, 2005, 88, 3936-3945.	0.2	15
2369	Probing the Role of Negatively Charged Amino Acid Residues in Ion Permeation of Skeletal Muscle Ryanodine Receptor. Biophysical Journal, 2005, 89, 256-265.	0.2	66
2370	Epithelial Na+ Channel Subunit Stoichiometry. Biophysical Journal, 2005, 88, 3966-3975.	0.2	97
2371	The Pore, not Cytoplasmic Domains, Underlies Inactivation in a Prokaryotic Sodium Channel. Biophysical Journal, 2005, 89, 232-242.	0.2	90
2372	A Large, Voltage-Dependent Channel, Isolated from Mitochondria by Water-Free Chloroform Extraction. Biophysical Journal, 2005, 88, 2614-2625.	0.2	126
2373	Amino Acid Substitutions in the Pore of the CaV1.2 Calcium Channel Reduce Barium Currents without Affecting Calcium Currents. Biophysical Journal, 2005, 89, 1731-1743.	0.2	18
2374	Slow Inactivation in Voltage Gated Potassium Channels Is Insensitive to the Binding of Pore Occluding Peptide Toxins. Biophysical Journal, 2005, 89, 1009-1019.	0.2	16
2375	Modeling of an Ion Channel in Its Open Conformation. Biophysical Journal, 2005, 89, L01-L03.	0.2	35
2376	KvAP-Based Model of the Pore Region of Shaker Potassium Channel Is Consistent with Cadmium- and Ligand-Binding Experiments. Biophysical Journal, 2005, 89, 1020-1029.	0.2	21
2377	Hypoosmotic Cell Swelling as a Novel Mechanism for Modulation of Cloned HCN2 Channels. Biophysical Journal, 2005, 89, 2159-2169.	0.2	20
2378	Ion Transport through Membrane-Spanning Nanopores Studied by Molecular Dynamics Simulations and Continuum Electrostatics Calculations. Biophysical Journal, 2005, 89, 2222-2234.	0.2	177
2379	Quantitative Modeling of Chloride Conductance in Yeast TRK Potassium Transporters. Biophysical Journal, 2005, 89, 2412-2426.	0.2	16
2380	Mimicry of a Host Anion Channel by a Helicobacter pylori Pore-Forming Toxin. Biophysical Journal, 2005, 89, 3093-3101.	0.2	13

		CITATION RE	PORT	
#	Article		IF	Citations
2381	Kinetics of Ca2+ Binding to the SR Ca-ATPase in the E1 State. Biophysical Journal, 2005	, 89, 2427-2433.	0.2	19
2382	Sodium Permeability of a Cloned Small-Conductance Calcium-Activated Potassium Cha Biophysical Journal, 2005, 89, 3111-3119.	nnel.	0.2	15
2383	Conformational Changes Involved in MscL Channel Gating Measured using FRET Spectr Biophysical Journal, 2005, 89, L49-L51.	roscopy.	0.2	64
2384	Evidence for dimer formation by an amphiphilic heptapeptide that mediates chloride an carboxyfluorescein release from liposomes. Organic and Biomolecular Chemistry, 2005		1.5	40
2385	Influence of the Water Molecule on Cationâ^ï€ Interaction: Ab Initio Second Order M Perturbation Theory (MP2) Calculations. Journal of Physical Chemistry B, 2005, 109, 59	à llerâ^'Plesset 45-5949.	1.2	46
2386	Role of transmembrane segment 5 of the plant vacuolar H+-pyrophosphatase. Biochimi Acta - Bioenergetics, 2005, 1709, 84-94.	ca Et Biophysica	0.5	22
2387	The evolution of voltage-gated sodium channels: were algal toxins involved?. Harmful A 95-107.	lgae, 2005, 4,	2.2	19
2388	Effect of flexibility on hydrophobic behavior of nanotube water channels. Journal of Che Physics, 2005, 123, 194502.	emical	1.2	71
2389	The Discovery of Kv1.5 Blockers as a Case Study for the Application of Virtual Screening Journal of Chemical Information and Modeling, 2005, 45, 477-485.	g Approaches.	2.5	41
2390	Unique Structure and Function of Chloride Transporting CLC Proteins. IEEE Transaction Nanobioscience, 2005, 4, 49-57.	s on	2.2	18
2391	Fifty Years of Progress in Ion Channel Research. IEEE Transactions on Nanobioscience, 2	2005, 4, 3-9.	2.2	22
2392	Voltage-Gated Sodium and Calcium Channels in Nerve, Muscle, and Heart. IEEE Transac Nanobioscience, 2005, 4, 58-69.	tions on	2.2	19
2393	Ion conduction in the KcsA potassium channel analyzed with a minimal kinetic model. F E, 2005, 71, 022901.	Physical Review	0.8	4
2394	Two-Pore Domain Potassium Channels: New Sites of Local Anesthetic Action and Toxici Anesthesia and Pain Medicine, 2005, 30, 260-274.	ty. Regional	1.1	71
2395	Progress in Lanthanides as Luminescent Probes. , 2005, , 399-431.			8
2396	Computational Modeling Approaches to Structureâ^ Function Analysis of G Protein-Cou Chemical Reviews, 2005, 105, 3297-3351.	ipled Receptors.	23.0	158
2397	Kinetic modeling of ion conduction in KcsA potassium channel. Journal of Chemical Phy 204712.	sics, 2005, 122,	1.2	10
2398	Nuclear Magnetic Resonance Structural Studies of a Potassium Channelâ~'Charybdotox Biochemistry, 2005, 44, 15834-15841.	¦in Complexâ€j.	1.2	123

#	Article	IF	CITATIONS
2399	Quantum entanglement of K+ions, multiple channel states, and the role of noise in the brain. , 2005, 5841, 205.		16
2400	The inward rectifier current (IK1) controls cardiac excitability and is involved in arrhythmogenesis. Heart Rhythm, 2005, 2, 316-324.	0.3	230
2401	Review of third and next generation synchrotron light sources. Journal of Physics B: Atomic, Molecular and Optical Physics, 2005, 38, S773-S797.	0.6	226
2402	Role of water molecules in the KcsA protein channel by molecular dynamics calculations. Physical Chemistry Chemical Physics, 2005, 7, 4138.	1.3	12
2403	Dependence of ion hydration on the sign of the ion's charge. Journal of Chemical Physics, 2005, 122, 024506.	1.2	107
2405	NMR Studies of Ion-Transporting Biological Channels. , 2008, , 285-288.		1
2406	Analytical Framework for Protein Structure Determination by Solid-State NMR of Aligned Samples. , 2008, , 517-526.		1
2407	Conversion of Trypsin into a Na+-Activated Enzymeâ€,‡. Biochemistry, 2006, 45, 2987-2993.	1.2	13
2409	Mechanism of Ion Permeation in a Model Channel:Â Free Energy Surface and Dynamics of K+Ion Transport in an Anion-Doped Carbon Nanotube. Journal of Physical Chemistry B, 2006, 110, 20671-20677.	1.2	27
2410	Cnidarian Toxins Acting on Voltage-Gated Ion Channels. Marine Drugs, 2006, 4, 70-81.	2.2	19
2411	Understanding ion channel selectivity and gating and their role in cellular signalling. Molecular BioSystems, 2006, 2, 527.	2.9	30
2414	A Self-Consistent Space-Domain Decomposition Method for QM/MM Computations of Protein Electrostatic Potentials. Journal of Chemical Theory and Computation, 2006, 2, 175-186.	2.3	47
2416	Gating of Cystic Fibrosis Transmembrane Conductance Regulator Chloride Channel. Advances in Molecular and Cell Biology, 2006, 38, 145-180.	0.1	0
2417	Sensing, Threading, Orienting, and Cutting Polymers with Rigid-Rod Pores. Journal of Receptor and Signal Transduction Research, 2006, 26, 461-472.	1.3	2
2418	Molecular mechanisms for drug interactions with hERG that cause long QT syndrome. Expert Opinion on Drug Metabolism and Toxicology, 2006, 2, 81-94.	1.5	41
2419	Chloride ion efflux from liposomes is controlled by sidechains in a channel-forming heptapeptide. Chemical Communications, 2006, , 603.	2.2	11
2420	Claudins—Key Pieces in the Tight Junction Puzzle. Cell Communication and Adhesion, 2006, 13, 127-138.	1.0	64
2421	The influence of varied amide bond positions on hydraphile ion channel activity. New Journal of Chemistry, 2006, 30, 177.	1.4	13

#	Article	IF	CITATIONS
2422	How Does Voltage Open an Ion Channel?. Annual Review of Cell and Developmental Biology, 2006, 22, 23-52.	4.0	286
2423	Capillary evaporation in pores. Journal of Physics Condensed Matter, 2006, 18, 6517-6530.	0.7	26
2424	Voltage-Gated Potassium Channels: Regulation by Accessory Subunits. Neuroscientist, 2006, 12, 199-210.	2.6	82
2425	Structure–function relationship of the TRP channel superfamily. , 2006, , 61-90.		148
2426	Human ether-a-go-go-related (HERG) gene and ATP-sensitive potassium channels as targets for adverse drug effects. , 2006, 112, 12-37.		44
2427	New light for science: synchrotron radiation in structural medicine. Trends in Biotechnology, 2006, 24, 500-508.	4.9	22
2428	Atomic determinants of state-dependent block of sodium channels by charged local anesthetics and benzocaine. FEBS Letters, 2006, 580, 6027-6032.	1.3	43
2429	lon Selectivity in a Semisynthetic K+ Channel Locked in the Conductive Conformation. Science, 2006, 314, 1004-1007.	6.0	124
2430	Uncoupled IP3 receptor can function as a Ca2+-leak channel: cell biological and pathological consequences. Biology of the Cell, 2006, 98, 1-14.	0.7	53
2431	Evaluating Tilt Angles of Membrane-Associated Helices: Comparison of Computational and NMR Techniques. Biophysical Journal, 2006, 90, 1650-1660.	0.2	54
2432	Differential Roles of S6 Domain Hinges in the Gating of KCNQ Potassium Channels. Biophysical Journal, 2006, 90, 2235-2244.	0.2	50
2433	Solid-State NMR Studies of a Diverged Microsomal Amino-Proximate Δ12 Desaturase Peptide Reveal Causes of Stability in Bilayer: Tyrosine Anchoring and Arginine Snorkeling. Biophysical Journal, 2006, 90, 1249-1259.	0.2	12
2434	Molecular Dynamics Simulation of WSK-3, a Computationally Designed, Water-Soluble Variant of the Integral Membrane Protein KcsA. Biophysical Journal, 2006, 90, 1156-1163.	0.2	14
2435	Structural Characterization and pH-Induced Conformational Transition of Full-Length KcsA. Biophysical Journal, 2006, 90, 1752-1766.	0.2	34
2436	Two Rings of Negative Charges in the Cytosolic Vestibule of Type-1 Ryanodine Receptor Modulate Ion Fluxes. Biophysical Journal, 2006, 90, 443-453.	0.2	65
2437	Role of Protein Flexibility in Ion Permeation: A Case Study in Gramicidin A. Biophysical Journal, 2006, 90, 2285-2296.	0.2	34
2438	Locking CNGA1 Channels in the Open and Closed State. Biophysical Journal, 2006, 90, 3599-3607.	0.2	19
2439	Base of Pore Loop Is Important for Rectification, Activation, Permeation, and Block of Kir3.1/Kir3.4. Biophysical Journal, 2006, 90, 4018-4034.	0.2	8

#	Article	IF	CITATIONS
2440	Energetics of Ion Permeation, Rejection, Binding, and Block in Gramicidin A from Free Energy Simulations. Biophysical Journal, 2006, 90, 3941-3950.	0.2	46
2441	Role of Conserved Glycines in pH Gating of Kir1.1 (ROMK). Biophysical Journal, 2006, 90, 3582-3589.	0.2	19
2442	Application of the Poisson-Nernst-Planck Theory with Space-Dependent Diffusion Coefficients to KcsA. Biophysical Journal, 2006, 91, 3162-3169.	0.2	39
2443	Common Mechanism of Pore Opening Shared by Five Different Potassium Channels. Biophysical Journal, 2006, 90, 3929-3940.	0.2	94
2444	New Roles for a Key Glycine and Its Neighboring Residue in Potassium Channel Gating. Biophysical Journal, 2006, 91, 2860-2873.	0.2	36
2445	Flow-Through Lipid Nanotube Arrays for Structure-Function Studies of Membrane Proteins by Solid-State NMR Spectroscopy. Biophysical Journal, 2006, 91, 3076-3084.	0.2	36
2446	Modulation of HERG Gating by a Charge Cluster in the N-Terminal Proximal Domain. Biophysical Journal, 2006, 91, 4381-4391.	0.2	26
2447	Activity of synthetic ion channels is influenced by cation–π interactions with phospholipid headgroups. Organic and Biomolecular Chemistry, 2006, 4, 83-89.	1.5	28
2448	NMR study of the tetrameric KcsA potassium channel in detergent micelles. Protein Science, 2006, 15, 684-698.	3.1	165
2449	An Integrated in Silico 3D Model-Driven Discovery of a Novel, Potent, and Selective Amidosulfonamide 5-HT1AAgonist (PRX-00023) for the Treatment of Anxiety and Depression. Journal of Medicinal Chemistry, 2006, 49, 3116-3135.	2.9	136
2450	Three-dimensional structure of an AMPA receptor without associated stargazin/TARP proteins. Biological Chemistry, 2006, 387, 179-87.	1.2	42
2451	Target-Related Applications of First Principles Quantum Chemical Methods in Drug Design. Chemical Reviews, 2006, 106, 3497-3519.	23.0	109
2452	Chromogenic Indicator for Anion Reporting Based on an N-Substituted Oxoporphyrinogen. Inorganic Chemistry, 2006, 45, 8288-8296.	1.9	71
2453	Ion Current Calculations Based on Three Dimensional Poissonâ~'Nernstâ~'Planck Theory for a Cyclic Peptide Nanotube. Journal of Physical Chemistry B, 2006, 110, 6999-7008.	1.2	44
2454	PERMEATION AND SELECTIVITY OF TRP CHANNELS. Annual Review of Physiology, 2006, 68, 685-717.	5.6	505
2455	4D ULTRAFAST ELECTRON DIFFRACTION, CRYSTALLOGRAPHY, AND MICROSCOPY. Annual Review of Physical Chemistry, 2006, 57, 65-103.	4.8	471
2456	The Characterization of Synthetic Ion Channels and Pores. , 0, , 391-418.		11
2457	IRMPD spectroscopy of metal-ion/tryptophan complexes. Physical Chemistry Chemical Physics, 2006, 8, 2744.	1.3	158

#	Article	IF	CITATIONS
2458	Chance and design—Proton transfer in water, channels and bioenergetic proteins. Biochimica Et Biophysica Acta - Bioenergetics, 2006, 1757, 886-912.	0.5	351
2459	Synthesis of a Biotin Derivative of Iberiotoxin:  Binding Interactions with Streptavidin and the BK Ca2+-Activated K+ Channel Expressed in a Human Cell Line. Bioconjugate Chemistry, 2006, 17, 689-699.	1.8	17
2460	How Does Ammonium Dynamically Interact with Benzene in Aqueous Media? A First Principle Study Using the Carâ^'Parrinello Molecular Dynamics Method. Journal of Physical Chemistry B, 2006, 110, 5094-5098.	1.2	31
2461	Characterization of Kir1.1 Channels with the Use of a Radiolabeled Derivative of Tertiapin. Biochemistry, 2006, 45, 10129-10139.	1.2	22
2462	Membrane potential of rat ventricular myocytes responds to axial stretch in phase, amplitude and speedâ€dependent manners. Cardiovascular Research, 2006, 72, 403-411.	1.8	39
2463	Ion-Binding Study by17O Solid-State NMR Spectroscopy in the Model Peptide Gly-Gly-Gly at 19.6 T. Journal of the American Chemical Society, 2006, 128, 9849-9855.	6.6	53
2464	Electrostatic Screening and Energy Barriers of Ions in Low-dielectric Membranes. Journal of Physical Chemistry B, 2006, 110, 14503-14506.	1.2	19
2465	Diffusion of interacting Brownian particles: Jamming and anomalous diffusion. Physical Review E, 2006, 74, 021119.	0.8	29
2466	Structural and Functional Consequences of an Amide-to-Ester Substitution in the Selectivity Filter of a Potassium Channel. Journal of the American Chemical Society, 2006, 128, 11591-11599.	6.6	53
2467	Selective Ion-Binding by Protein Probed with the 3D-RISM Theory. Journal of the American Chemical Society, 2006, 128, 12042-12043.	6.6	110
2468	Hydrophobic and Hydrophilic Yoctowells. Accounts of Chemical Research, 2006, 39, 498-508.	7.6	26
2469	Cation Binding in Na,K-ATPase, Investigated by 205Tl Solid-State NMR Spectroscopy. Biochemistry, 2006, 45, 10768-10776.	1.2	4
2470	Similarities and differences in interaction of K + and Na + with condensed ordered DNA. A molecular dynamics computer simulation study. Nucleic Acids Research, 2006, 34, 686-696.	6.5	148
2471	Significant Conformational Changes Associated with Molecular Transport in a Crystalline Solid. Journal of Physical Chemistry B, 2006, 110, 10708-10713.	1.2	18
2472	α-Sheet:  The Toxic Conformer in Amyloid Diseases?. Accounts of Chemical Research, 2006, 39, 594-602.	7.6	96
2473	Mechanisms of ammonium transport, accumulation, and retention in ooyctes and yeast cells expressingArabidopsisAtAMT1;1. FEBS Letters, 2006, 580, 3931-3936.	1.3	48
2474	The RCK Domain of the KtrAB K+ Transporter: Multiple Conformations of an Octameric Ring. Cell, 2006, 126, 1147-1159.	13.5	78
2475	Crystal Structures of a Ligand-free MthK Gating Ring: Insights into the Ligand Gating Mechanism of K+ Channels. Cell, 2006, 126, 1161-1173.	13.5	99

ARTICLE IF CITATIONS KChIP2b modulates the affinity and use-dependent block of Kv4.3 by nifedipine. Biochemical and 2476 1.0 22 Biophysical Research Communications, 2006, 340, 1167-1177. Molecular regions responsible for differences in activation between heag channels. Biochemical and 2477 1.0 Biophysical Research Communications, 2006, 342, 1088-1097. Monitoring ion channel conformations in membranes utilizing a novel dual fluorescence quenching 2478 1.0 13 approach. Biochemical and Biophysical Research Communications, 2006, 343, 483-488. Structural and functional analysis of natrin, a venom protein that targets various ion channels. 2479 1.0 74 Biochemical and Biophysical Research Communications, 2006, 351, 443-448. Uncompetitive Antagonism of AMPA Receptors:Â Mechanistic Insights from Studies of Polyamine Toxin 2480 2.9 42 Derivatives. Journal of Medicinal Chemistry, 2006, 49, 5414-5423. Engineering Light-Gated Ion Channelsâ€. Biochemistry, 2006, 45, 15129-15141. 1.2 130 Ion pore properties of ionotropic glutamate receptors are modulated by a transplanted potassium 2482 1.0 7 channel selectivity filter. Molecular and Cellular Neurosciences, 2006, 33, 335-343. Molecular cloning and stress-dependent regulation of potassium channel gene in Chinese cabbage 2483 1.6 (Brassica rapa ssp. Pekinensis). Journal of Plant Physiology, 2006, 163, 968-978. Transmembrane domain prediction and consensus sequence identification of the oligopeptide 2484 1.0 17 transport family. Research in Microbiology, 2006, 157, 395-406. Getting the Message Across: A Recent Transporter Structure Shows the Way. Neuron, 2006, 49, 791-796. 3.8 2485 Autoimmune Channelopathies and Related Neurological Disorders. Neuron, 2006, 52, 123-138. 2486 3.8 104 Regions of α-amino-5-methyl-3-hydroxy-4-isoxazole propionic acid receptor subunits that are permissive 2487 1.1 for the insertion of green fluorescent protein. Neuroscience, 2006, 141, 837-849. Structural andÂfunctional insights into theÂAmtB/Mep/Rh protein family. Transfusion Clinique Et 2488 0.2 16 Biologique, 2006, 13, 65-69. Patch Fluorometry: Shedding New Light on Ion Channels. Physiology, 2006, 21, 6-12. 2489 1.6 16 Alpha-helix and beta-barrel pore-forming toxins (leucocidins, alpha-, gamma-, and delta-cytolysins) of 2491 5 Staphylococcus aureus. , 2006, , 590-607. Analysis of Electrophysiological Data., 2006, , 111-144. 2495 Lipid Interactions of \hat{l} ±-Helical Protein Toxins. , 2006, , 139-162. 2496 1 Interactive domains between pore loops of the yeast K+ channel TOK1 associate with extracellular K+ 2498

CITATION REPORT

sensitivity. Biochemical Journal, 2006, 393, 645-655.

#	Article	IF	Citations
" 2499	Gating of two-pore domain K+ channels by extracellular pH. Biochemical Society Transactions, 2006, 34, 899-902.	1.6	22
2500	Plasma membrane IP3 receptors. Biochemical Society Transactions, 2006, 34, 910-912.	1.6	18
2501	Molecular Modeling and Simulations of Ion Channels: Applications to Potassium Channels. , 2006, , 241-267.		0
2502	Approaches for Ion Channel Structural Studies. , 2006, , 213-239.		0
2504	The Simulation of Ionic Charge Transport in Biological Ion Channels: An Introduction to Numerical Methods. Reviews in Computational Chemistry, 2006, , 229-293.	1.5	20
2505	SHAPE ESTIMATION OF BIOLOGICAL NANOTUBES USING CONTROLLED BROWNIAN DYNAMICS SIMULATION ALGORITHM. IFAC Postprint Volumes IPPV / International Federation of Automatic Control, 2006, 39, 1180-1185.	0.4	0
2506	Fluorescence Quenching Methods to Study Lipidâ€Protein Interactions. Current Protocols in Protein Science, 2006, 45, Unit 19.12.	2.8	15
2507	Voltage-Gated Calcium Channels and Idiopathic Generalized Epilepsies. Physiological Reviews, 2006, 86, 941-966.	13.1	169
2512	Application of protein engineering to improve crystal properties. , 2006, , 100-110.		1
2513	A Reductionist Approach to Chemogenomics in the Design of Drug Molecules and Focused Libraries. , 2006, , 85-108.		4
2514	The determination of the ion selectivity of synthetic ion channels and pores in vesicles. Journal of Physical Organic Chemistry, 2006, 19, 452-460.	0.9	62
2515	Origin of functional diversity among tetrameric voltage-gated channels. Proteins: Structure, Function and Bioinformatics, 2006, 66, 136-146.	1.5	16
2516	NovelDrosophilatwo-pore domain K+channels: rescue of channel function by heteromeric assembly. European Journal of Neuroscience, 2006, 24, 2264-2274.	1.2	12
2517	Pharmacology of the Kâ€ATP Channel Blocking Morpholinoguanidine PNUâ€ 3 7883A. Cardiovascular Drug Reviews, 1999, 17, 295-328.	4.4	5
2518	Neuroprotective and Cognitionâ€Enhancing Properties of MKâ€801 Flexible Analogs. Annals of the New York Academy of Sciences, 2001, 939, 219-236.	1.8	34
2519	Critical Reviews in Basic Electrophysiology: Realizing the Synergy Between the Basic and Clinical Sciences. Journal of Cardiovascular Electrophysiology, 2006, 17, 219-219.	0.8	0
2520	Permutations of permeability. Nature, 2006, 440, 427-429.	13.7	25
2521	Perkin, the mauve maker. Nature, 2006, 440, 429-429.	13.7	10

	CITATION RE	PORT	
#	Article	IF	CITATIONS
2522	Direct transfer of membrane proteins from bacteria to planar bilayers for rapid screening by single-channel recording. Nature Chemical Biology, 2006, 2, 314-318.	3.9	51
2523	Protein ligation: an enabling technology for the biophysical analysis of proteins. Nature Methods, 2006, 3, 429-438.	9.0	351
2524	A radioactive uptake assay to measure ion transport across ion channel–containing liposomes. Nature Protocols, 2006, 1, 1207-1212.	5.5	40
2525	Energy distribution and ion selectivity of the bacterial potassium channel. Biophysics (Russian) Tj ETQq1 1 0.784	314 rgBT / 0.2	Oyerlock 10
2526	Molecular determinants of gating at the potassium-channel selectivity filter. Nature Structural and Molecular Biology, 2006, 13, 311-318.	3.6	399
2527	Voltage-dependent gating at the KcsA selectivity filter. Nature Structural and Molecular Biology, 2006, 13, 319-322.	3.6	129
2528	Rhomboid intramembrane protease structures galore!. Nature Structural and Molecular Biology, 2006, 13, 1049-1051.	3.6	12
2529	Of Fat flies and Hippos, or the magic of animal size. Nature Structural and Molecular Biology, 2006, 13, 1051-1053.	3.6	1
2530	Potassium channels - multiplicity and challenges. British Journal of Pharmacology, 2006, 147, S63-S71.	2.7	46
2531	Atomic structure of a Na+- and K+-conducting channel. Nature, 2006, 440, 570-574.	13.7	222
2532	Crystal structure of the CorA Mg2+ transporter. Nature, 2006, 440, 833-837.	13.7	233
2533	From molecule to malady. Nature, 2006, 440, 440-447.	13.7	366
2534	hERG potassium channels and cardiac arrhythmia. Nature, 2006, 440, 463-469.	13.7	1,346
2535	KATP channels as molecular sensors of cellular metabolism. Nature, 2006, 440, 470-476.	13.7	753
2536	Ion-channel drug screening galvanized. Nature Biotechnology, 2006, 24, 415-416.	9.4	2
2537	Ion-binding properties of the CIC chloride selectivity filter. EMBO Journal, 2006, 25, 24-33.	3.5	96
2538	Proximal tubular handling of phosphate: A molecular perspective. Kidney International, 2006, 70, 1548-1559.	2.6	205
2540	Mechanism of chloride permeation in the cystic fibrosis transmembrane conductance regulator chloride channel. Experimental Physiology, 2006, 91, 123-129.	0.9	98

		CITATION RE	PORT	
#	Article		IF	CITATIONS
2541	Interaction of KCNE subunits with the KCNQ1 K+channel pore. Journal of Physiology, 20	06, 570, 455-467.	1.3	91
2542	New insights into the double layer structure from impedance measurements: Implication biological systems. Electrochimica Acta, 2006, 51, 1541-1549.	ns for	2.6	21
2543	Effects of heterogeneity on diffusion in nanopores—From inorganic materials to prote ion channels. Fluid Phase Equilibria, 2006, 241, 308-316.	n crystals and	1.4	44
2544	Polarization effects and charge transfer in the KcsA potassium channel. Biophysical Cher 124, 292-301.	mistry, 2006,	1.5	84
2545	Molecular dynamics $\hat{a} \in $ potential of mean force calculations as a tool for understanding permeation and selectivity in narrow channels. Biophysical Chemistry, 2006, 124, 251-2		1.5	181
2546	Ion selectivity in potassium channels. Biophysical Chemistry, 2006, 124, 279-291.		1.5	174
2547	Molecular dynamics simulations of gramicidin A in a lipid bilayer: From structure–func to force fields. Chemistry and Physics of Lipids, 2006, 141, 197-204.	tion relations	1.5	18
2548	Finite system and periodicity effects in free energy simulations of membrane proteins. C Physics Letters, 2006, 425, 320-323.	hemical	1.2	17
2549	Molecular thermodynamics for charged biomacromolecules. Fluid Phase Equilibria, 2006	, 241, 317-333.	1.4	18
2550	Identification of novel quaternary domain interactions in the Hsp90 chaperone, GRP94. Science, 2006, 15, 1260-1269.	Protein	3.1	33
2551	Theoretical Investigations on Chalcogenâ	Nonbonded ŀ.	6.6	388
2552	Molecular Restraints in the Permeation Pathway of Ion Channels. Biophysical Journal, 20	06, 91, L26-L28.	0.2	31
2553	Measurement of 15N relaxation in the detergent-solubilized tetrameric KcsA potassium Journal of Biomolecular NMR, 2006, 36, 123-136.	channel.	1.6	86
2554	Separation of long-and short-range interactions in calculations of energy distribution of membrane channels. Journal of Structural Chemistry, 2006, 47, 241-246.	ions in	0.3	0
2555	Modeling the pore structure of voltage-gated sodium channels in closed, open, and fast conformation reveals details of site 1 toxin and local anesthetic binding. Journal of Mole Modeling, 2006, 12, 813-822.		0.8	36
2556	Allosteric effects of external K+ ions mediated by the aspartate of the CYGD signature so Kv2.1 K+ channel. Pflugers Archiv European Journal of Physiology, 2006, 451, 776-792.	equence in the	1.3	7
2557	Adaptive downregulation of a quinidine-sensitive cation conductance in renal principal c TWIK-1 knockout mice. Pflugers Archiv European Journal of Physiology, 2006, 453, 107-		1.3	18
2558	K+ Channels in Apoptosis. Journal of Membrane Biology, 2006, 209, 3-20.		1.0	131

#	Article	IF	CITATIONS
2559	Elongation of Outer Transmembrane Domain Alters Function of Miniature K+ Channel Kcv. Journal of Membrane Biology, 2006, 210, 21-29.	1.0	12
2560	Interactions between Impermeant Blocking Ions in the Cystic Fibrosis Transmembrane Conductance Regulator Chloride Channel Pore: Evidence for Anion-Induced Conformational Changes. Journal of Membrane Biology, 2006, 210, 31-42.	1.0	7
2561	On the Role of Pore Helix in Regulation of TRPV5 by Extracellular Protons. Journal of Membrane Biology, 2006, 212, 191-198.	1.0	15
2562	Electrokinetics of Miniature K+ Channel: Open-State V Sensitivity and Inhibition by K+ Driving Force. Journal of Membrane Biology, 2006, 214, 9-17.	1.0	6
2563	Gating and Conductance Changes in BK Ca Channels in Bilayers Are Reciprocal. Journal of Membrane Biology, 2006, 213, 143-153.	1.0	7
2564	A Kir2.3-like K+ Conductance in Mouse Cortical Collecting Duct Principal Cells. Journal of Membrane Biology, 2006, 211, 173-184.	1.0	13
2565	Pharmacology and Surface Electrostatics of the K Channel Outer Pore Vestibule. Journal of Membrane Biology, 2006, 212, 51-60.	1.0	4
2566	The Power of Two-Dimensional Dwell-Time Analysis for Model Discrimination, Temporal Resolution, Multichannel Analysis and Level Detection. Journal of Membrane Biology, 2006, 214, 19-32.	1.0	7
2567	Properties of Shaker-type Potassium Channels in Higher Plants. Journal of Membrane Biology, 2006, 210, 1-19.	1.0	98
	210, 1 19.		
2568	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133.	1.0	17
2568 2569		1.0 1.0	17 40
	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133. HCN-Encoded Pacemaker Channels: From Physiology and Biophysics to Bioengineering. Journal of		
2569	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133. HCN-Encoded Pacemaker Channels: From Physiology and Biophysics to Bioengineering. Journal of Membrane Biology, 2006, 214, 115-122. Identification of Three Distinct Phylogenetic Groups of CAX Cation/Proton Antiporters. Journal of	1.0	40
2569 2570	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133. HCN-Encoded Pacemaker Channels: From Physiology and Biophysics to Bioengineering. Journal of Membrane Biology, 2006, 214, 115-122. Identification of Three Distinct Phylogenetic Groups of CAX Cation/Proton Antiporters. Journal of Molecular Evolution, 2006, 63, 815-825. Residues of the yeast ALR1 protein that are critical for Magnesium uptake. Current Genetics, 2006, 49,	1.0 0.8	40
2569 2570 2571	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133. HCN-Encoded Pacemaker Channels: From Physiology and Biophysics to Bioengineering. Journal of Membrane Biology, 2006, 214, 115-122. Identification of Three Distinct Phylogenetic Groups of CAX Cation/Proton Antiporters. Journal of Molecular Evolution, 2006, 63, 815-825. Residues of the yeast ALR1 protein that are critical for Magnesium uptake. Current Genetics, 2006, 49, 7-20. Mechanisms of valence selectivity in biological ion channels. Cellular and Molecular Life Sciences,	1.0 0.8 0.8	40 166 26
2569 2570 2571 2572	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133. HCN-Encoded Pacemaker Channels: From Physiology and Biophysics to Bioengineering. Journal of Membrane Biology, 2006, 214, 115-122. Identification of Three Distinct Phylogenetic Groups of CAX Cation/Proton Antiporters. Journal of Molecular Evolution, 2006, 63, 815-825. Residues of the yeast ALR1 protein that are critical for Magnesium uptake. Current Genetics, 2006, 49, 7-20. Mechanisms of valence selectivity in biological ion channels. Cellular and Molecular Life Sciences, 2006, 63, 301-315. Electronic structure, statistical mechanical simulations, and EXAFS spectroscopy of aqueous	1.0 0.8 0.8 2.4	40 166 26 70
2569 2570 2571 2572 2573	Secondary Transport of Amino Acids in Prokaryotes. Journal of Membrane Biology, 2006, 213, 119-133. HCN-Encoded Pacemaker Channels: From Physiology and Biophysics to Bioengineering. Journal of Membrane Biology, 2006, 214, 115-122. Identification of Three Distinct Phylogenetic Groups of CAX Cation/Proton Antiporters. Journal of Molecular Evolution, 2006, 63, 815-825. Residues of the yeast ALR1 protein that are critical for Magnesium uptake. Current Genetics, 2006, 49, 7-20. Mechanisms of valence selectivity in biological ion channels. Cellular and Molecular Life Sciences, 2006, 63, 301-315. Electronic structure, statistical mechanical simulations, and EXAFS spectroscopy of aqueous potassium. Theoretical Chemistry Accounts, 2006, 115, 86-99. Diffusion constant of K+ inside Cramicidin A: A comparative study of four computational methods.	1.0 0.8 0.8 2.4 0.5	40 166 26 70 63

#	Article	IF	CITATIONS
2577	Membrane interfacial localization of aromatic amino acids and membrane protein function. Journal of Biosciences, 2006, 31, 297-302.	0.5	47
2578	Voltage-gated calcium channel subunits from platyhelminths: Potential role in praziquantel action. International Journal for Parasitology, 2006, 36, 625-632.	1.3	85
2579	Phthalic acid diamides activate ryanodine-sensitive Ca2+ release channels in insects. Cell Calcium, 2006, 39, 21-33.	1.1	178
2580	Molecular characterization of T-type calcium channels. Cell Calcium, 2006, 40, 89-96.	1.1	95
2581	Electrophysiological characterization of 14-benzoyltalatisamine, a selective blocker of the delayed rectifier K+ channel found in virtual screening. European Journal of Pharmacology, 2006, 531, 47-53.	1.7	5
2582	Recent advances in hyperinsulinemic hypoglycemia of infancy. Acta Paediatrica, International Journal of Paediatrics, 2006, 95, 1157-1164.	0.7	24
2583	Progress in structure prediction of α-helical membrane proteins. Current Opinion in Structural Biology, 2006, 16, 496-504.	2.6	61
2584	Membrane proteins shape up: understanding in vitro folding. Current Opinion in Structural Biology, 2006, 16, 480-488.	2.6	56
2585	The structure of CorA: a Mg2+-selective channel. Current Opinion in Structural Biology, 2006, 16, 432-438.	2.6	52
2586	Amyloid Formation May Involve α- to β Sheet Interconversion via Peptide Plane Flipping. Structure, 2006, 14, 1369-1376.	1.6	44
2587	Transmembrane protein structures without X-rays. Trends in Biochemical Sciences, 2006, 31, 106-113.	3.7	84
2588	Rationalizing membrane protein overexpression. Trends in Biotechnology, 2006, 24, 364-371.	4.9	238
2589	Ca2+ currents in cardiac myocytes: Old story, new insights. Progress in Biophysics and Molecular Biology, 2006, 91, 1-82.	1.4	48
2590	A structural interpretation of voltage-gated potassium channel inactivation. Progress in Biophysics and Molecular Biology, 2006, 92, 185-208.	1.4	169
2591	Nitric Oxide Donors Mediate Vasodilation in Human Placental Arteries Partly Through a Direct Effect on Potassium Channels. Placenta, 2006, 27, 181-190.	0.7	25
2592	The electro-oculogram. Progress in Retinal and Eye Research, 2006, 25, 207-248.	7.3	63
2593	Classification of protein quaternary structure by functional domain composition. BMC Bioinformatics, 2006, 7, 187.	1.2	25
2594	Quaternary structure predictions of transmembrane proteins starting from the monomer: a docking-based approach. BMC Bioinformatics, 2006, 7, 340.	1.2	45

#	Article	IF	CITATIONS
2595	Dynamic Structural Investigations on the Torpedo Nicotinic Acetylcholine Receptor by Time-Resolved Photoaffinity Labeling. ChemBioChem, 2006, 7, 570-583.	1.3	24
2596	Why Are Proteins Charged? Networks of Charge–Charge Interactions in Proteins Measured by Charge Ladders and Capillary Electrophoresis. Angewandte Chemie - International Edition, 2006, 45, 3022-3060.	7.2	234
2597	Crown Ether-Gramicidin Hybrid Ion Channels: Dehydration-Assisted Ion Selectivity. Angewandte Chemie - International Edition, 2006, 45, 501-504.	7.2	50
2598	Tetrahydropyran-Amino Acids: Novel Building Blocks for Gramicidin-Hybrid Ion Channels. European Journal of Organic Chemistry, 2006, 2006, 2766-2776.	1.2	8
2599	Heuristic molecular lipophilicity potential (HMLP): Lipophilicity and hydrophilicity of amino acid side chains. Journal of Computational Chemistry, 2006, 27, 685-692.	1.5	27
2602	Crystallization of membrane proteins. , 2006, , 94-99.		4
2603	Structure and Function of CLC Chloride Channels and Transporters. Advances in Molecular and Cell Biology, 2006, , 59-82.	0.1	0
2604	The Cardiac hERG/IKr Potassium Channel as Pharmacological Target: Structure, Function, Regulation, and Clinical Applications. Current Pharmaceutical Design, 2006, 12, 2271-2283.	0.9	104
2605	Genetic Screening for Functionality of Bacterial Potassium Channel Mutants Using K+ Uptake-Deficient Escherichia coli. , 2006, 337, 157-165.		7
2606	Chapter 12 Twoâ€Pore Domain Potassium Channels in Sensory Transduction. Current Topics in Membranes, 2006, , 353-377.	0.5	0
2607	Cell Volume-Regulated Cation Channels. , 2006, 152, 25-53.		42
2608	A combinatorial pattern discovery approach for the prediction of membrane dipping (re-entrant) loops. Bioinformatics, 2006, 22, e290-e297.	1.8	27
2609	AMPA Receptor Antagonists: Potential Therapeutic Applications. Recent Patents on CNS Drug Discovery, 2006, 1, 247-259.	0.9	6
2610	Incidence of partial charges on ion selectivity in potassium channels. Journal of Chemical Physics, 2006, 124, 044703.	1.2	23
2611	Role of fluctuations in a snug-fit mechanism of KcsA channel selectivity. Journal of Chemical Physics, 2006, 125, 024701.	1.2	44
2612	Formation and interaction of hydrated alkali metal ions at the graphite-water interface. Journal of Chemical Physics, 2006, 125, 014708.	1.2	32
2613	An Evolutionary Space-Time Model with Varying Among-Site Dependencies. Molecular Biology and Evolution, 2006, 23, 392-400.	3.5	20
2614	Single plasma membrane K+ channel detection by using dual-color quantum dot labeling. American Journal of Physiology - Cell Physiology, 2006, 291, C266-C269.	2.1	22

#	Article	IF	CITATIONS
2615	G Protein-Activated Inwardly Rectifying Potassium Channels as Potential Therapeutic Targets. Current Pharmaceutical Design, 2006, 12, 4513-4523.	0.9	61
2616	Role of Na+and K+in Enzyme Function. Physiological Reviews, 2006, 86, 1049-1092.	13.1	274
2617	Can Selective Ligands for Glutamate Binding Proteins be Rationally Designed?. Current Topics in Medicinal Chemistry, 2006, 6, 823-847.	1.0	14
2618	Isolation and characterization of IKr in cardiac myocytes by Cs+ permeation. American Journal of Physiology - Heart and Circulatory Physiology, 2006, 290, H1038-H1049.	1.5	40
2619	Surface Structure and Its Dynamic Rearrangements of the KcsA Potassium Channel upon Gating and Tetrabutylammonium Blocking. Journal of Biological Chemistry, 2006, 281, 28379-28386.	1.6	54
2620	K+ Channel Blockers: Novel Tools to Inhibit T Cell Activation Leading to Specific Immunosuppression. Current Pharmaceutical Design, 2006, 12, 2199-2220.	0.9	89
2621	The Pharmacology of Cyclic Nucleotide-Gated Channels: Emerging from the Darkness. Current Pharmaceutical Design, 2006, 12, 3597-3613.	0.9	56
2622	Pigment Pattern in jaguar/obelix Zebrafish Is Caused by a Kir7.1 Mutation: Implications for the Regulation of Melanosome Movement. PLoS Genetics, 2006, 2, e197.	1.5	124
2623	Na+ Channel Pharmacology and Molecular Mechanisms of Gating. Current Pharmaceutical Design, 2006, 12, 429-442.	0.9	16
2624	Importance of the seryl and threonyl residues of the fifth transmembrane domain to the substrate specificity of yeast plasma membrane Na+/H+antiporters. Molecular Membrane Biology, 2006, 23, 349-361.	2.0	30
2625	Regulation of TRPV5 and TRPV6 by associated proteins. American Journal of Physiology - Renal Physiology, 2006, 290, F1295-F1302.	1.3	87
2626	The Impact of Ancillary Subunits on Small-Molecule Interactions with Voltage-Gated Potassium Channels. Current Pharmaceutical Design, 2006, 12, 2285-2302.	0.9	32
2627	The Ion Channel Inverse Problem: Neuroinformatics Meets Biophysics. PLoS Computational Biology, 2006, 2, e91.	1.5	33
2628	Drug Binding Interactions in the Inner Cavity of hERG Channels: Molecular Insights from Structure-Activity Relationships of Clofilium and Ibutilide Analogs. Molecular Pharmacology, 2006, 69, 509-519.	1.0	84
2629	A Cation–π Interaction between Extracellular TEA and an Aromatic Residue in Potassium Channels. Journal of General Physiology, 2006, 128, 649-657.	0.9	58
2630	Intra- and Intersubunit Cooperativity in Activation of BK Channels by Ca2+. Journal of General Physiology, 2006, 128, 389-404.	0.9	60
2631	Computational recognition of potassium channel sequences. Bioinformatics, 2006, 22, 1562-1568.	1.8	10
2632	State-independent Block of BK Channels by an Intracellular Quaternary Ammonium. Journal of General Physiology, 2006, 128, 347-364.	0.9	94

#	Article	IF	CITATIONS
2634	Electrostatic interactions in the channel cavity as an important determinant of potassium channel selectivity. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 14355-14360.	3.3	40
2635	Ring of Negative Charge in BK Channels Facilitates Block by Intracellular Mg2+ and Polyamines through Electrostatics. Journal of General Physiology, 2006, 128, 185-202.	0.9	37
2636	Na+ Permeation and Block of hERG Potassium Channels. Journal of General Physiology, 2006, 128, 55-71.	0.9	29
2637	A Trapped Intracellular Cation Modulates K+ Channel Recovery From Slow Inactivation. Journal of General Physiology, 2006, 128, 203-217.	0.9	20
2638	How Batrachotoxin Modifies the Sodium Channel Permeation Pathway: Computer Modeling and Site-Directed Mutagenesis. Molecular Pharmacology, 2006, 69, 788-795.	1.0	61
2639	State-dependent Block of BK Channels by Synthesized Shaker Ball Peptides. Journal of General Physiology, 2006, 128, 423-441.	0.9	37
2640	Distance measurements reveal a common topology of prokaryotic voltage-gated ion channels in the lipid bilayer. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 15865-15870.	3.3	39
2641	A Structural Perspective on Enzymes Activated by Monovalent Cations. Journal of Biological Chemistry, 2006, 281, 1305-1308.	1.6	115
2642	Modelling insecticide-binding sites in the voltage-gated sodium channel. Biochemical Journal, 2006, 396, 255-263.	1.7	248
2643	Site-Directed Solid-State NMR on Membrane Proteins. Annual Reports on NMR Spectroscopy, 2006, 57, 99-175.	0.7	12
2644	Structural and Functional Modulation of Ion Channels by Specific Lipids: from Model Systems to Cell Membranes. , 2006, , 203-231.		1
2645	Clustering and Coupled Gating Modulate the Activity in KcsA, a Potassium Channel Model. Journal of Biological Chemistry, 2006, 281, 18837-18848.	1.6	72
2646	Quaternary Ammonium Compounds as Water Channel Blockers. Journal of Biological Chemistry, 2006, 281, 14207-14214.	1.6	120
2647	Binding Site of a Novel Kv1.5 Blocker: A "Foot in the Door―against Atrial Fibrillation. Molecular Pharmacology, 2006, 70, 1204-1211.	1.0	94
2648	Projection structure of the human copper transporter CTR1 at 6-A resolution reveals a compact trimer with a novel channel-like architecture. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 3627-3632.	3.3	186
2649	Mutations Phe785Leu and Thr618Met in Na+,K+-ATPase, Associated with Familial Rapid-onset Dystonia Parkinsonism, Interfere with Na+ Interaction by Distinct Mechanisms. Journal of Biological Chemistry, 2006, 281, 18539-18548.	1.6	66
2650	In vivo monitoring of the potassium channel KcsA in Streptomyces lividans hyphae using immuno-electron microscopy and energy-filtering transmission electron microscopy. Microbiology (United Kingdom), 2006, 152, 2831-2841.	0.7	16
2651	Murine Thrombin Lacks Na+ Activation but Retains High Catalytic Activity. Journal of Biological Chemistry, 2006, 281, 7183-7188.	1.6	35

#	Article	IF	CITATIONS
2652	A loop network within the anthrax toxin pore positions the phenylalanine clamp in an active conformation. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 9802-9807.	3.3	55
2653	Self-Energy-Limited Ion Transport in Subnanometer Channels. Physical Review Letters, 2006, 97, 128104.	2.9	62
2654	Unified modeling of conductance kinetics for low- and high-conductance potassium ion channels. Physical Review E, 2006, 74, 011902.	0.8	5
2655	Nonequilibrium molecular dynamics calculation of the conductance of the KcsA potassium ion channel. Physical Review E, 2006, 74, 030905.	0.8	6
2656	Ion exchange phase transitions in water-filled channels with charged walls. Physical Review E, 2006, 73, 051205.	0.8	28
2658	Two-Dimensional Solid-State NMR Applied to a Chimeric Potassium Channel. Journal of Receptor and Signal Transduction Research, 2006, 26, 379-393.	1.3	18
2659	Selectivity principle of the ligand escape process from a two-gate tunnel in myoglobin: Molecular dynamics simulation. Journal of Chemical Physics, 2006, 124, 154711.	1.2	7
2660	In-situ Monitoring of Alkane-Alkane Guest Exchange in Urea Inclusion Compounds using Confocal Raman Microspectrometry. Molecular Crystals and Liquid Crystals, 2006, 456, 139-147.	0.4	8
2661	Mimicking solvent shells in the gas phase. II. Solvation of K+. Journal of Chemical Physics, 2006, 124, 024319.	1.2	37
2663	The structure of aquaporins. Quarterly Reviews of Biophysics, 2006, 39, 361-396.	2.4	291
2664	Zinc Metalloneurochemistry: Physiology, Pathology, and Probes. , 2006, , 321-370.		13
2665	1,4-Diazabicyclo[2.2.2]octane Derivatives: A Novel Class of Voltage-Gated Potassium Channel Blockers. Molecular Pharmacology, 2006, 69, 718-726.	1.0	9
2666	Molecular Determinants of hERG Channel Block. Molecular Pharmacology, 2006, 69, 1709-1716.	1.0	177
2667	Interaction of d-Tubocurarine with Potassium Channels: Molecular Modeling and Ligand Binding. Molecular Pharmacology, 2006, 69, 1356-1365.	1.0	19
2668	Enhancing molecular flux through nanopores by means of attractive interactions. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 11431-11432.	3.3	20
2669	State-dependent Conformations of the Translocation Pathway in the Tyrosine Transporter Tyt1, a Novel Neurotransmitter:Sodium Symporter from Fusobacterium nucleatum. Journal of Biological Chemistry, 2006, 281, 26444-26454.	1.6	88
2670	Modulation of MthK Potassium Channel Activity at the Intracellular Entrance to the Pore. Journal of Biological Chemistry, 2006, 281, 21131-21138.	1.6	27
2671	Permeant Ion Effects on External Mg2+ Block of NR1/2D NMDA Receptors. Journal of Neuroscience,	1.7	27

#	Article	IF	CITATIONS
2672	Effects of Conducting and Blocking lons on the Structure and Stability of the Potassium Channel KcsA. Journal of Biological Chemistry, 2006, 281, 29905-29915.	1.6	30
2673	Distinct Structural Elements in the First Membrane-spanning Segment of the Epithelial Sodium Channel. Journal of Biological Chemistry, 2006, 281, 30455-30462.	1.6	18
2674	The Role of the GX9GX3G Motif in the Gating of High Voltage-activated Ca2+ Channels. Journal of Biological Chemistry, 2006, 281, 39424-39436.	1.6	54
2675	A voltage-driven switch for ion-independent signaling by ether-a-go-go K+ channels. Proceedings of the United States of America, 2006, 103, 2886-2891.	3.3	133
2676	A Single P-loop Glutamate Point Mutation to either Lysine or Arginine Switches the Cation–Anion Selectivity of the CNGA2 Channel. Journal of General Physiology, 2006, 127, 375-389.	0.9	13
2677	Molecular Template for a Voltage Sensor in a Novel K+ Channel. I. Identification and Functional Characterization of KvLm, a Voltage-gated K+ Channel from Listeria monocytogenes. Journal of General Physiology, 2006, 128, 283-292.	0.9	24
2679	The S4-S5 Linker Directly Couples Voltage Sensor Movement to the Activation Gate in the Human Ether-Ãi-go-go-related Gene (hERG) K+ Channel. Journal of Biological Chemistry, 2006, 281, 12858-12864.	1.6	98
2680	Binding of a Gating Modifier Toxin Induces Intersubunit Cooperativity Early in the Shaker K Channel's Activation Pathway. Journal of General Physiology, 2006, 128, 119-132.	0.9	24
2681	K+ channel selectivity depends on kinetic as well as thermodynamic factors. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 14361-14366.	3.3	25
2682	Extracellular Blockade of Potassium Channels by TEA+: The Tip of the Iceberg?. Journal of General Physiology, 2006, 128, 635-636.	0.9	4
2683	Pretty Subunits All in a Row: Using Concatenated Subunit Constructs to Force the Expression of Receptors with Defined Subunit Stoichiometry and Spatial Arrangement. Molecular Pharmacology, 2006, 69, 407-410.	1.0	11
2684	Counterions between charged polymers exhibit liquid-like organization and dynamics. Proceedings of the United States of America, 2006, 103, 7962-7967.	3.3	66
2685	Detection of the Opening of the Bundle Crossing in KcsA with Fluorescence Lifetime Spectroscopy Reveals the Existence of Two Gates for Ion Conduction. Journal of General Physiology, 2006, 128, 569-581.	0.9	97
2686	Structures of the Prokaryotic Mechanosensitive Channels MscL and MscS. Current Topics in Membranes, 2007, 58, 1-24.	0.5	176
2687	Life Among the Axons. Annual Review of Physiology, 2007, 69, 1-18.	5.6	27
2688	Voltage-Gated Sodium Channels. Biological and Medical Physics Series, 2007, , 219-239.	0.3	3
2689	Tarantula Toxins Interact with Voltage Sensors within Lipid Membranes. Journal of General Physiology, 2007, 130, 497-511.	0.9	111
2690	Characterization of the C-terminal Domain of a Potassium Channel from Streptomyces lividans (KcsA). Journal of Biological Chemistry, 2007, 282, 29163-29169.	1.6	19

#	Article	IF	CITATIONS
2691	Profile of Christopher Miller. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 20656-20658.	3.3	0
2692	Yeast gain-of-function mutations reveal structure–function relationships conserved among different subfamilies of transient receptor potential channels. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 19607-19612.	3.3	39
2693	Geometry-induced asymmetric diffusion. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 9580-9584.	3.3	46
2694	The Residues Determining Differences in Ion Affinities among the Alternative Splice Variants F, A, and B of the Mammalian Renal Na-K-Cl Cotransporter (NKCC2). Journal of Biological Chemistry, 2007, 282, 6540-6547.	1.6	40
2695	Structural Determinants of the Closed KCa3.1 Channel Pore in Relation to Channel Gating: Results from a Substituted Cysteine Accessibility Analysis. Journal of General Physiology, 2007, 129, 299-315.	0.9	40
2696	Probing the Structure of the Dimeric KtrB Membrane Protein. Journal of Biological Chemistry, 2007, 282, 35046-35055.	1.6	20
2697	Contribution of the Putative Inner-Pore Region to the Gating of the Transient Receptor Potential Vanilloid Subtype 1 Channel (TRPV1). Journal of Neuroscience, 2007, 27, 7578-7585.	1.7	61
2698	Cadmium Trapping in an Epithelial Sodium Channel Pore Mutant. Journal of Biological Chemistry, 2007, 282, 31928-31936.	1.6	10
2699	Structural Basis of Na+ Activation Mimicry in Murine Thrombin. Journal of Biological Chemistry, 2007, 282, 16355-16361.	1.6	13
2700	Activation Gating of hERG Potassium Channels. Journal of Biological Chemistry, 2007, 282, 31972-31981.	1.6	40
2701	Probing the Architecture of an L-type Calcium Channel with a Charged Phenylalkylamine. Journal of Biological Chemistry, 2007, 282, 3864-3870.	1.6	23
2702	Interaction Sites between the Slo1 Pore and the NH2 Terminus of the β2 Subunit, Probed with a Three-residue Sensor. Journal of Biological Chemistry, 2007, 282, 17720-17728.	1.6	11
2703	Molecular Mapping of the Binding Site for a Blocker of Hyperpolarization-Activated, Cyclic Nucleotide-Modulated Pacemaker Channels. Journal of Pharmacology and Experimental Therapeutics, 2007, 322, 931-939.	1.3	50
2704	Identification and Characterization of the Slowly Exchanging pH-dependent Conformational Rearrangement in KcsA. Journal of Biological Chemistry, 2007, 282, 15179-15186.	1.6	78
2705	Intracellular cAMPâ€modulated gate in Hyperpolarization activated cation channels. Animal Cells and Systems, 2007, 11, 169-173.	0.2	1
2706	The GIRK1 Brain Variant GIRK1d and Its Functional Impact on Heteromultimeric GIRK Channels. Journal of Receptor and Signal Transduction Research, 2007, 27, 369-382.	1.3	4
2707	Chromanol 293B Binding in KCNQ1 (Kv7.1) Channels Involves Electrostatic Interactions with a Potassium Ion in the Selectivity Filter. Molecular Pharmacology, 2007, 71, 1503-1511.	1.0	89
2708	Insight into the selectivity and gating functions of Streptomyces lividans KcsA. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 4342-4346.	3.3	23

#	Article	IF	CITATIONS
2709	Principles underlying energetic coupling along an allosteric communication trajectory of a voltage-activated K ⁺ channel. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 19813-19818.	3.3	95
2710	Structural and Thermodynamic Properties of Selective Ion Binding in a K+ Channel. PLoS Biology, 2007, 5, e121.	2.6	206
2711	Evolution and structural diversification of hyperpolarization-activated cyclic nucleotide-gated channel genes. Physiological Genomics, 2007, 29, 231-245.	1.0	62
2712	From Interactions of Single Transmembrane Helices to Folding of α-Helical Membrane Proteins: Analyzing Transmembrane Helix-Helix Interactions in Bacteria. Current Protein and Peptide Science, 2007, 8, 45-61.	0.7	40
2713	Evidence for a Deep Pore Activation Gate in Small Conductance Ca2+-activated K+ Channels. Journal of General Physiology, 2007, 130, 601-610.	0.9	41
2714	Microhydration of Cs+ ion: A density functional theory study on Cs+–(H2O)n clusters (n=1–10). Journal of Chemical Physics, 2007, 127, 044303.	1.2	28
2715	Charge state of the fast gate in chloride channels: Insights from electrostatic calculations in a schematic model. Journal of Chemical Physics, 2007, 127, 195102.	1.2	4
2716	Common patterns and unique features of P-type ATPases: a comparative view on the KdpFABC complex from <i>Escherichia coli</i> (Review). Molecular Membrane Biology, 2007, 24, 375-386.	2.0	40
2717	A search for genes that may confer divergent morphology and function in the carotid body between two strains of mice. American Journal of Physiology - Lung Cellular and Molecular Physiology, 2007, 292, L704-L715.	1.3	39
2718	Cloning and expression of cardiac Kir2.1 and Kir2.2 channels in thermally acclimated rainbow trout. American Journal of Physiology - Regulatory Integrative and Comparative Physiology, 2007, 292, R2328-R2339.	0.9	24
2719	Predictive Models for hERG Channel Blockers: Ligand-Based and Structure-Based Approaches. Current Medicinal Chemistry, 2007, 14, 3003-3026.	1.2	42
2720	Multiple Modes of A-Type Potassium Current Regulation. Current Pharmaceutical Design, 2007, 13, 3178-3184.	0.9	22
2721	Quantitative In Silico Analysis of Ion Exchange from Chromatography to Protein. Journal of Liquid Chromatography and Related Technologies, 2007, 30, 1251-1275.	0.5	3
2722	SCAM analysis reveals a discrete region of the pore turret that modulates slow inactivation in Kv1.5. American Journal of Physiology - Cell Physiology, 2007, 292, C1041-C1052.	2.1	14
2723	Potassium Channel Gating in the Absence of the Highly Conserved Glycine of the Inner Transmembrane Helix. Channels, 2007, 1, 189-197.	1.5	10
2724	The CaV1.4 Calcium Channel: More Than Meets the Eye. Channels, 2007, 1, 4-11.	1.5	25
2725	Docking of μ-Conotoxin GIIIA in the Sodium Channel Outer Vestibule. Channels, 2007, 1, 344-352.	1.5	49
2726	Transient Receptor Potential Channels and Intracellular Signaling. International Review of Cytology, 2007, 256, 35-67.	6.2	11

		CITATION RE	PORT	
#	Article		IF	Citations
2727	Simulating the bioâ \in "nanoelectronic interface. Journal of Physics Condensed Matter, 2007, 1	э, 215205.	0.7	2
2728	Understanding Structure and Function of Membrane Proteins Using Free Energy Calculations. 187-211.	, 0, ,		0
2729	Molecular Determinant for Specific Ca/Ba Selectivity Profiles of Low and High Threshold Ca2+ Channels. Journal of General Physiology, 2007, 130, 415-425.		0.9	22
2730	Tuning Ion Current Rectification in Synthetic Nanotubes. , 2007, , 349-365.			8
2731	Importance of Hydration and Dynamics on the Selectivity of the KcsA and NaK Channels. Journ General Physiology, 2007, 129, 135-143.	nal of	0.9	178
2732	Protein Crystallography. , 2007, , 449-472.			2
2733	In Vivo Identification and Manipulation of the Ca2+ Selectivity Filter in the Drosophila Transie Receptor Potential Channel. Journal of Neuroscience, 2007, 27, 604-615.	nt	1.7	52
2734	Dynamic oligomeric conversions of the cytoplasmic RCK domains mediate MthK potassium ch activity. Proceedings of the National Academy of Sciences of the United States of America, 20 2151-2156.	iannel 107, 104,	3.3	25
2735	Effects of Neutral Salts and Alcohols on the Activity of Streptomyces caespitosus Neutral Prot Journal of Biochemistry, 2007, 142, 317-324.	ease.	0.9	6
2736	Role of Positively Charged Amino Acids in the M2 _D Transmembrane Helix of Ktr/T Type Cation Transporters. Channels, 2007, 1, 161-171.	rk/HKT	1.5	44
2737	A Quantitative Description of KcsA Gating II: Single-Channel Currents. Journal of General Phys 2007, 130, 479-496.	iology,	0.9	86
2738	Adaptive torsion-angle quasi-statics: a general simulation method with applications to protein structure analysis and design. Bioinformatics, 2007, 23, i408-i417.		1.8	28
2739	Comparative Studies of Anthraquinone- and Anthracene-Tetraamines as Blockers of N-Methyl-d-aspartate Receptors. Journal of Pharmacology and Experimental Therapeutics, 200 47-55.	17, 320,	1.3	25
2740	Gating and Inward Rectifying Properties of the MthK K+ Channel with and without the Gating Journal of General Physiology, 2007, 129, 109-120.	Ring.	0.9	54
2741	Na+/Cl- Dipole Couples Agonist Binding to Kainate Receptor Activation. Journal of Neuroscien 27, 6800-6809.	ce, 2007,	1.7	31
2742	Sodium Flux Ratio in Na/K Pump-Channels Opened by Palytoxin. Journal of General Physiology 41-54.	, 2007, 130,	0.9	20
2743	Sodium Channel Auxiliary Subunits. Journal of Molecular Microbiology and Biotechnology, 200 249-262.)7, 12,	1.0	27
2744	Cooperative transport in a potassium ion channel. Journal of Chemical Physics, 2007, 127, 04	5103.	1.2	28

ARTICLE IF CITATIONS # Genetic Dissection of the Divergent Activities of the Multifunctional Membrane Sensor BglF. Journal 2745 1.0 1 of Bacteriology, 2007, 189, 8601-8615. Uncoupling Proton Activation of Vanilloid Receptor TRPV1. Journal of Neuroscience, 2007, 27, 2746 1.7 123 12797-12807. Increased Functional Diversity of Plant K+ Channels by Preferential Heteromerization of the 2747 1.6 65 Shaker-like Subunits AKT2 and KAT2. Journal of Biological Chemistry, 2007, 282, 486-494. Patch Clamp and Phenotypic Analyses of a Prokaryotic Cyclic Nucleotide-gated K+ Channel Using 2748 Escherichia coli as a Host. Journal of Biological Chémistry, 2007, 282, 24294-24301. The Role of Distal S6 Hydrophobic Residues in the Voltage-dependent Gating of CaV2.3 Channels. 2749 1.6 22 Journal of Biological Chemistry, 2007, 282, 27944-27952. A Quantitative Description of KcsA Gating I: Macroscopic Currents. Journal of General Physiology, 2750 2007, 130, 465-478. Microbial TRP Channels and Their Mechanosensitivity. Current Topics in Membranes, 2007, 58, 311-327. 2751 0.5 10 Structureâ€"Function Relations of MscS. Current Topics in Membranes, 2007, , 269-294. 0.5 2753 Applications of QSAR Methods to Ion Channels., 0, , 353-389. 8 Ventricular Fibrillation. Circulation Journal, 2007, 71, A1-A11. 2754 Efficient Strategies for Lead Optimization by Simultaneously Addressing Affinity, Selectivity and 2755 6 Pharmacokinetic Parameters., 0, , 705-754. 3.5 Billion Years of Mechanosensory Transduction: Structure and Function of Mechanosensitive 2756 0.5 Channels in Prokaryotes. Current Topics in Membranes, 2007, , 25-57. Electrophysiological Techniques. Current Protocols in Pharmacology, 2007, 39, 11.0.1. 2758 4.0 2 Structure of Glutamate Receptors. Current Drug Targets, 2007, 8, 573-582. 2759 1.0 Local anaesthetic toxicity. Southern African Journal of Anaesthesia and Analgesia, 2007, 13, 23-28. 2760 0.1 15 On selectivity and gating of ionic channels.., 2007, , . 2761 Physiology of epithelial Ca2+ and Mg2+ transport. Reviews of Physiology, Biochemistry and 2762 0.9 67 Pharmacology, 2007, 158, 77-160. Optimizing synthesis and expression of transmembrane peptides and proteins. Methods, 2007, 41, 2763 46 370-380.

#	Article	IF	CITATIONS
2764	Membrane protein prediction methods. Methods, 2007, 41, 460-474.	1.9	104
2765	Scanning N-glycosylation mutagenesis of membrane proteins. Methods, 2007, 41, 451-459.	1.9	40
2766	An ion-imprinted silica-supported organic–inorganic hybrid sorbent prepared by a surface imprinting technique combined with a polysaccharide incorporated sol–gel process for selective separation of cadmium(II) from aqueous solution. Talanta, 2007, 71, 1487-1493.	2.9	83
2767	Voltage-gated ion channels and gating modifier toxins. Toxicon, 2007, 49, 124-141.	0.8	560
2768	On the opening of voltage-gated ion channels. Physiology and Behavior, 2007, 92, 1-7.	1.0	28
2769	Genome-wide analysis and identification of genes related to potassium transporter families in rice (Oryza sativa L.). Plant Science, 2007, 172, 708-721.	1.7	90
2770	Polymers with Cavities Tuned for Fast Selective Transport of Small Molecules and Ions. Science, 2007, 318, 254-258.	6.0	919
2771	Membrane Protein Structure: Prediction versus Reality. Annual Review of Biochemistry, 2007, 76, 125-140.	5.0	220
2772	Ion channels of glutamate receptors: structural modeling. Molecular Membrane Biology, 2007, 24, 135-147.	2.0	33
2773	Gating of the ATP-sensitive K+ channel by a pore-lining phenylalanine residue. Biochimica Et Biophysica Acta - Biomembranes, 2007, 1768, 39-51.	1.4	12
2774	Quantum mechanical calculations of charge effects on gating the KcsA channel. Biochimica Et Biophysica Acta - Biomembranes, 2007, 1768, 1218-1229.	1.4	25
2775	Role of hydrophobic residues in the voltage sensors of the voltage-gated sodium channel. Biochimica Et Biophysica Acta - Biomembranes, 2007, 1768, 1440-1447.	1.4	6
2776	The gramicidin ion channel: A model membrane protein. Biochimica Et Biophysica Acta - Biomembranes, 2007, 1768, 2011-2025.	1.4	313
2777	Local and global structure of the monomeric subunit of the potassium channel KcsA probed by NMR. Biochimica Et Biophysica Acta - Biomembranes, 2007, 1768, 3260-3270.	1.4	33
2778	Structural constraints on the transmembrane and juxtamembrane regions of the phospholamban pentamer in membrane bilayers: Gln29 and Leu52. Biochimica Et Biophysica Acta - Biomembranes, 2007, 1768, 2971-2978.	1.4	14
2779	Conserved motifs in voltage-sensing and pore-forming modules of voltage-gated ion channel proteins. Biochemical and Biophysical Research Communications, 2007, 352, 292-298.	1.0	16
2780	A novel structure-based virtual screening model for the hERG channel blockers. Biochemical and Biophysical Research Communications, 2007, 355, 889-894.	1.0	55
2781	Preemptive analgesia with lidocaine prevents Failed Back Surgery Syndrome. Experimental Neurology, 2007, 204, 589-596.	2.0	23

#	Article	IF	CITATIONS
2782	The Neuronal Channel NALCN Contributes Resting Sodium Permeability and Is Required for Normal Respiratory Rhythm. Cell, 2007, 129, 371-383.	13.5	299
2783	Discovering Potassium Channel Blockers from Synthetic Compound Database by Using Structure-Based Virtual Screening in Conjunction with Electrophysiological Assay. Journal of Medicinal Chemistry, 2007, 50, 83-93.	2.9	31
2784	Discontinuous membrane helices in transport proteins and their correlation with function. Journal of Structural Biology, 2007, 159, 261-267.	1.3	133
2785	Breaking the bottleneck: Eukaryotic membrane protein expression for high-resolution structural studies. Journal of Structural Biology, 2007, 160, 265-274.	1.3	81
2786	Mechanism of Intracellular Block of the KcsA K+ Channel by Tetrabutylammonium: Insights from X-ray Crystallography, Electrophysiology and Replica-exchange Molecular Dynamics Simulations. Journal of Molecular Biology, 2007, 365, 649-662.	2.0	57
2787	Crystallographic Study of the Tetrabutylammonium Block to the KcsA K+ Channel. Journal of Molecular Biology, 2007, 366, 806-814.	2.0	49
2788	The TRPC3 Channel Has a Large Internal Chamber Surrounded by Signal Sensing Antennas. Journal of Molecular Biology, 2007, 367, 373-383.	2.0	82
2789	Intrinsically Disordered Regions of Human Plasma Membrane Proteins Preferentially Occur in the Cytoplasmic Segment. Journal of Molecular Biology, 2007, 368, 902-913.	2.0	90
2790	Modelling the pH-dependent Properties of Kv1 Potassium Channels. Journal of Molecular Biology, 2007, 368, 328-335.	2.0	8
2791	Structural Basis of Aquaporin Inhibition by Mercury. Journal of Molecular Biology, 2007, 368, 607-617.	2.0	127
2792	Molecular Evolution and Structural Analysis of the Ca2+ Release-Activated Ca2+ Channel Subunit, Orai. Journal of Molecular Biology, 2007, 368, 1284-1291.	2.0	58
2793	Direct Visualization of KirBac3.1 Potassium Channel Gating by Atomic Force Microscopy. Journal of Molecular Biology, 2007, 374, 500-505.	2.0	28
2794	In vitro synthesis, tetramerization and single channel characterization of virus-encoded potassium channel Kcv. FEBS Letters, 2007, 581, 1027-1034.	1.3	25
2795	Membrane protein assembly patterns reflect selection for non-proliferative structures. FEBS Letters, 2007, 581, 1335-1341.	1.3	13
2796	Potassium transporters in plants - Involvement in K+acquisition, redistribution and homeostasis. FEBS Letters, 2007, 581, 2348-2356.	1.3	333
2797	K+channel activity in plants: Genes, regulations and functions. FEBS Letters, 2007, 581, 2357-2366.	1.3	268
2798	The MlotiK1 channel transports ions along the canonical conduction pore. FEBS Letters, 2007, 581, 5024-5028.	1.3	2
2799	Phosphatidic acid plays a special role in stabilizing and folding of the tetrameric potassium channel KcsA. FEBS Letters, 2007, 581, 5715-5722.	1.3	46

	CHATION R	EPORT	
#	Article	IF	CITATIONS
2800	Transmembraneion transport by calixarenes and their derivatives. Dalton Transactions, 2007, , 26-32.	1.6	49
2801	Normal-Mode Analysis of the Glycine Alpha1 Receptor by Three Separate Methods. Journal of Chemical Information and Modeling, 2007, 47, 1572-1579.	2.5	32
2802	Functionalized cucurbiturils and their applications. Chemical Society Reviews, 2007, 36, 267-279.	18.7	858
2803	Indole, the aromatic element of tryptophan, as a pi-donor and amphiphilic headgroup. International Congress Series, 2007, 1304, 1-14.	0.2	14
2804	CLC chloride channels and transporters: a biophysical and physiological perspective. , 2007, 158, 23-76.		100
2805	Fluorescently Labeled Analogues of Dofetilide as High-Affinity Fluorescence Polarization Ligands for the Human Ether-a-go-go-Related Gene (hERG) Channel. Journal of Medicinal Chemistry, 2007, 50, 2931-2941.	2.9	41
2806	Free energy simulations of single and double ion occupancy in gramicidin A. Journal of Chemical Physics, 2007, 126, 105103.	1.2	30
2807	Transporters as Channels. Annual Review of Physiology, 2007, 69, 87-112.	5.6	77
2808	Synthetic pores with sticky π-clamps. Organic and Biomolecular Chemistry, 2007, 5, 1369-1380.	1.5	23
2809	Rigid-rod anion–π slides for multiion hopping across lipid bilayers. Organic and Biomolecular Chemistry, 2007, 5, 3000.	1.5	167
2810	Large-Scale Dynamical Models and Estimation for Permeation in Biological Membrane Ion Channels. Proceedings of the IEEE, 2007, 95, 853-880.	16.4	23
2811	Biological Membrane Ion Channels. Biological and Medical Physics Series, 2007, , .	0.3	48
2812	Overview of Sources of New Drugs. , 2007, , 321-353.		0
2813	Molecular Properties of Kcv, a Virus Encoded K+ Channel. Biochemistry, 2007, 46, 1079-1090.	1.2	47
2814	Biologically active, synthetic ion transporters. Chemical Society Reviews, 2007, 36, 378-389.	18.7	106
2815	Characterizing the 1,4-Dihydropyridines Binding Interactions in the L-Type Ca2+Channel:Â Model Construction and Docking Calculations. Journal of Medicinal Chemistry, 2007, 50, 1504-1513.	2.9	95
2816	Macromolecular Crystallography Protocols. Methods in Molecular Biology, 2007, , .	0.4	2
2817	Inositol Trisphosphate Receptor Ca2+ Release Channels. Physiological Reviews, 2007, 87, 593-658.	13.1	1,066

#	Article	IF	Citations
2818	Interaction Simulation of hERG K+Channel with Its Specific BeKm-1 Peptide:Â Insights into the Selectivity of Molecular Recognition. Journal of Proteome Research, 2007, 6, 611-620.	1.8	53
2819	Yeast screens show aromatic residues at the end of the sixth helix anchor transient receptor potential channel gate. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 15555-15559.	3.3	45
2820	Insight into the origins of the barrier-less knock-on conduction in the KcsA channel: molecular dynamics simulations and ab initio calculations. Physical Chemistry Chemical Physics, 2007, 9, 1219.	1.3	12
2821	Artificial transmembrane ion channels from commercial surfactants. Chemical Communications, 2007, , 3951.	2.2	26
2822	Novel Mutations in the <i>KCNV2</i> Gene in Patients with Cone Dystrophy and a Supernormal Rod Electroretinogram. Ophthalmic Genetics, 2007, 28, 135-142.	0.5	39
2823	Thrombin allostery. Physical Chemistry Chemical Physics, 2007, 9, 1291.	1.3	46
2824	The effect of midpolar regime mimics on anion transport mediated by amphiphilic heptapeptides. New Journal of Chemistry, 2007, 31, 1960.	1.4	13
2825	Molecular Dynamics Simulation of the Cytosolic Mouth in Kcv-Type Potassium Channels. Biochemistry, 2007, 46, 4826-4839.	1.2	40
2826	Modeling the selective partitioning of cations into negatively charged nanopores in water. Journal of Chemical Physics, 2007, 126, 084706.	1.2	63
2827	Role of the Intracellular Cavity in Potassium Channel Conductivity. Journal of Physical Chemistry B, 2007, 111, 13993-14000.	1.2	13
2828	Artificial Sieves for Quasimassless Particles. Physical Review Letters, 2007, 99, 150605.	2.9	48
2829	Dependence of Positive Binding Energies on Side ChainsA Theoretical Prediction on the Origin of Regular Ordering for the Amino Acid Residues in the Selectivity Filter. Journal of Physical Chemistry B, 2007, 111, 13786-13796.	1.2	2
2830	Molecular Mechanism of the Sea Anemone Toxin ShK Recognizing the Kv1.3 Channel Explored by Docking and Molecular Dynamic Simulations. Journal of Chemical Information and Modeling, 2007, 47, 1967-1972.	2.5	29
2831	Recent Advances in Synthetic Membrane Transporters. Supramolecular Chemistry, 2007, 19, 29-37.	1.5	52
2832	Orientation and Motion of Tryptophan Interfacial Anchors in Membrane-Spanning Peptides. Biochemistry, 2007, 46, 7514-7524.	1.2	48
2833	How Protein Transmembrane Segments Sense the Lipid Environmentâ€. Biochemistry, 2007, 46, 1457-1465.	1.2	144
2834	ProtSqueeze:  Simple and Effective Automated Tool for Setting up Membrane Protein Simulations. Journal of Chemical Information and Modeling, 2007, 47, 1986-1994.	2.5	23
2835	Probing Hydrogen Bonding and Ionâ^'Carbonyl Interactions by Solid-State170 NMR Spectroscopy:Â G-Ribbon and G-Quartet. Journal of the American Chemical Society, 2007, 129, 2398-2407.	6.6	67

#	Article	lF	Citations
2836	Membrane Topology Prediction by Hydropathy Profile Alignment:  Membrane Topology of the Na+-Glutamate Transporter GltS. Biochemistry, 2007, 46, 2326-2332.	1.2	19
2837	Molecular Dynamics and Continuum Electrostatics Studies of Inactivation in the HERG Potassium Channel. Journal of Physical Chemistry B, 2007, 111, 1090-1098.	1.2	21
2838	ON THE ACTION POTENTIAL AS A PROPAGATING DENSITY PULSE AND THE ROLE OF ANESTHETICS. Biophysical Reviews and Letters, 2007, 02, 57-78.	0.9	93
2839	Expression of Recombinant G-Protein Coupled Receptors for Structural Biology. Molecular BioSystems, 2007, 3, 723.	2.9	23
2840	Homology Models Applied to Toxicology. , 0, , 433-468.		0
2841	Backbone Structure of the Amantadine-Blocked Trans-Membrane Domain M2 Proton Channel from Influenza A Virus. Biophysical Journal, 2007, 92, 4335-4343.	0.2	175
2842	On the Origin of Asymmetric Interactions between Permeant Anions and the Cystic Fibrosis Transmembrane Conductance Regulator Chloride Channel Pore. Biophysical Journal, 2007, 92, 1241-1253.	0.2	21
2843	Stability of the Shab K+ Channel Conductance in 0 K+ Solutions: The Role of the Membrane Potential. Biophysical Journal, 2007, 93, 4197-4208.	0.2	7
2844	Probing the Outer Mouth Structure of the hERG Channel with Peptide Toxin Footprinting and Molecular Modeling. Biophysical Journal, 2007, 92, 3524-3540.	0.2	90
2845	Conduction Properties of KcsA Measured Using Brownian Dynamics with Flexible Carbonyl Groups in the Selectivity Filter. Biophysical Journal, 2007, 93, 44-53.	0.2	24
2846	Mechanism of Block of the hERG K+ Channel by the Scorpion Toxin CnErg1. Biophysical Journal, 2007, 92, 3915-3929.	0.2	35
2847	The Protonation State of the Glu-71/Asp-80 Residues in the KcsA Potassium Channel: A First-Principles QM/MM Molecular Dynamics Study. Biophysical Journal, 2007, 93, 2315-2324.	0.2	38
2848	Measuring the Force Production of the Hormogonia of Mastigocladus laminosus. Biophysical Journal, 2007, 93, 699-703.	0.2	11
2849	Electrostatic Domino Effect in the Shaker K Channel Turret. Biophysical Journal, 2007, 93, 2307-2314.	0.2	15
2850	Steric Selectivity in Na Channels Arising from Protein Polarization and Mobile Side Chains. Biophysical Journal, 2007, 93, 1960-1980.	0.2	111
2851	An Inactivation Gate in the Selectivity Filter of KCNQ1 Potassium Channels. Biophysical Journal, 2007, 93, 4159-4172.	0.2	29
2852	The Predominant Role of Coordination Number in Potassium Channel Selectivity. Biophysical Journal, 2007, 93, 2635-2643.	0.2	101
2853	The development of yoctowells as a basis for modeling biological systems. Organic and Biomolecular Chemistry, 2007, 5, 3733.	1.5	13

# 2854	ARTICLE Calcicludine Binding to the Outer Pore of L-type Calcium Channels Is Allosterically Coupled to Dihydropyridine Binding. Biochemistry, 2007, 46, 7590-7598.	IF 1.2	CITATIONS
2855	Metals in membranes. Chemical Society Reviews, 2007, 36, 968.	18.7	25
2856	Coordination-Driven Self-Assembly of Metallodendrimers Possessing Well-Defined and Controllable Cavities as Cores. Journal of the American Chemical Society, 2007, 129, 2120-2129.	6.6	129
2857	Ryanodine receptor structure, function and pathophysiology. New Comprehensive Biochemistry, 2007, 41, 287-342.	0.1	9
2858	BKCa-Channel Structure and Function. , 2007, , 171-218.		8
2859	Molecular Dynamics Simulations of Inwardly Rectifying (Kir) Potassium Channels:Â A Comparative Studyâ€. Biochemistry, 2007, 46, 3643-3652.	1.2	40
2860	Calix[4]tubes and Calix[4] semitubes. , 2007, , 109-133.		2
2861	Redox Control of Calcium Channels: From Mechanisms to Therapeutic Opportunities. Antioxidants and Redox Signaling, 2007, 9, 409-435.	2.5	147
2862	Methods in Membrane Lipids. Methods in Molecular Biology, 2007, , .	0.4	21
2863	In Silico Models to Predict QT Prolongation. , 2007, , 933-955.		3
2864	Ion Channels: Insights for Drug Design from Structure and Modeling. , 2007, , 703-724.		0
2869	Organometallic Polymers Assembled from Cation–π Interactions: Use of Ferrocene as a Ditopic Linker Within the Homologous Series [{(Me3Si)2NM}2â‹(Cp2Fe)]â^ž (M=Na, K, Rb, Cs; Cp=cyclopentadienyl). Chemistry - A European Journal, 2007, 13, 4418-4432.	1.7	55
2870	Efficient Synthesis and Astonishing Supramolecular Architectures of Several Symmetric Macrolactams. Chemistry - A European Journal, 2007, 13, 9223-9235.	1.7	32
2871	Biomembranen – WÜhter des zelluläen Grenzverkehrs. Von Pumpen, Carriern und Kanäen. Biologie in Unserer Zeit, 2007, 37, 310-319.	0.3	1
2872	Synthetic, Biologically Active Amphiphilic Peptides. Chemistry and Biodiversity, 2007, 4, 1395-1412.	1.0	13
2873	Hydropathic Analysis and Comparison of KcsA and Shaker Potassium Channels. Chemistry and Biodiversity, 2007, 4, 2578-2592.	1.0	4
2874	Genotype-phenotype correlations ofKCNJ2 mutations in Japanese patients with Andersen-Tawil syndrome. Human Mutation, 2007, 28, 208-208.	1.1	61
2875	Novel microdeletion in the transforming growth factor Î ² type II receptor gene is associated with giant and large cell variants of nonsmall cell lung carcinoma. Genes Chromosomes and Cancer, 2007, 46, 192-201.	1.5	18

#	Article	IF	CITATIONS
2876	Protein Dynamics Tightly Connected to the Dynamics of Surrounding and Internal Water Molecules. ChemPhysChem, 2007, 8, 23-33.	1.0	97
2877	A double catgrip mixed l and d mini protein only 20 residues long. Bioorganic and Medicinal Chemistry, 2007, 15, 3874-3882.	1.4	18
2878	Nested [Na6(H2O)]6+ encapsulation of nickel(II) coordination framework assembled from pyridyl-2,6-dicarboxylic acid. Inorganic Chemistry Communication, 2007, 10, 455-458.	1.8	4
2879	A first-principles computational 170 NMR investigation of metal ion–oxygen interactions in carboxylate oxygens of alkali oxalates. Chemical Physics, 2007, 337, 144-150.	0.9	24
2880	Solid-state NMR study and assignments of the KcsA potassium ion channel of S. lividans. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2007, 1774, 1604-1613.	1.1	30
2881	Physiologic principles underlying ion channelopathies. Neurotherapeutics, 2007, 4, 174-183.	2.1	46
2882	Fluctuation assisted diffusion through ion channels. Physica A: Statistical Mechanics and Its Applications, 2007, 380, 172-190.	1.2	4
2883	Monte Carlo-energy minimization of correolide in the Kv1.3 channel: possible role of potassium ion in ligand-receptor interactions. , 2007, 7, 5.		26
2884	At the crossroads of biomacromolecular research: highlighting the interdisciplinary nature of the field. Chemistry Central Journal, 2007, 1, 4.	2.6	2
2885	THEMATICS analysis for functional ion channels. International Journal of Quantum Chemistry, 2007, 107, 2075-2081.	1.0	0
2886	Study of the effect of metal ions on hydroxyl–containing molecules. International Journal of Quantum Chemistry, 2007, 107, 2730-2740.	1.0	3
2887	Drug block of the hERG potassium channel: Insight from modeling. Proteins: Structure, Function and Bioinformatics, 2007, 68, 568-580.	1.5	100
2888	Transpath: A computational method for locating ion transit pathways through membrane proteins. Proteins: Structure, Function and Bioinformatics, 2008, 71, 1349-1359.	1.5	10
2889	The investigation of interactions of κâ€Hefutoxin1 with the voltageâ€gated potassium channels: A computational simulation. Proteins: Structure, Function and Bioinformatics, 2008, 71, 1441-1449.	1.5	7
2890	Proteomics in human cancer research. Proteomics - Clinical Applications, 2007, 1, 4-17.	0.8	25
2891	Cation sitting in aromatic cages:ab initio computational studies on tetramethylammonium–(benzene)n (n=3–4) complexes. Journal of Physical Organic Chemistry, 2007, 20, 448-453.	0.9	10
2892	Outward stabilization of the S4 segments in domains III and IV enhances lidocaine block of sodium channels. Journal of Physiology, 2007, 582, 317-334.	1.3	58
2893	Role of the S6 Câ€ŧerminus in KCNQ1 channel gating. Journal of Physiology, 2007, 585, 325-337.	1.3	44

	Сітаті	on Report	
# 2894	ARTICLE Topography of the active site of the Saccharomyces cerevisiae plasmalemmal dicarboxylate transporter studied using lipophilic derivatives of its substrates. Biochemistry (Moscow), 2007, 72, 264-274.	IF 0.7	CITATIONS 3
2895	Complex plasma in narrow channels: Impact of confinement on the local order. JETP Letters, 2007, 85, 498-502.	0.4	17
2896	A local route to pain relief. Nature, 2007, 449, 545-546.	13.7	18
2897	Cold meeting at a junction. Nature, 2007, 449, 547-549.	13.7	3
2898	Subunit counting in membrane-bound proteins. Nature Methods, 2007, 4, 319-321.	9.0	632
2899	Channel-mediated potassium uptake in Helicobacter pylori is essential for gastric colonization. EMBO Journal, 2007, 26, 232-241.	3.5	37
2900	Crystal structure of a Kir3.1-prokaryotic Kir channel chimera. EMBO Journal, 2007, 26, 4005-4015.	3.5	281
2901	The neuronal background K2P channels: focus on TREK1. Nature Reviews Neuroscience, 2007, 8, 251-261.	. 4.9	428
2902	Conformational dynamics of the KcsA potassium channel governs gating properties. Nature Structural and Molecular Biology, 2007, 14, 1089-1095.	3.6	121
2903	Structure of acid-sensing ion channel 1 at 1.9 à resolution and low pH. Nature, 2007, 449, 316-323	. 13.7	979
2904	Dynamic personalities of proteins. Nature, 2007, 450, 964-972.	13.7	2,042
2905	The membrane protein universe: what's out there and why bother?. Journal of Internal Medicine, 2007, 261, 543-557.	2.7	177
2906	TPK1, a Ca ²⁺ â€regulated Arabidopsis vacuole twoâ€pore K ⁺ channel is activate 14â€3â€3 proteins. Plant Journal, 2007, 52, 449-459.	ed by 2.8	136
2907	Assessing the ability of sequence-based methods to provide functional insight within membrane integral proteins: a case study analyzing the neurotransmitter/Na+ symporter family. BMC Bioinformatics, 2007, 8, 397.	1.2	7
2908	Phylogenomic analyses of KCNA gene clusters in vertebrates: why do gene clusters stay intact?. BMC Evolutionary Biology, 2007, 7, 139.	3.2	22
2909	Molecular determinants of permeation through the cation channel TRPM6. Cell Calcium, 2007, 41, 513-523.	1.1	62
2910	Simulation of biological ion channels with technology computer-aided design. Computer Methods and Programs in Biomedicine, 2007, 85, 1-7.	2.6	6
2911	Activation of inwardly rectifying potassium (Kir) channels by phosphatidylinosital-4,5-bisphosphate (PIP2): Interaction with other regulatory ligands. Progress in Biophysics and Molecular Biology, 2007, 94, 320-335.	1.4	60

CITATION REPORT ARTICLE IF CITATIONS Prediction of Protein-Protein Association Rates from a Transition-State Theory. Structure, 2007, 15, 61 1.6 215-224. Normal-Mode Refinement of Anisotropic Thermal Parameters for Potassium Channel KcsA at 3.2 Ã... 1.6 29 Crystallographic Resolution. Structure, 2007, 15, 955-962. Open-State Conformation of the KcsA K+ Channel: Monte Carlo Normal Mode Following Simulations. 37 1.6 Structure, 2007, 15, 1654-1662. MOLE: A Voronoi Diagram-Based Explorer of Molecular Channels, Pores, and Tunnels. Structure, 2007, 15, 1357-1363. Asymmetric calix[4]-thiacalix[4] arene tubes: Synthesis and ionophore properties. Russian Journal of 0.3 5 Organic Chemistry, 2007, 43, 192-200. Binding of the General Anesthetics Chloroform and 2,2,2-Trichloroethanol to the Hydrophobic Core of a Four- \hat{l} ±-Helix Bundle Protein¶. Photochemistry and Photobiology, 2003, 77, 89-95. 1.3 Surface and Dynamic Structures of Bacteriorhodopsin in a 2D Crystal, a Distorted or Disrupted 2918 Lattice, as Revealed by Site-directed Solid-state 13C NMRâ€. Photochemistry and Photobiology, 2007, 83, 1.315 253-262. A gate mechanism indicated in the selectivity filter of the potassium channel KscA. Theoretical 0.5 Chemistry Accounts, 2007, 117, 1121-1129. Accessibility of Four Arginine Residues on the S4 Segment of the Bacillus halodurans Sodium Channel. 2920 1.0 17 Journal of Membrane Biology, 2007, 215, 169-180. Charges in the Cytoplasmic Pore Control Intrinsic Inward Rectification and Single-Channel Properties 1.0 in Kir1.1 and Kir2.1 Channels. Journal of Membrane Biology, 2007, 215, 181-193. Magnetic resonance in the solid state: applications to protein folding, amyloid fibrils and membrane 2922 1.2 11 proteins. European Biophysics Journal, 2007, 36, 37-48. Eukaryotic integral membrane protein expression utilizing the Escherichia coli glycerol-conducting channel protein (GlpF). Applied Microbiology and Biotechnology, 2007, 77, 375-381. The CorA family: Structure and function revisited. Cellular and Molecular Life Sciences, 2007, 64, 2.4 72 2564-2574. Structure of the genetic code suggested by the hydropathy correlation between anticodons and 0.8 16 amino acid residues. Origins of Life and Evolution of Biospheres, 2007, 37, 83-103. Exploring free-energy profiles through ion channels: Comparison on a test case. Journal of 2926 7 1.3 Computational Electronics, 2007, 6, 373-376. Mixed-time parallel evolution in multiple quantum NMR experiments: sensitivity and resolution enhancement in heteronuclear NMR. Journal of Biomolecular NMR, 2007, 37, 195-204. ICMRBS founder's medal 2006: Biological solid-state NMR, methods and applications. Journal of 2928 1.6 27 Biomolecular NMR, 2007, 39, 73-86.

The K+-translocating KdpFABC complex from Escherichia coli: A P-type ATPase with unique features. 2929 34 Journal of Bioenergetics and Biomembranes, 2007, 39, 397-402.

2912

2914

2916

2919

2924

2927

#	Article	IF	CITATIONS
2930	Structure and ion selectivity of the open potential-dependent potassium channel. Journal of Structural Chemistry, 2007, 48, 170-172.	0.3	0
2931	A structural perspective on copper uptake in eukaryotes. BioMetals, 2007, 20, 705-716.	1.8	70
2932	Anthraquinone polyamines: novel channel blockers of N-methyl-d-aspartate receptors. Amino Acids, 2007, 33, 299-304.	1.2	10
2933	ABCC8 and ABCC9: ABC transporters that regulate K+ channels. Pflugers Archiv European Journal of Physiology, 2007, 453, 703-718.	1.3	140
2934	Serine-401 as a batrachotoxin- and local anesthetic-sensing residue in the human cardiac Na+ channel. Pflugers Archiv European Journal of Physiology, 2007, 454, 277-287.	1.3	23
2935	Phosphoinositide-mediated gating of inwardly rectifying K+ channels. Pflugers Archiv European Journal of Physiology, 2007, 455, 83-95.	1.3	106
2936	The selectivity, voltage-dependence and acid sensitivity of the tandem pore potassium channel TASK-1: contributions of the pore domains. Pflugers Archiv European Journal of Physiology, 2007, 455, 333-348.	1.3	27
2937	Gene expression profile of Clonorchis sinensis metacercariae. Parasitology Research, 2007, 102, 277-282.	0.6	28
2938	Molecular docking study of the binding of aminopyridines within the K+ channel. Journal of Molecular Modeling, 2007, 13, 579-586.	0.8	26
2939	lon conductance vs. pore gating and selectivity in KcsA channel: Modeling achievements and perspectives. Journal of Molecular Modeling, 2007, 13, 699-713.	0.8	23
2940	Biophysical, pharmacological, and functional characteristics of cloned and native mammalian two-pore domain K+ channels. Cell Biochemistry and Biophysics, 2007, 47, 209-256.	0.9	160
2941	Electrically tunable solid-state silicon nanopore ion filter. Nanoscale Research Letters, 2007, 2, 61-68.	3.1	30
2942	Structural models of human big conductance calcium- and voltage-gated potassium channels. Computer Physics Communications, 2007, 177, 21-26.	3.0	2
2943	Integrated electrodes on a silicon based ion channel measurement platform. Biosensors and Bioelectronics, 2007, 23, 183-190.	5.3	30
2944	Quantifying noise-induced stability of a cortical fast-spiking cell model with Kv3-channel-like current. BioSystems, 2007, 89, 110-116.	0.9	15
2945	Organometallic cavitands: Cation–π interactions and anion binding via π-metallation. Coordination Chemistry Reviews, 2007, 251, 1747-1760.	9.5	74
2946	The binding site dependence of binding energy in both metalated and protonated diglycine and triglycine peptides. Chemical Physics, 2007, 334, 64-76.	0.9	2
2947	Air–water interfacial behavior of amphiphilic peptide analogs of synthetic chloride ion transporters. Journal of Membrane Science, 2008, 321, 43-50.	4.1	11

ARTICLE IF CITATIONS Coordination and transport of alkali metal cations through phospholipid bilayer membranes by 2948 9.5 45 hydraphile channels. Coordination Chemistry Reviews, 2008, 252, 886-902. Effects of tensile stress on the $\hat{l}\pm 1$ nicotinic acetylcholine receptor expression in maxillofacial skeletal myocytes. Molecular and Cellular Biochemistry, 2008, 311, 51-56. 2949 1.4 Mechanisms of action of ligands of potential-dependent sodium channels. Neuroscience and 2950 0.2 0 Behavioral Physiology, 2008, 38, 461-469. The mitochondrial ADP/ATP carrier: functional and structural studies in the route of elucidating 1.0 pathophysiological aspects. Journal of Bioenergetics and Biomembranes, 2008, 40, 435-443. Serine peptidases: Classification, structure and function. Cellular and Molecular Life Sciences, 2008, 2952 2.4 346 65, 1220-1236. Altered KCNQ3 Potassium Channel Function Caused by the W309R Pore-Helix Mutation Found in Human Epilepsy. Journal of Membrane Biology, 2008, 222, 55-63. 1.0 Non-equivalent role of TM2 gating hinges in heteromeric Kir4.1/Kir5.1 potassium channels. European 2954 1.2 14 Biophysics Journal, 2008, 37, 165-171. Estimating the dielectric constant of the channel protein and pore. European Biophysics Journal, 1.2 2008, 37, 213-222. Brownian dynamics study of flux ratios in sodium channels. European Biophysics Journal, 2008, 38, 2956 1.2 16 45-52. Toxins from cone snails: properties, applications and biotechnological production. Applied 1.7 Microbiology and Biotechnology, 2008, 79, 1-9. Research progress in cation-i€ interactions. Science in China Series B: Chemistry, 2008, 51, 709-717. 2958 0.8 24 Novel α-KTx Sites in the BK Channel and Comparative Sequence Analysis Reveal Distinguishing Features 2959 of the BK and KV Channel Outer Pore. Cell Biochemistry and Biophysics, 2008, 52, 47-58. Polyunsaturated Fatty Acid Modulation of Voltage-Gated Ion Channels. Cell Biochemistry and 2960 0.9 103 Biophysics, 2008, 52, 59-84. Structure, Function, and Modification of the Voltage Sensor in Voltage-Gated Ion Channels. Cell Biochemistry and Biophysics, 2008, 52, 149-74. An ensemble of support vector machines for predicting the membrane protein type directly from the 2962 1.2 33 amino acid sequence. Amino Acids, 2008, 35, 573-580. Using Chou's pseudo amino acid composition to predict protein quaternary structure: a 2963 1.2 sequence-segmented PseAAC approach. Amino Acids, 2008, 35, 591-598. Methods for probing water at the nanoscale. Microfluidics and Nanofluidics, 2008, 5, 425-442. 2964 1.0 39 Localization of the ergtoxin-1 receptors on the voltage sensing domain of hERG K+ channel by AFM 2965 1.3 recognition imaging. Pflugers Archiv European Journal of Physiology, 2008, 456, 247-254.

#	Article	IF	CITATIONS
2966	Functional consequences of leucine and tyrosine mutations in the dual pore motifs of the yeast K+ channel, Tok1p. Pflugers Archiv European Journal of Physiology, 2008, 456, 883-896.	1.3	7
2967	The G604S-hERG mutation alters the biophysical properties and exerts a dominant-negative effect on expression of hERG channels in HEK293 cells. Pflugers Archiv European Journal of Physiology, 2008, 456, 917-928.	1.3	24
2968	A novel KCNQ4 pore-region mutation (p.G296S) causes deafness by impairing cell-surface channel expression. Human Genetics, 2008, 123, 41-53.	1.8	45
2969	Molecular studies of BKCa channels in intracranial arteries: presence and localization. Cell and Tissue Research, 2008, 334, 359-369.	1.5	11
2970	Perspective: peptides as mimics of transmembrane segments in proteins. Chemical Biology and Drug Design, 2008, 54, 200-207.	1.2	23
2971	The TolQ-TolR proteins energize TolA and share homologies with the flagellar motor proteins MotA-MotB. Molecular Microbiology, 2008, 42, 795-807.	1.2	177
2972	Prediction of hERG Potassium Channel Blockade Using kNNâ€QSAR and Local Lazy Regression Methods. QSAR and Combinatorial Science, 2008, 27, 1305-1317.	1.5	15
2973	Theoretical studies on the binding models of tetramethylammonium with phenol: Cationâ€i€ and hydrogenâ€bond interactions. International Journal of Quantum Chemistry, 2008, 108, 1294-1303.	1.0	3
2974	Energetics of K ⁺ permeability through Gramicidin A by forwardâ€reverse steered molecular dynamics. Proteins: Structure, Function and Bioinformatics, 2008, 73, 185-194.	1.5	26
2975	A Composite Model for hERG Blockade. ChemMedChem, 2008, 3, 254-265.	1.6	54
2976	Modeling hERG and its Interactions with Drugs: Recent Advances in Light of Current Potassium Channel Simulations. ChemMedChem, 2008, 3, 523-535.	1.6	52
2977	Biomedical Potentials of Crown Ethers: Prospective Antitumor Agents. ChemMedChem, 2008, 3, 1478-1492.	1.6	94
2978	Oriented Nanostructures for Energy Conversion and Storage. ChemSusChem, 2008, 1, 676-697.	3.6	367
2979	Modeling the hERG potassium channel in a phospholipid bilayer: Molecular dynamics and drug docking studies. Journal of Computational Chemistry, 2008, 29, 795-808.	1.5	47
2980	Exploring the conformational space of Vpu from HIVâ€1: A versatile adaptable protein. Journal of Computational Chemistry, 2008, 29, 2416-2424.	1.5	35
2982	Modeling the binding modes of Kv1.5 potassium channel and blockers. Journal of Molecular Graphics and Modelling, 2008, 27, 178-187.	1.3	22
2983	Functional and structural characterization of PKA-mediated pHi gating of ROMK1 channels. Journal of Molecular Graphics and Modelling, 2008, 27, 332-341.	1.3	4
2984	A study of mechanisms responsible for incorporation of cesium and radiocesium into fruitbodies of king oyster mushroom (Pleurotus eryngii). Journal of Environmental Radioactivity, 2008, 99, 1185-1191.	0.9	19

#	Article	IF	CITATIONS
2985	Identification of "toxicophoric―features for predicting drug-induced QT interval prolongation. European Journal of Medicinal Chemistry, 2008, 43, 2479-2488.	2.6	18
2986	Molecular interactions in solvent-filled yoctowells (10â^'24ÂL) and zeptowells (10â^'21ÂL). Current Opinion in Colloid and Interface Science, 2008, 13, 81-85.	3.4	2
2987	Novel pyrazolo[1,5-a]pyrimidines as c-Src kinase inhibitors that reduce IKr channel blockade. Bioorganic and Medicinal Chemistry, 2008, 16, 909-921.	1.4	41
2988	A binary QSAR model for classification of hERG potassium channel blockers. Bioorganic and Medicinal Chemistry, 2008, 16, 4107-4119.	1.4	87
2989	Mechanistic insight into the biological nanopore in tetragonal lysozyme crystal. Journal of Membrane Science, 2008, 324, 192-197.	4.1	17
2990	Substitution rates in αâ€helical transmembrane proteins. Protein Science, 2001, 10, 2507-2517.	3.1	30
2991	Structural and functional consequences of the presence of a fourth disulfide bridge in the scorpion short toxins: Solution structure of the potassium channel inhibitor HsTX1. Protein Science, 1999, 8, 2672-2685.	3.1	52
2992	Designing Carbon Nanotube Membranes for Efficient Water Desalination. Journal of Physical Chemistry B, 2008, 112, 1427-1434.	1.2	901
2993	hERG Classification Model Based on a Combination of Support Vector Machine Method and GRIND Descriptors. Molecular Pharmaceutics, 2008, 5, 117-127.	2.3	91
2994	On the possible methods for the mathematical description of the ball and chain model of ion channel inactivation. Cellular and Molecular Biology Letters, 2008, 13, 535-52.	2.7	5
2995	Physical aspects of the emergence of living cell precursors: the ion and chiral asymmetries as two fundamental asymmetry types. Moscow University Physics Bulletin (English Translation of Vestnik) Tj ETQq0 0 0 i	rg₿T1/Over	lo zi 10 Tf 50
2996	Maternally Inherited Birk Barel Mental Retardation Dysmorphism Syndrome Caused by a Mutation in the Genomically Imprinted Potassium Channel KCNK9. American Journal of Human Genetics, 2008, 83, 193-199.	2.6	147
2997	Membrane Transporters for Nitrogen, Phosphate and Potassium Uptake in Plants. Journal of Integrative Plant Biology, 2008, 50, 835-848.	4.1	99
2998	Electrophysiological characterization of a novel Kv channel blocker N, N'-[oxybis(2,1-ethanediyloxy-2,1-ethanediyl)]bis(4-methyl)-benzenesulfonamide found in virtual screening. Acta Pharmacologica Sinica, 2008, 29, 405-412.	2.8	2
2999	Structure-function relationship of bifunctional scorpion toxin BmBKTx1. Acta Biochimica Et Biophysica Sinica, 2008, 40, 955-963.	0.9	3
3000	An investigation into the effect of potassium ions on the folding of silk fibroin studied by generalized twoâ€dimensional NMR–NMR correlation and Raman spectroscopy. FEBS Journal, 2008, 275, 219-232.	2.2	51
3001	GCN4 enhances the stability of the pore domain of potassium channel KcsA. FEBS Journal, 2008, 275, 6228-6236.	2.2	5
3002	Interaction with the hERG channel and cytotoxicity of amiodarone and amiodarone analogues. British Journal of Pharmacology, 2008, 155, 585-595.	2.7	23

			0
#	ARTICLE A Doubleâ€Point Mutation in the Selectivity Filter Site of the KCNQ1 Potassium Channel Results in a	IF	CITATIONS
3003		0.8	8
3004	Modification of K ⁺ channel–drug interactions by ancillary subunits. Journal of Physiology, 2008, 586, 929-950.	1.3	27
3005	Phosphatidylinositolâ€4,5â€bisphosphate (PIP ₂) regulation of strong inward rectifier Kir2.1 channels: multilevel positive cooperativity. Journal of Physiology, 2008, 586, 1833-1848.	1.3	61
3006	Paroxysmal extreme pain disorder mutations within the D3/S4–S5 linker of Nav1.7 cause moderate destabilization of fast inactivation. Journal of Physiology, 2008, 586, 4137-4153.	1.3	77
3007	TRP channels entering the structural era. Journal of Physiology, 2008, 586, 3565-3575.	1.3	85
3008	Weighing the evidence for a ternary protein complex mediating Aâ€ŧype K ⁺ currents in neurons. Journal of Physiology, 2008, 586, 5609-5623.	1.3	83
3009	G-Quadruplex structure: a target for anticancer therapy and a probe for detection of potassium. Biochemistry (Moscow), 2008, 73, 853-861.	0.7	15
3010	Effect of confinement on the crystallization of a dusty plasma in narrow channels. JETP Letters, 2008, 87, 409-413.	0.4	10
3011	Native mass spectrometry: a bridge between interactomics and structural biology. Nature Methods, 2008, 5, 927-933.	9.0	656
3012	Cellular mechanisms of potassium transport in plants. Physiologia Plantarum, 2008, 133, 637-650.	2.6	197
3013	Transmembrane helix prediction using amino acid property features and latent semantic analysis. BMC Bioinformatics, 2008, 9, S4.	1.2	30
3014	Indole and other aromatic compounds activate the yeast TRPY1 channel. FEBS Letters, 2008, 582, 1514-1518.	1.3	18
3015	Intrinsic aqueduct orifices facilitate K ⁺ channel gating. FEBS Letters, 2008, 582, 3320-3324.	1.3	6
3016	FRET with multiply labeled HERG K+ channels as a reporter of the in vivo coarse architecture of the cytoplasmic domains. Biochimica Et Biophysica Acta - Molecular Cell Research, 2008, 1783, 1681-1699.	1.9	21
3017	Membranes: a meeting point for lipids, proteins and therapies. Journal of Cellular and Molecular Medicine, 2008, 12, 829-875.	1.6	348
3018	Electron crystallography of proteins in membranes. Current Opinion in Structural Biology, 2008, 18, 587-592.	2.6	29
3019	Multi-scale computational modelling in biology and physiology. Progress in Biophysics and Molecular Biology, 2008, 96, 60-89.	1.4	149
3020	Responses of single-ventricular myocytes to dynamic axial stretching. Progress in Biophysics and Molecular Biology, 2008, 97, 282-297.	1.4	35

#	Article	IF	CITATIONS
3021	Human ether-a-go-go related gene (hERG) K+ channels: Function and dysfunction. Progress in Biophysics and Molecular Biology, 2008, 98, 137-148.	1.4	94
3022	hERG1 channel activators: A new anti-arrhythmic principle. Progress in Biophysics and Molecular Biology, 2008, 98, 347-362.	1.4	45
3023	Chapter 12 Molecular Modeling and Simulation Studies of Ion Channel Structures, Dynamics and Mechanisms. Methods in Cell Biology, 2008, 90, 233-265.	0.5	24
3024	Is the mobility of the pore walls and water molecules in the selectivity filter of KcsA channel functionally important?. Physical Chemistry Chemical Physics, 2008, 10, 2249.	1.3	4
3025	Diffusion in Nanoporous Phases:Â Size Dependence and Levitation Effect. Journal of Physical Chemistry B, 2008, 112, 665-686.	1.2	45
3026	Structural Correlates of Ionotropic Glutamate Receptor Function. , 2008, , 247-297.		0
3027	Helical Distortion in Tryptophan- and Lysine-Anchored Membrane-Spanning α-Helices as a Function of Hydrophobic Mismatch: A Solid-State Deuterium NMR Investigation Using the Geometric Analysis of Labeled Alanines Method. Biophysical Journal, 2008, 94, 480-491.	0.2	40
3028	Ligand Binding to the Voltage-Gated Kv1.5 Potassium Channel in the Open State—Docking and Computer Simulations of a Homology Model. Biophysical Journal, 2008, 94, 820-831.	0.2	60
3029	Brownian Dynamics Theory for Predicting Internal and External Blockages of Tetraethylammonium in the KcsA Potassium Channel. Biophysical Journal, 2008, 94, 366-378.	0.2	12
3030	Substrate Binding and Formation of an Occluded State in the Leucine Transporter. Biophysical Journal, 2008, 94, 1600-1612.	0.2	89
3031	Single Particle Image Reconstruction of the Human Recombinant Kv2.1 Channel. Biophysical Journal, 2008, 94, 2106-2114.	0.2	19
3032	End-Point Targeted Molecular Dynamics: Large-Scale Conformational Changes in Potassium Channels. Biophysical Journal, 2008, 94, 4307-4319.	0.2	24
3033	A Tyrosine Substitution in the Cavity Wall of a K Channel Induces an Inverted Inactivation. Biophysical Journal, 2008, 94, 3014-3022.	0.2	7
3034	A Residue at the Cytoplasmic Entrance of BK-Type Channels Regulating Single-Channel Opening by its Hydrophobicity. Biophysical Journal, 2008, 94, 3714-3725.	0.2	10
3035	Bubbles, Gating, and Anesthetics in Ion Channels. Biophysical Journal, 2008, 94, 4282-4298.	0.2	82
3036	Crystallographic Study of Hydration of an Internal Cavity in Engineered Proteins with Buried Polar or Ionizable Groups. Biophysical Journal, 2008, 94, 3208-3216.	0.2	28
3037	Role of Tryptophan Residues in Gramicidin Channel Organization and Function. Biophysical Journal, 2008, 95, 166-175.	0.2	39
3038	Conduction of Na+ and K+ through the NaK Channel: Molecular and Brownian Dynamics Studies. Biophysical Journal, 2008, 95, 1600-1611.	0.2	15

#	Article	IF	CITATIONS
3039	Confirming the Revised C-Terminal Domain of the MscL Crystal Structure. Biophysical Journal, 2008, 94, 4662-4667.	0.2	8
3040	An Ion Gating Mechanism of Gastric H,K-ATPase Based on Molecular Dynamics Simulations. Biophysical Journal, 2008, 95, 2739-2749.	0.2	12
3041	Gating Consequences of Charge Neutralization of Arginine Residues in the S4 Segment of Kv7.2, an Epilepsy-Linked K+ Channel Subunit. Biophysical Journal, 2008, 95, 2254-2264.	0.2	36
3042	Bupivacaine Blocks N-Type Inactivating Kv Channels in the Open State: No Allosteric Effect on Inactivation Kinetics. Biophysical Journal, 2008, 95, 5138-5152.	0.2	8
3043	Not Only Enthalpy: Large Entropy Contribution to Ion Permeation Barriers in Single-File Channels. Biophysical Journal, 2008, 95, 2275-2282.	0.2	13
3044	The Selectivity of K+ Ion Channels: Testing the Hypotheses. Biophysical Journal, 2008, 95, 5062-5072.	0.2	63
3045	Generation, Comparison, and Merging of Pathways between Protein Conformations: Gating in K-Channels. Biophysical Journal, 2008, 95, 3850-3860.	0.2	19
3046	Conformational Changes in the Selectivity Filter of the Open-State KcsA Channel: An Energy Minimization Study. Biophysical Journal, 2008, 95, 3239-3251.	0.2	34
3047	Determinants within the Turret and Pore-Loop Domains of KCNQ3 K+ Channels Governing Functional Activity. Biophysical Journal, 2008, 95, 5121-5137.	0.2	49
3048	Trans-Channel Interactions in Batrachotoxin-Modified Skeletal Muscle Sodium Channels: Voltage-Dependent Block by Cytoplasmic Amines, and the Influence of μ-Conotoxin GIIIA Derivatives and Permeant Ions. Biophysical Journal, 2008, 95, 4277-4288.	0.2	3
3049	The Glutamate Receptors. , 2008, , .		47
3050	Predicting the conformations of peptides and proteins in early evolution. A review article submitted to Biology Direct. Biology Direct, 2008, 3, 3.	1.9	64
3051	Stable interactions between the transmembrane domains of the adenosine A _{2A} receptor. Protein Science, 2008, 17, 1188-1199.	3.1	23
3052	Distinct protein interfaces in transmembrane domains suggest an in vivo folding model. Protein Science, 2008, 13, 3028-3037.	3.1	7
3053	Rapid generation of macrocycles with natural-product-like side chains by multiple multicomponent macrocyclizations (MiBs). Organic and Biomolecular Chemistry, 2008, 6, 1787.	1.5	58
3054	Epithelial Na+ Channels. , 2008, , 743-768.		9
3055	Structural And Functional Organization Of The Synapse. , 2008, , .		8
3056	Nanoscopic Porous Sensors. Annual Review of Analytical Chemistry, 2008, 1, 737-766.	2.8	261

#	Article	IF	CITATIONS
3057	The Transduction Channels of Rod and Cone Photoreceptors. , 2008, , 225-249.		0
3058	K ⁺ Channel Modulators for the Treatment of Neurological Disorders and Autoimmune Diseases. Chemical Reviews, 2008, 108, 1744-1773.	23.0	196
3060	Voltage-Sensitive Ion Channels. , 2008, , .		13
3061	Auditory Trauma, Protection, and Repair. , 2008, , .		4
3062	Neuronal and Glial Signaling. , 2008, , 105-121.		0
3064	Thrombin. Molecular Aspects of Medicine, 2008, 29, 203-254.	2.7	282
3065	Three-dimensional structure of the KdpFABC complex of Escherichia coli by electron tomography of two-dimensional crystals. Journal of Structural Biology, 2008, 161, 411-418.	1.3	9
3066	Three-Dimensional Architecture of Membrane-Embedded MscS in the Closed Conformation. Journal of Molecular Biology, 2008, 378, 55-70.	2.0	82
3067	K+/Na+ Selectivity in K Channels and Valinomycin: Over-coordination Versus Cavity-size constraints. Journal of Molecular Biology, 2008, 376, 13-22.	2.0	133
3068	Control of Ion Selectivity in LeuT: Two Na+ Binding Sites with Two Different Mechanisms. Journal of Molecular Biology, 2008, 377, 804-818.	2.0	181
3069	Coils in the Membrane Core Are Conserved and Functionally Important. Journal of Molecular Biology, 2008, 380, 170-180.	2.0	34
3070	Functional Analysis of Kv1.2 and Paddle Chimera Kv Channels in Planar Lipid Bilayers. Journal of Molecular Biology, 2008, 382, 24-33.	2.0	45
3071	2,3-Benzodiazepine-type AMPA receptor antagonists and their neuroprotective effects. Neurochemistry International, 2008, 52, 166-183.	1.9	39
3072	A Yeast Genetic Screen Reveals a Critical Role for the Pore Helix Domain in TRP Channel Gating. Neuron, 2008, 58, 362-373.	3.8	121
3073	Alternative Translation Initiation in Rat Brain Yields K2P2.1 Potassium Channels Permeable to Sodium. Neuron, 2008, 58, 859-870.	3.8	134
3074	Ion Channels: From Conductance to Structure. Neuron, 2008, 60, 456-468.	3.8	69
3075	Discovery of talatisamine as a novel specific blocker for the delayed rectifier K+ channels in rat hippocampal neurons. Neuroscience, 2008, 155, 469-475.	1.1	31
3076	Effective high-throughput overproduction of membrane proteins in Escherichia coli. Protein Expression and Purification, 2008, 62, 1-8.	0.6	60

#	Article	IF	CITATIONS
3077	Mass spectrometry of full-length integral membrane proteins to define functionally relevant structural features. Methods, 2008, 46, 54-61.	1.9	15
3078	The ADP and ATP transport in mitochondria and its carrier. Biochimica Et Biophysica Acta - Biomembranes, 2008, 1778, 1978-2021.	1.4	511
3079	Efficacy of external tetraethylammonium block of the KcsA potassium channel: Molecular and Brownian dynamics studies. Biochimica Et Biophysica Acta - Biomembranes, 2008, 1778, 2273-2282.	1.4	5
3080	The cardiac ryanodine receptor: Looking for anomalies in permeation properties. Biochimica Et Biophysica Acta - Biomembranes, 2008, 1778, 2564-2572.	1.4	4
3081	Global Twisting Motion of Single Molecular KcsA Potassium Channel upon Gating. Cell, 2008, 132, 67-78.	13.5	111
3082	Drosophila odorant receptors are both ligand-gated and cyclic-nucleotide-activated cation channels. Nature, 2008, 452, 1007-1011.	13.7	781
3083	Gating the pore of P2X receptor channels. Nature Neuroscience, 2008, 11, 883-887.	7.1	104
3084	Optical Switches for Remote and Noninvasive Control of Cell Signaling. Science, 2008, 322, 395-399.	6.0	296
3085	Electrochemical Biosensors - Sensor Principles and Architectures. Sensors, 2008, 8, 1400-1458.	2.1	591
3086	Molecular dynamics simulation of ion selectivity process in nanopores. Molecular Simulation, 2008, 34, 169-175.	0.9	40
3087	Synthetic Ion Channels via Self-Assembly: A Route for Embedding Porous Polyoxometalate Nanocapsules in Lipid Bilayer Membranes. Nano Letters, 2008, 8, 3916-3921.	4.5	49
3088	Protein Crystallography and Drug Discovery. , 2008, , 605-634.		3
3089	Complexation of Metal Ions in Langmuir Films Formed with Two Amphiphilic Dioxadithia Crown Ethers. Journal of Physical Chemistry B, 2008, 112, 10953-10963.	1.2	8
3090	Ion-channel engineering. Annual Reports on the Progress of Chemistry Section C, 2008, 104, 165.	4.4	4
3091	Ion exclusion by sub-2-nm carbon nanotube pores. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 17250-17255.	3.3	609
3092	Synthetic cation transporters incorporating crown ethers and calixarenes as headgroups and central relays: a comparison of sodium and chloride selectivity. New Journal of Chemistry, 2008, 32, 878.	1.4	20
3093	G219S mutagenesis as a means of stabilizing conformational flexibility in the bacterial sodium channel NaChBac. Molecular Membrane Biology, 2008, 25, 670-676.	2.0	14
3094	Protein Design with <scp>l</scp> - and <scp>d</scp> -α-Amino Acid Structures as the Alphabet. Accounts of Chemical Research, 2008, 41, 1301-1308.	7.6	76

#	Article	IF	CITATIONS
3095	Protein Self-Assembly and Lipid Binding in the Folding of the Potassium Channel KcsA. Biochemistry, 2008, 47, 2123-2133.	1.2	54
3096	New Light on the "Old―Chloride Channel Blocker DIDS. ACS Chemical Biology, 2008, 3, 399-401.	1.6	20
3097	2-Position Base-Modified Analogues of Adenophostin A as High-Affinity Agonists of the d-myo-Inositol Trisphosphate Receptor:  In Vitro Evaluation and Molecular Modeling. Journal of Organic Chemistry, 2008, 73, 1682-1692.	1.7	19
3098	Design and Synthesis of Ladder-Shaped Tetracyclic, Heptacyclic, and Decacyclic Ethers and Evaluation of the Interaction with Transmembrane Proteins. Journal of the American Chemical Society, 2008, 130, 10217-10226.	6.6	32
3099	Incorporation of the HERG Potassium Channel in a Mercury Supported Lipid Bilayer. Journal of Physical Chemistry B, 2008, 112, 1315-1319.	1.2	37
3100	The Role of Conformation in Ion Permeation in a K ⁺ Channel. Journal of the American Chemical Society, 2008, 130, 3389-3398.	6.6	32
3101	Insight into the Mechanism of Inactivation and pH Sensitivity in Potassium Channels from Molecular Dynamics Simulations. Biochemistry, 2008, 47, 7414-7422.	1.2	50
3102	The Molecular Biology of Renal Potassium Channels. , 2008, , 1249-1267.		1
3103	hERG Potassium Channels and the Structural Basis of Drug-Induced Arrhythmias. Chemical Research in Toxicology, 2008, 21, 1005-1010.	1.7	99
3104	Dynamic Mechanism of Fatty Acid Transport across Cellular Membranes through FadL: Molecular Dynamics Simulations. Journal of Physical Chemistry B, 2008, 112, 13070-13078.	1.2	10
3105	Principles and Models of Biological Transport. , 2008, , .		54
3106	Conformational Changes and Gating at the Selectivity Filter of Potassium Channels. Journal of the American Chemical Society, 2008, 130, 9474-9480.	6.6	61
3107	Nanomechanical Function from Self-Organizable Dendronized Helical Polyphenylacetylenes. Journal of the American Chemical Society, 2008, 130, 7503-7508.	6.6	224
3108	The Mechanism Responsible for Extraordinary Cs Ion Selectivity in Crystalline Silicotitanate. Journal of the American Chemical Society, 2008, 130, 11689-11694.	6.6	132
3109	EPR Approaches to Ion Channel Structure and Function. Novartis Foundation Symposium, 2008, 245, 146-164.	1.2	24
3110	Cloning and expression pattern of <i>SsHKT1</i> encoding a putative cation transporter from halophyte <i>Suaeda salsa</i> . DNA Sequence, 2008, 19, 106-114.	0.7	21
3111	Biophysical Techniques in Photosynthesis. Advances in Photosynthesis and Respiration, 2008, , .	1.0	21
3112	Thermal Stability of the K ⁺ Channel Tetramer: Cation Interactions and the Conserved Threonine Residue at the Innermost Site (S ₄) of the KcsA Selectivity Filter. Biochemistry, 2008, 47, 5354-5367.	1.2	21

#	Article	IF	CITATIONS
3113	Gating at the selectivity filter in cyclic nucleotide-gated channels. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 3310-3314.	3.3	73
3114	Structure of the transmembrane regions of a bacterial cyclic nucleotide-regulated channel. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 1511-1515.	3.3	152
3115	Molecular Characterization of the Inositol 1,4,5-Trisphosphate Receptor Pore-forming Segment. Journal of Biological Chemistry, 2008, 283, 2939-2948.	1.6	49
3116	Amino Acid Substitutions in the Pore Helix of GluR6 Control Inhibition by Membrane Fatty Acids. Journal of General Physiology, 2008, 132, 85-99.	0.9	17
3117	hERG Gating Microdomains Defined by S6 Mutagenesis and Molecular Modeling. Journal of General Physiology, 2008, 132, 507-520.	0.9	48
3118	Access and Binding of Local Anesthetics in the Closed Sodium Channel. Molecular Pharmacology, 2008, 74, 1033-1045.	1.0	59
3119	Physiology and Pathophysiology of Potassium Channels in Gastrointestinal Epithelia. Physiological Reviews, 2008, 88, 1119-1182.	13.1	124
3120	Tunable Calcium Current through TRPV1 Receptor Channels. Journal of Biological Chemistry, 2008, 283, 31274-31278.	1.6	33
3121	Ion Channels in Microbes. Physiological Reviews, 2008, 88, 1449-1490.	13.1	183
3122	Novel Insights into the Structural Basis of pH-Sensitivity in Inward Rectifier K ⁺ Channels Kir2.3. Cellular Physiology and Biochemistry, 2008, 21, 347-356.	1.1	16
3123	A Highly Conserved Alanine in the S6 Domain of the hERG1 K ⁺ Channel is Required for Normal Gating. Cellular Physiology and Biochemistry, 2008, 22, 601-610.	1.1	9
3124	Closed-state inactivation as a mechanism for decreased K current at low extracellular pH. Channels, 2008, 2, 139-142.	1.5	8
3125	Pore stability and gating in voltage-activated calcium channels. Channels, 2008, 2, 61-69.	1.5	13
3126	Structural Model of the Ca _V 1.2 Pore. Channels, 2008, 2, 210-215.	1.5	21
3127	Over-Expression, Solubilization, and Purification of G Protein-Coupled Receptors for Structural Biology. Combinatorial Chemistry and High Throughput Screening, 2008, 11, 439-462.	0.6	38
3128	Identification of Transmembrane Domain 5 as a Critical Molecular Determinant of Menthol Sensitivity in Mammalian TRPA1 Channels. Journal of Neuroscience, 2008, 28, 9640-9651.	1.7	266
3129	The Nociceptor Ion Channel TRPA1 Is Potentiated and Inactivated by Permeating Calcium Ions. Journal of Biological Chemistry, 2008, 283, 32691-32703.	1.6	224
3130	Water in Ion Channels and Pores-Simulation Studies. Novartis Foundation Symposium, 2008, , 66-83.	1.2	9

# 3131	ARTICLE Opening the Molecular Floodgates. Science, 2008, 321, 1166-1167.	IF 6.0	Citations
3132	Determination of Membrane Protein Molecular Weights and Association Equilibrium Constants Using Sedimentation Equilibrium and Sedimentation Velocity. Methods in Cell Biology, 2008, 84, 181-211.	0.5	24
3133	Fluorescence detection of the movement of single KcsA subunits reveals cooperativity. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 20263-20268.	3.3	56
3134	The Pore Region of <i>N</i> -Methyl-d-aspartate Receptors Differentially Influences Stimulation and Block by Spermine. Journal of Pharmacology and Experimental Therapeutics, 2008, 327, 68-77.	1.3	22
3135	The K _v channel blocker 4-aminopyridine enhances Ag ⁺ uptake: A scanning electrochemical microscopy study of single living cells. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 12118-12122.	3.3	31
3136	Models and Mechanistic Insight. Journal of General Physiology, 2008, 131, 515-519.	0.9	7
3137	New Determinant for the CaVβ2 Subunit Modulation of the CaV1.2 Calcium Channel. Journal of Biological Chemistry, 2008, 283, 15577-15588.	1.6	24
3138	High tolerance for ionizable residues in the hydrophobic interior of proteins. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 17784-17788.	3.3	120
3139	A Novel Mechanism for Human K2P2.1 Channel Gating. Journal of Biological Chemistry, 2008, 283, 19448-19455.	1.6	82
3140	Structure of TRPV1 channel revealed by electron cryomicroscopy. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 7451-7455.	3.3	194
3141	Tethering Chemistry and K+ Channels. Journal of Biological Chemistry, 2008, 283, 25105-25109.	1.6	9
3142	Molecular Modeling of Benzothiazepine Binding in the L-type Calcium Channel. Journal of Biological Chemistry, 2008, 283, 17594-17604.	1.6	50
3143	Characterization of a Tobacco TPK-type K+ Channel as a Novel Tonoplast K+ Channel Using Yeast Tonoplasts. Journal of Biological Chemistry, 2008, 283, 1911-1920.	1.6	72
3144	A Pore-blocking Hydrophobic Motif at the Cytoplasmic Aperture of the Closed-state Nav1.7 Channel Is Disrupted by the Erythromelalgia-associated F1449V Mutation. Journal of Biological Chemistry, 2008, 283, 24118-24127.	1.6	40
3145	Molecular mechanism of pH sensing in KcsA potassium channels. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 6900-6905.	3.3	131
3146	Direct analysis of cooperativity in multisubunit allosteric proteins. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 11697-11702.	3.3	41
3147	Dimeric subunit stoichiometry of the human voltage-dependent proton channel Hv1. Proceedings of the United States of America, 2008, 105, 7692-7695.	3.3	176
3148	An Ion Selectivity Filter in the Extracellular Domain of Cys-loop Receptors Reveals Determinants for Ion Conductance. Journal of Biological Chemistry, 2008, 283, 36066-36070.	1.6	54

#	Article	IF	CITATIONS
3149	The Cytoplasmic Loops of Subunit a of Escherichia coli ATP Synthase May Participate in the Proton Translocating Mechanism*. Journal of Biological Chemistry, 2008, 283, 13044-13052.	1.6	33
3150	Protein Kinase C Modulates Inactivation of Kv3.3 Channels. Journal of Biological Chemistry, 2008, 283, 22283-22294.	1.6	42
3151	NMR studies of a channel protein without membranes: Structure and dynamics of water-solubilized KcsA. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 16537-16542.	3.3	41
3152	The D-Diastereomer of ShK Toxin Selectively Blocks Voltage-gated K+ Channels and Inhibits T Lymphocyte Proliferation. Journal of Biological Chemistry, 2008, 283, 988-997.	1.6	54
3153	NMR of Membrane-Associated Peptides and Proteins. Current Protein and Peptide Science, 2008, 9, 50-69.	0.7	58
3154	Following the path of experimental data from computational biophysics to nanotechnology. AIP Conference Proceedings, 2008, , .	0.3	0
3155	Complex Plasmas in Narrow Channels: Impact of Confinement on the Local Order. , 2008, , .		1
3156	Tl+-induced μs Gating of Current Indicates Instability of the MaxiK Selectivity Filter as Caused by Ion/Pore Interaction. Journal of General Physiology, 2008, 131, 365-378.	0.9	11
3157	Intracellular Mg2+ is a voltage-dependent pore blocker of HCN channels. American Journal of Physiology - Cell Physiology, 2008, 295, C557-C565.	2.1	18
3158	Cooperative Transition between Open and Closed Conformations in Potassium Channels. PLoS Computational Biology, 2008, 4, e1000164.	1.5	19
3159	Structure and Function of the NMDA Receptor. , 2008, , 289-316.		11
3160	A Kv channel with an altered activation gate sequence displays both "fast―and "slow―activation kinetics. American Journal of Physiology - Cell Physiology, 2008, 294, C1476-C1484.	2.1	12
3162	Structural and functional determinants in the S5-P region of HCN-encoded pacemaker channels revealed by cysteine-scanning substitutions. American Journal of Physiology - Cell Physiology, 2008, 294, C136-C144.	2.1	10
3163	Voltage-gated Na Channel Selectivity: The Role of the Conserved Domain III Lysine Residue. Journal of General Physiology, 2008, 131, 523-529.	0.9	50
3164	Secondary Structure of the MiRP1 (KCNE2) Potassium Channel Ancillary Subunit. Protein and Peptide Letters, 2008, 15, 63-75.	0.4	2
3165	S0, Where Is It?. Journal of General Physiology, 2008, 131, 531-536.	0.9	1
3166	Intrinsic Electrostatic Potential in the BK Channel Pore: Role in Determining Single Channel Conductance and Block. Journal of General Physiology, 2008, 131, 147-161.	0.9	39
3167	Multiple Unbiased Prospective Screens Identify TRP Channels and Their Conserved Gating Elements. Journal of General Physiology, 2008, 132, 481-486.	0.9	19

#	Article	IF	CITATIONS
3168	Isolated tubal torsion: specific signs on preoperative computed tomography and magnetic resonance imaging. Acta Radiologica, 2008, 49, 233-235.	0.5	17
3169	Slow Inactivation in <i>Shaker</i> K Channels Is Delayed by Intracellular Tetraethylammonium. Journal of General Physiology, 2008, 132, 633-650.	0.9	18
3170	The Activation Gate and Gating Mechanism of the NMDA Receptor. Journal of Neuroscience, 2008, 28, 1546-1556.	1.7	83
3171	TRPV4 enhances the cellular uptake of aminoglycoside antibiotics. Journal of Cell Science, 2008, 121, 2871-2879.	1.2	99
3172	Chapter 9 Probing the Structure and Function of Integral Membrane Proteins by Mass Spectrometry. Comprehensive Analytical Chemistry, 2008, , 197-521.	0.7	0
3173	N-type Inactivation of the Potassium Channel KcsA by the Shaker B "Ball―Peptide. Journal of Biological Chemistry, 2008, 283, 18076-18085.	1.6	12
3174	Ligand Structural Aspects of hERG Channel Blockade. Current Topics in Medicinal Chemistry, 2008, 8, 1113-1127.	1.0	37
3175	Advances in Molecular and Cellular Therapies for Hearing Loss. Molecular Therapy, 2008, 16, 224-236.	3.7	66
3176	Localization and Targeting of Voltage-Dependent Ion Channels in Mammalian Central Neurons. Physiological Reviews, 2008, 88, 1407-1447.	13.1	447
3177	Molecular Determinants of Species-Specific Activation or Blockade of TRPA1 Channels. Journal of Neuroscience, 2008, 28, 5063-5071.	1.7	104
3179	Non-Markovian noise mediated through anomalous diffusion within ion channels. Physical Review E, 2008, 78, 041920.	0.8	10
3180	Dimer diffusion in a washboard potential. Physical Review E, 2008, 77, 021129.	0.8	42
3181	Visual Transduction and Non-Visual Light Perception. , 2008, , .		8
3182	Modeling and Simulation of Ion Channels. , 2008, , 325-361.		0
3183	Characterization of Five RNA Editing Sites in Shab Potassium Channels. Channels, 2008, 2, 202-209.	1.5	26
3184	Chapter 15 Charged Protein Side Chain Movement in Lipid Bilayers Explored with Free Energy Simulation. Current Topics in Membranes, 2008, , 405-459.	0.5	2
3185	Chapter 14 Computational Models for Electrified Interfaces. Current Topics in Membranes, 2008, , 385-403.	0.5	1
3186	Osmoregulation. , 2008, , 1-35.		2

	CHATION R		
# 3187	ARTICLE Activation Mechanisms of the NMDA Receptor. Frontiers in Neuroscience, 2008, , 283-312.	IF 0.0	CITATIONS
3188	Structural Determinants for High-Affinity Block of hERG Potassium Channels. Novartis Foundation Symposium, 2008, , 136-154.	1.2	34
3190	Recent Advances in Ion Channel Screening Technologies. Topics in Medicinal Chemistry, 2008, , 1-25.	0.4	8
3191	The Structure of G1pF, A Glycerol Conducting Channel. Novartis Foundation Symposium, 2008, , 51-65.	1.2	14
3192	Permeation Energetics in a Model Potassium Channel. Novartis Foundation Symposium, 2008, , 109-126.	1.2	5
3193	Potassium Channels and the Atomic Basis of Selective Ion Conduction. , 2008, , 431-461.		0
3194	Chapter Two Rapid Purification and Reconstitution of Recombinant Voltage-Gated Sodium Channels into Planar BLMs. Behavior Research Methods, 2008, , 27-47.	2.3	1
3195	Functionalized Calix[n]arenes as Membrane Transporters for Biological Compounds.A Minireview. Current Drug Discovery Technologies, 2008, 5, 98-104.	0.6	19
3196	A generalized Langevin algorithm for studying permeation across biological ion channels. Molecular Physics, 2008, 106, 1353-1361.	0.8	17
3197	Predicting Membrane Protein Types with Bagging Learner. Protein and Peptide Letters, 2008, 15, 590-594.	0.4	27
3198	Additive Effects of Combined Application of Multiple hERG Blockers. Journal of Cardiovascular Pharmacology, 2008, 51, 549-552.	0.8	11
3199	KCNQ4 mutations associated with nonsyndromic progressive sensorineural hearing loss. Current Opinion in Otolaryngology and Head and Neck Surgery, 2008, 16, 441-444.	0.8	33
3202	Excitability is Mediated by the T1 Domain of the Voltage-Gated Potassium Channel. Novartis Foundation Symposium, 2008, , 169-177.	1.2	6
3204	What Can Be Deduced about the Structure of Shaker from Available Data?. Novartis Foundation Symposium, 2008, , 84-108.	1.2	6
3205	Sodium and Potassium—Channels and Pumps. , 2008, , 151-164.		0
3206	Asymmetry of Rb+ Conduction Emerged under Bi-Ionic Conditions in Epithelial Maxi-K+ Channels. Journal of Physiological Sciences, 2008, 58, 363-369.	0.9	0
3208	Transporters and Channels. , 0, , 241-270.		0
3209	Mechanisms of Ion Transport Across Cell Membranes and Epithelia. , 2008, , 35-56.		1

#	Article	IF	Citations
3210	Olfactory Cyclic Nucleotide-Gated Ion Channels. , 2008, , 511-526.		0
3211	A Fully Atomistic Model of the Cx32 Connexon. PLoS ONE, 2008, 3, e2614.	1.1	22
3212	Chair's Introduction. Novartis Foundation Symposium, 2008, , 1-3.	1.2	0
3213	In Silico Modelling-Pharmacophores and hERG Channel Models. Novartis Foundation Symposium, 2008, , 171-185.	1.2	9
3214	Structure-Function Studies of the Outer Mouth and Voltage Sensor Domain of hERG. Novartis Foundation Symposium, 2008, , 19-43.	1.2	6
3215	The Architecture of a Water-Selective Pore in the Lipid Bilayer Visualized by Electron Crystallography in Vitreous Ice. Novartis Foundation Symposium, 2008, , 33-50.	1.2	4
3218	Selectivity Principle of the Ligand Escape Process from a Two-Gate Tunnel in Myoglobin: Molecular Dynamics Simulation. AIP Conference Proceedings, 2008, , .	0.3	0
3219	Inflammatory Pain. , 2009, , 1952-1955.		4
3227	Multiple Residues in the P-Region and M2 of Murine Kir 2.1 Regulate Blockage by External Ba2+. Korean Journal of Physiology and Pharmacology, 2009, 13, 61.	0.6	3
3228	El acoplamiento excitación-contracción en el músculo esquelético: preguntas por responder a pesar de 50 años de estudio. Biomedica, 2009, 29, 140.	0.3	3
3230	Regulation of Antiarrhythmic Drug Propafenone Effects on the C-type KV1.4 Potassium Channel by PHo and K+. Journal of Korean Medical Science, 2009, 24, 84.	1.1	0
3231	Studies of α-Helicity and Intersegmental Interactions in Voltage-Gated Na+ Channels: S2D4. PLoS ONE, 2009, 4, e7674.	1.1	4
3234	The Use of Computer Models in Pharmaceutical Safety Evaluation. ATLA Alternatives To Laboratory Animals, 2009, 37, 467-475.	0.7	17
3236	Automated Prediction of Protein Attributes and Its Impact on Biomedicine and Drug Discovery. , 0, , 97-143.		6
3237	Mimicking biopolymers on a molecular scale: nano(bio)technology based on engineered proteins. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2009, 367, 1727-1747.	1.6	46
3238	Prediction of Protein Quaternary Structural Type with Functional Domain and Pseudo Amino Acid Composition. , 2009, , .		0
3239	Using Lidocaine and Benzocaine to Link Sodium Channel Molecular Conformations to State-Dependent Antiarrhythmic Drug Affinity. Circulation Research, 2009, 105, 492-499.	2.0	63
3240	Nanosculpting reversed wavelength sensitivity into a photoswitchable iGluR. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 6814-6819.	3.3	82

#	Article	IF	CITATIONS
3241	Mutational and In Silico Analyses for Antidepressant Block of Astroglial Inward-Rectifier Kir4.1 Channel. Molecular Pharmacology, 2009, 75, 1287-1295.	1.0	71
3242	Model generation of viral channel forming 2B protein bundles from polio and coxsackie viruses. Molecular Membrane Biology, 2009, 26, 309-320.	2.0	22
3243	The Pore Domain Outer Helix Contributes to Both Activation and Inactivation of the hERG K+ Channel. Journal of Biological Chemistry, 2009, 284, 1000-1008.	1.6	43
3244	Direct Regulation of Prokaryotic Kir Channel by Cholesterol. Journal of Biological Chemistry, 2009, 284, 30727-30736.	1.6	70
3245	NBCe1-A Transmembrane Segment 1 Lines the Ion Translocation Pathway. Journal of Biological Chemistry, 2009, 284, 8918-8929.	1.6	32
3246	Structural Model for Dihydropyridine Binding to L-type Calcium Channels. Journal of Biological Chemistry, 2009, 284, 19006-19017.	1.6	73
3247	Isolation and Characterization of a High Affinity Peptide Inhibitor of CIC-2 Chloride Channels. Journal of Biological Chemistry, 2009, 284, 26051-26062.	1.6	42
3248	Differential Roles of Blocking Ions in KirBac1.1 Tetramer Stability. Journal of Biological Chemistry, 2009, 284, 2854-2860.	1.6	23
3249	Voltage- and [ATP]-dependent Gating of the P2X2 ATP Receptor Channel. Journal of General Physiology, 2009, 133, 93-109.	0.9	26
3250	The Connexin Channel Pore: Pore-Lining Segments and Residues. , 2009, , 77-102.		7
3250 3251	The Connexin Channel Pore: Pore-Lining Segments and Residues. , 2009, , 77-102. Single-molecule detection of folding and unfolding of the G-quadruplex aptamer in a nanopore nanocavity. Nucleic Acids Research, 2009, 37, 972-982.	6.5	7 132
	Single-molecule detection of folding and unfolding of the G-quadruplex aptamer in a nanopore	6.5 0.9	
3251	Single-molecule detection of folding and unfolding of the G-quadruplex aptamer in a nanopore nanocavity. Nucleic Acids Research, 2009, 37, 972-982. Mutations reveal voltage gating of CNGA1 channels in saturating cGMP. Journal of General		132
3251 3252	Single-molecule detection of folding and unfolding of the G-quadruplex aptamer in a nanopore nanocavity. Nucleic Acids Research, 2009, 37, 972-982. Mutations reveal voltage gating of CNGA1 channels in saturating cGMP. Journal of General Physiology, 2009, 134, 151-164. Fast and slow gating are inherent properties of the pore module of the K+ channel Kcv. Journal of	0.9	132 24
3251 3252 3253	Single-molecule detection of folding and unfolding of the G-quadruplex aptamer in a nanopore nanocavity. Nucleic Acids Research, 2009, 37, 972-982. Mutations reveal voltage gating of CNGA1 channels in saturating cGMP. Journal of General Physiology, 2009, 134, 151-164. Fast and slow gating are inherent properties of the pore module of the K+ channel Kcv. Journal of General Physiology, 2009, 134, 219-229.	0.9 0.9	132 24 37
3251 3252 3253 3254	Single-molecule detection of folding and unfolding of the G-quadruplex aptamer in a nanopore nanocavity. Nucleic Acids Research, 2009, 37, 972-982. Mutations reveal voltage gating of CNGA1 channels in saturating cGMP. Journal of General Physiology, 2009, 134, 151-164. Fast and slow gating are inherent properties of the pore module of the K+ channel Kcv. Journal of General Physiology, 2009, 134, 219-229. It's spring-time for slow inactivation. Journal of General Physiology, 2009, 134, 457-459. Alanine Scanning of the S6 Segment Reveals a Unique and cAMP-sensitive Association between the Pore and Voltage-dependent Opening in HCN Channels. Journal of Biological Chemistry, 2009, 284,	0.9 0.9 0.9	132 24 37 2
3251 3252 3253 3254 3255	Single-molecule detection of folding and unfolding of the C-quadruplex aptamer in a nanopore nanocavity. Nucleic Acids Research, 2009, 37, 972-982. Mutations reveal voltage gating of CNGA1 channels in saturating cCMP. Journal of General Physiology, 2009, 134, 151-164. Fast and slow gating are inherent properties of the pore module of the K+ channel Kcv. Journal of General Physiology, 2009, 134, 219-229. It's spring-time for slow inactivation. Journal of General Physiology, 2009, 134, 457-459. Alanine Scanning of the S6 Segment Reveals a Unique and cAMP-sensitive Association between the Pore and Voltage-dependent Opening in HCN Channels. Journal of Biological Chemistry, 2009, 284, 15659-15667. Ryanodine Receptor Structure: Progress and Challenges. Journal of Biological Chemistry, 2009, 284,	0.9 0.9 0.9 1.6	132 24 37 2 6

#	Article	IF	CITATIONS
3259	An electrostatic interaction between TEA and an introduced pore aromatic drives spring-in-the-door inactivation in <i>Shaker</i> potassium channels. Journal of General Physiology, 2009, 134, 461-469.	0.9	14
3260	Examining Cooperative Gating Phenomena in Voltage-Dependent Potassium Channels. Methods in Enzymology, 2009, 466, 179-209.	0.4	15
3261	The helical character of the S6 segment of TRPV1 channels. Channels, 2009, 3, 311-313.	1.5	4
3262	Voltage-dependent conformational changes of KVAP S4 segment in bacterial membrane environment. Channels, 2009, 3, 356-365.	1.5	5
3263	Bimodal agonism in heteromeric cyclic nucleotide-gated channels. Channels, 2009, 3, 427-436.	1.5	2
3264	Molecular Dynamics Simulations of Kv Channels and Gating-Modifier Peptide Toxins. Current Computer-Aided Drug Design, 2009, 5, 155-173.	0.8	0
3265	Chapter 7 Semisynthesis of K+ Channels. Methods in Enzymology, 2009, 462, 135-150.	0.4	4
3266	Examining Ion Channel Properties Using Free-Energy Methods. Methods in Enzymology, 2009, 466, 155-177.	0.4	15
3267	Chapter 2 Viral Channel-Forming Proteins. International Review of Cell and Molecular Biology, 2009, 275, 35-63.	1.6	25
3268	The positively charged C-terminal region of the inactivating Shaker B peptide binds to the potassium channel KcsA. Protein Engineering, Design and Selection, 2009, 22, 341-347.	1.0	1
3269	Epilepsy, Ataxia, Sensorineural Deafness, Tubulopathy, and <i>KCNJ10</i> Mutations. New England Journal of Medicine, 2009, 360, 1960-1970.	13.9	518
3270	The Interactions Between hERG Potassium Channel and Blockers. Current Topics in Medicinal Chemistry, 2009, 9, 330-338.	1.0	18
3271	Current Strategies for the Discovery of K+ Channel Modulators. Current Topics in Medicinal Chemistry, 2009, 9, 348-361.	1.0	7
3272	Targeting Ion Channels in Cancer: A Novel Frontier in Antineoplastic Therapy. Current Medicinal Chemistry, 2009, 16, 66-93.	1.2	269
3273	Conformational Changes and Slow Dynamics through Microsecond Polarized Atomistic Molecular Simulation of an Integral Kv1.2 Ion Channel. PLoS Computational Biology, 2009, 5, e1000289.	1.5	108
3274	TRPMLs: in sickness and in health. American Journal of Physiology - Renal Physiology, 2009, 296, F1245-F1254.	1.3	100
3275	SAP97 regulates Kir2.3 channels by multiple mechanisms. American Journal of Physiology - Heart and Circulatory Physiology, 2009, 297, H1387-H1397.	1.5	16
3276	Coordinated Movement of Cytoplasmic and Transmembrane Domains of RyR1 upon Gating. PLoS Biology, 2009, 7, e1000085.	2.6	155

ARTICLE IF CITATIONS A computational study of ion conductance in the KcsA K+ channel using a Nernstâ€"Planck model with 3277 1.2 20 explicit resident ions. Journal of Chemical Physics, 2009, 131, 215101. Alternative splicing of NaV1.7 exon 5 increases the impact of the painful PEPD mutant channel I1461T. 3278 1.5 Channels, 2009, 3, 261-269. A Structural Model of the Pore-Forming Region of the Skeletal Muscle Ryanodine Receptor (RyR1). 3279 1.5 25 PLoS Computational Biology, 2009, 5, e1000367. Control of voltage-gated K+ channel permeability to NMDG+ by a residue at the outer pore. Journal of 0.9 General Physiology, 2009, 133, 361-374. Inhibition of KCa2.2 and KCa2.3 channel currents by protonation of outer pore histidine residues. 3281 0.9 11 Journal of General Physiology, 2009, 134, 295-308. Correlated movements of ions and water in a nanochannel. Molecular Simulation, 2009, 35, 13-23. PoreWalker: A Novel Tool for the Identification and Characterization of Channels in Transmembrane 3283 1.5146 Proteins from Their Three-Dimensional Structure. PLoS Computational Biology, 2009, 5, e1000440. The analysis of desensitizing CNGA1 channels reveals molecular interactions essential for normal 3284 16 gating. Journal of General Physiology, 2009, 133, 375-386. Molecular diversity and function of K⁺ channels in airway and alveolar epithelial cells. 3285 1.3 74 American Journal of Physiology - Lung Cellular and Molecular Physiology, 2009, 296, L145-L155. Different pathways for activation and deactivation in CaV1.2: a minimal gating model. Journal of General Physiology, 2009, 134, 231-241. Chapter 24 The coming of molecular biology and its impact on clinical neurology. Handbook of 3287 2 1.0 Clinical Neurology / Edited By P J Vinken and G W Bruyn, 2009, 95, 361-372. Three-dimensional structure of the human copper transporter hCTR1. Proceedings of the National 3288 3.3 243 Academy of Sciences of the United States of America, 2009, 106, 4237-4242. Intersubunit Coupling in the Pore of BK Channels. Journal of Biological Chemistry, 2009, 284, 3289 1.6 24 23353-23363. A structural model for K2P potassium channels based on 23 pairs of interacting sites and continuum 3290 36 electrostatics. Journal of General Physiology, 2009, 134, 53-68. Potassium Transport in <i>Corynebacterium glutamicum</i> Is Facilitated by the Putative Channel Protein CglK, Which Is Essential for pH Homeostasis and Growth at Acidic pH. Journal of Bacteriology, 3291 1.0 55 2009, 191, 2944-2952. Uncooperative Voltage Sensors. Journal of General Physiology, 2009, 133, 463-466. 3292 Many-body effects and simulations of potassium channels. Proceedings of the Royal Society A: 3293 1.0 37 Mathematical, Physical and Engineering Sciences, 2009, 465, 1701-1716. The Significance of EXDD and RXKD Motif Conservation in Rel Proteins. Journal of Biological 3294 1.6 Chemistry, 2009, 284, 9115-9123.

#	Article	IF	CITATIONS
3295	Structural and Functional Importance of Transmembrane Domain 3 (TM3) in the Aspartate:Alanine Antiporter AspT: Topology and Function of the Residues of TM3 and Oligomerization of AspT. Journal of Bacteriology, 2009, 191, 2122-2132.	1.0	11
3296	Expression of a poriferan potassium channel: insights into the evolution of ion channels in metazoans. Journal of Experimental Biology, 2009, 212, 761-767.	0.8	25
3297	Local Anesthetics Disrupt Energetic Coupling between the Voltage-sensing Segments of a Sodium Channel. Journal of General Physiology, 2009, 133, 1-15.	0.9	63
3298	Ryanodine receptor-mediated arrhythmias and sudden cardiac death. , 2009, 123, 151-177.		90
3299	Reverse Micelles in Integral Membrane Protein Structural Biology by Solution NMR Spectroscopy. Structure, 2009, 17, 345-351.	1.6	37
3300	Computational analysis of membrane proteins: the largest class of drug targets. Drug Discovery Today, 2009, 14, 1130-1135.	3.2	204
3301	Analogs of MK-499 are differentially affected by a mutation in the S6 domain of the hERG K+ channel. Biochemical Pharmacology, 2009, 77, 1602-1611.	2.0	9
3302	Analgesic potential of TRPV1 antagonists. Biochemical Pharmacology, 2009, 78, 211-216.	2.0	99
3303	Differential sensitivities of CaV1.2 IIS5–S6 mutants to 1,4-dihydropyridine analogs. European Journal of Pharmacology, 2009, 602, 255-261.	1.7	6
3304	Multiscale modelling of drug-induced effects on cardiac electrophysiological activity. European Journal of Pharmaceutical Sciences, 2009, 36, 62-77.	1.9	98
3306	Anion–π Slides for Transmembrane Transport. Chemistry - A European Journal, 2009, 15, 28-37.	1.7	193
3307	Membraneâ€Length Amphiphiles Exhibiting Structural Simplicity and Ion Channel Activity. Chemistry - A European Journal, 2009, 15, 10543-10553.	1.7	22
3308	Chloride ion conduction without water coordination in the pore of ClC protein. Journal of Computational Chemistry, 2010, 31, 603-611.	1.5	16
3309	Electrostatic control of occupancy and valence selectivity in a charged nanometer-sized cylindrical pore. Materialwissenschaft Und Werkstofftechnik, 2009, 40, 247-254.	0.5	0
3310	A Synthetic Ion Channel Derived from a Metallogallarene Capsule That Functions in Phospholipid Bilayers. Angewandte Chemie - International Edition, 2009, 48, 375-377.	7.2	47
3311	Theoretical design of bioinspired macromolecular electrets based on anthranilamide derivatives. Biotechnology Progress, 2009, 25, 915-922.	1.3	23
3312	Regulation of potassium (K) handling in the renal collecting duct. Pflugers Archiv European Journal of Physiology, 2009, 458, 157-168.	1.3	135
3313	Application of protein grey incidence degree measure to predict protein quaternary structural types. Amino Acids, 2009, 37, 741-749.	1.2	25

#	Article	IF	CITATIONS
3314	Thin alumina nanoporous membranes for similar size biomolecule separation. Journal of Membrane Science, 2009, 343, 1-6.	4.1	104
3315	Structural genomics target selection for the New York consortium on membrane protein structure. Journal of Structural and Functional Genomics, 2009, 10, 255-268.	1.2	46
3316	Recombinant Kv Channels at the Membrane of Escherichia coli Bind Specifically Agitoxin2. Journal of NeuroImmune Pharmacology, 2009, 4, 83-91.	2.1	20
3317	The Domain and Conformational Organization in Potassium Voltage-Gated Ion Channels. Journal of NeuroImmune Pharmacology, 2009, 4, 71-82.	2.1	15
3318	Synthesis and docking studies of new 1,4-dihydropyridines containing 4-(5)-Chloro-2-ethyl-5-(4)-imidazolyl substituent as novel calcium channel agonist. Archives of Pharmacal Research, 2009, 32, 481-487.	2.7	24
3319	Modeling of mechanosensitive channel gating in response to wall shear stress. Journal of Biorheology, 2009, 23, 87-94.	0.2	3
3320	Molecular modeling and dynamics studies with explicit inclusion of electronic polarizability: theory and applications. Theoretical Chemistry Accounts, 2009, 124, 11-28.	0.5	314
3321	Chemistry in nanochannel confinement. Analytical and Bioanalytical Chemistry, 2009, 394, 385-397.	1.9	40
3322	Biomimetic membranes for sensor and separation applications. Analytical and Bioanalytical Chemistry, 2009, 395, 697-718.	1.9	150
3323	State-Dependent Accessibility of the P-S6 Linker of Pacemaker (HCN) Channels Supports a Dynamic Pore-to-Gate Coupling Model. Journal of Membrane Biology, 2009, 230, 35-47.	1.0	1
3324	The mechano-gated K2P channel TREK-1. European Biophysics Journal, 2009, 38, 293-303.	1.2	85
3325	Intracellular regions of potassium channels: Kv2.1 and heag. European Biophysics Journal, 2009, 38, 285-292.	1.2	15
3326	Ion channel gates: comparative analysis of energy barriers. European Biophysics Journal, 2009, 38, 347-354.	1.2	10
3327	Structure of the pore-helix of the hERG K+ channel. European Biophysics Journal, 2009, 39, 111-120.	1.2	18
3328	Gating the pore of potassium leak channels. European Biophysics Journal, 2009, 39, 61-73.	1.2	35
3329	Conformational rearrangements in the S6 domain and C-linker during gating in CNGA1 channels. European Biophysics Journal, 2009, 38, 993-1002.	1.2	12
3330	Using a five-state model for fitting amplitude histograms from MaxiK channels: β-distributions reveal more than expected. European Biophysics Journal, 2009, 38, 1101-1114.	1.2	7
3331	Permeation of water through the KcsA K ⁺ channel. Proteins: Structure, Function and Bioinformatics, 2009, 74, 437-448.	1.5	28

#	Article	IF	CITATIONS
3332	Fuzzy domains: New way of describing flexibility and interdependence of the protein domains. Proteins: Structure, Function and Bioinformatics, 2009, 74, 980-995.	1.5	1
3333	Affinity capture using chimeric membrane proteins bound to magnetic beads for rapid ligand screening by matrixâ€assisted laser desorption/ionization timeâ€ofâ€flight mass spectrometry. Rapid Communications in Mass Spectrometry, 2009, 23, 745-755.	0.7	6
3334	Gâ€proteinâ€coupled receptor structures were not built in a day. Protein Science, 2009, 18, 1335-1342.	3.1	27
3335	Features of homotetrameric molecular association in protein crystals. Acta Crystallographica Section D: Biological Crystallography, 2009, 65, 1-10.	2.5	3
3336	Crystallization and preliminary X-ray diffraction studies of the tetramerization domain derived from the human potassium channel Kv1.3. Acta Crystallographica Section F: Structural Biology Communications, 2009, 65, 688-691.	0.7	1
3337	Predicting the quaternary structure attribute of a protein by hybridizing functional domain composition and pseudo amino acid composition. Journal of Applied Crystallography, 2009, 42, 169-173.	1.9	65
3338	ProteinShader: illustrative rendering of macromolecules. BMC Structural Biology, 2009, 9, 19.	2.3	23
3339	The evolutionarily conserved residue A653 plays a key role in HERG channel closing. Journal of Physiology, 2009, 587, 2555-2566.	1.3	10
3340	Potassium channel opening: a subtle twoâ€step. Journal of Physiology, 2009, 587, 3851-3868.	1.3	9
3341	The response of the tandem pore potassium channel TASKâ€3 (K _{2P} 9.1) to voltage: gating at the cytoplasmic mouth. Journal of Physiology, 2009, 587, 4769-4783.	1.3	25
3342	Coupling of activation and inactivation gate in a K+-channel: potassium and ligand sensitivity. EMBO Journal, 2009, 28, 2825-2834.	3.5	94
3343	Mechanism of differential control of NMDA receptor activity by NR2 subunits. Nature, 2009, 459, 703-707.	13.7	293
3344	Biophysical dissection of membrane proteins. Nature, 2009, 459, 344-346.	13.7	250
3345	Crystal structure of a bacterial homologue of the kidney urea transporter. Nature, 2009, 462, 757-761.	13.7	104
3346	X-ray structure, symmetry and mechanism of an AMPA-subtype glutamate receptor. Nature, 2009, 462, 745-756.	13.7	966
3347	A general protocol for the crystallization of membrane proteins for X-ray structural investigation. Nature Protocols, 2009, 4, 619-637.	5.5	116
3348	Lipid-protein nanodiscs: Possible application in high-resolution NMR investigations of membrane proteins and membrane-active peptides. Biochemistry (Moscow), 2009, 74, 756-765.	0.7	47
3349	Molecular characteristics of transporters of C4-dicarboxylates and mechanism of translocation. Journal of Evolutionary Biochemistry and Physiology, 2009, 45, 323-339.	0.2	1

#	Article	IF	CITATIONS
3350	Inverse coupling in leak and voltage-activated K+ channel gates underlies distinct roles in electrical signaling. Nature Structural and Molecular Biology, 2009, 16, 71-79.	3.6	67
3351	High-resolution structure of the open NaK channel. Nature Structural and Molecular Biology, 2009, 16, 30-34.	3.6	120
3352	Structural determinants of gating in the TRPV1 channel. Nature Structural and Molecular Biology, 2009, 16, 704-710.	3.6	100
3353	Interactions between lipids and voltage sensor paddles detected with tarantula toxins. Nature Structural and Molecular Biology, 2009, 16, 1080-1085.	3.6	135
3354	Mechanism of potassium-channel selectivity revealed by Na+ and Li+ binding sites within the KcsA pore. Nature Structural and Molecular Biology, 2009, 16, 1317-1324.	3.6	158
3355	An engineered rightâ€handed coiled coil domain imparts extreme thermostability to the KcsA channel. FEBS Journal, 2009, 276, 6236-6246.	2.2	3
3356	Conservation and dispersion of sequence and function in fungal TRK potassium transporters: focus on <i>Candida albicans</i> . FEMS Yeast Research, 2009, 9, 278-292.	1.1	21
3357	Endothelial Ca ²⁺ â€activated K ⁺ channels in normal and impaired EDHF–dilator responses – relevance to cardiovascular pathologies and drug discovery. British Journal of Pharmacology, 2009, 157, 509-526.	2.7	174
3358	Fast-ion transport in peptide nanochannels. Materials Science and Engineering B: Solid-State Materials for Advanced Technology, 2009, 165, 261-265.	1.7	3
3359	Quinazolin-4-piperidin-4-methyl sulfamide PC-1 inhibitors: Alleviating hERG interactions through structure based design. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 3339-3343.	1.0	44
3360	Cross-saturation and transferred cross-saturation experiments. Progress in Nuclear Magnetic Resonance Spectroscopy, 2009, 54, 123-140.	3.9	44
3361	Determining the helical tilt of membrane peptides using electron paramagnetic resonance spectroscopy. Journal of Magnetic Resonance, 2009, 198, 1-7.	1.2	11
3362	A chloride ion-selective boron nitride nanotube. Chemical Physics Letters, 2009, 478, 185-190.	1.2	35
3363	Mechanistic aspects of benzothiazepines: A class of antiarrhythmic drugs. European Journal of Medicinal Chemistry, 2009, 44, 1-6.	2.6	12
3364	Interpretation of the Ussing flux ratio from the fluctuation theorem. Biophysical Chemistry, 2009, 139, 57-62.	1.5	6
3365	Changing Val-76 towards Kir channels drastically influences the folding and gating properties of the bacterial potassium channel KcsA. Biophysical Chemistry, 2009, 144, 95-100.	1.5	7
3366	Solution structure of a K+-channel blocker from the scorpion Tityus cambridgei. Protein Science, 2009, 11, 390-400.	3.1	14
3367	Atypical mechanism of conduction in potassium channels. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 16074-16077.	3.3	102

#	Article	IF	CITATIONS
3368	Structure–functional intimacies of transient receptor potential channels. Quarterly Reviews of Biophysics, 2009, 42, 201-246.	2.4	155
3369	<i>In Situ</i> Intracellular Spectroscopy with Surface Enhanced Raman Spectroscopy (SERS)-Enabled Nanopipettes. ACS Nano, 2009, 3, 3529-3536.	7.3	137
3371	Secbase: Database Module To Retrieve Secondary Structure Elements with Ligand Binding Motifs. Journal of Chemical Information and Modeling, 2009, 49, 2388-2402.	2.5	14
3372	Current Recordings of Ion Channel Proteins Immobilized on Resin Beads. Analytical Chemistry, 2009, 81, 3151-3154.	3.2	9
3373	From Repulsion to Attraction and Back to Repulsion: The Effect of NaCl, KCl, and CsCl on the Force between Silica Surfaces in Aqueous Solution. Langmuir, 2009, 25, 2831-2836.	1.6	183
3374	Pulsed Electronâ^'Electron Double-Resonance Determination of Spin-Label Distances and Orientations on the Tetrameric Potassium Ion Channel KcsA. Journal of the American Chemical Society, 2009, 131, 15246-15250.	6.6	92
3375	Generalized Langevin models of molecular dynamics simulations with applications to ion channels. Journal of Chemical Physics, 2009, 131, 134102.	1.2	35
3376	Chemical Tools for K+ Channel Biology. Biochemistry, 2009, 48, 517-526.	1.2	18
3377	Determinants of K ⁺ vs Na ⁺ Selectivity in Potassium Channels. Journal of the American Chemical Society, 2009, 131, 8092-8101.	6.6	90
3378	Developing Improved Charge Sets for the Modeling of the KcsA K ⁺ Channel Using QM/MM Electrostatic Potentials. Journal of Chemical Theory and Computation, 2009, 5, 2173-2179.	2.3	17
3379	Phase-Transition-Induced Protein Redistribution in Lipid Bilayers. Journal of Physical Chemistry B, 2009, 113, 16654-16659.	1.2	36
3380	QuatIdent: A Web Server for Identifying Protein Quaternary Structural Attribute by Fusing Functional Domain and Sequential Evolution Information. Journal of Proteome Research, 2009, 8, 1577-1584.	1.8	97
3381	Biophysical and Functional Characterization of an Ion Channel Peptide Confined in a Solâ^'Gel Matrix. Journal of Physical Chemistry B, 2009, 113, 7534-7540.	1.2	13
3382	Solution Structure of the HsapBK K ⁺ Channel Voltage-Sensor Paddle Sequence [,] . Biochemistry, 2009, 48, 5813-5821.	1.2	12
3383	Use of voltage clamp fluorimetry in understanding potassium channel gating: a review of <i>Shaker</i> fluorescence data. Canadian Journal of Physiology and Pharmacology, 2009, 87, 411-418.	0.7	13
3384	Nicotinic acetylcholine receptors at atomic resolution. Current Opinion in Pharmacology, 2009, 9, 306-310.	1.7	39
3385	Relevance of quantum mechanics on some aspects of ion channel function. Comptes Rendus - Biologies, 2009, 332, 517-522.	0.1	17
3386	Dissimilarity in the channel intrinsic stability among the bacterial KcsA and the inwardly rectifying potassium channel ROMK1. Biochimie, 2009, 91, 1426-1433.	1.3	4

#	Article	IF	CITATIONS
3387	K+ binding in the G-loop and water cavity facilitates Ba2+ movement in the Kir2.1 channel. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 500-506.	1.4	5
3388	Role of polyphosphate in regulation of the Streptomyces lividans KcsA channel. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 608-614.	1.4	13
3389	Ion binding properties and structure stability of the NaK channel. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 1024-1032.	1.4	15
3390	Thermal and chemical unfolding and refolding of a eukaryotic sodium channel. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 1279-1286.	1.4	24
3391	Structure–function studies on the voltage-gated sodium channel. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 2374-2379.	1.4	15
3392	Protein structure and ionic selectivity in calcium channels: Selectivity filter size, not shape, matters. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 2471-2480.	1.4	42
3393	Structural and functional analysis of extracellular loop 2 of the Na+/H+ exchanger. Biochimica Et Biophysica Acta - Biomembranes, 2009, 1788, 2481-2488.	1.4	15
3394	Evaluation of channel function after alteration of amino acid residues at the pore center of KCNQ1 channel. Biochemical and Biophysical Research Communications, 2009, 378, 589-594.	1.0	3
3395	Mixed modes in opening of KcsA potassium channel from a targeted molecular dynamics simulation. Biochemical and Biophysical Research Communications, 2009, 388, 86-90.	1.0	4
3396	Fast inactivation in potassium channels: An interplay of cytoplasmic domains. Biochemical and Biophysical Research Communications, 2009, 388, 490-495.	1.0	0
3397	Molecular cloning and tissue expression patterns of a small conductance calcium-activated potassium channel gene in turbot (Scophthalmus maximus L.). Fish and Shellfish Immunology, 2009, 27, 221-229.	1.6	1
3398	What makes a gate? The ins and outs of Kv-like K+ channels in plants. Trends in Plant Science, 2009, 14, 383-390.	4.3	98
3399	Action potential initiation and propagation: Upstream influences on neurotransmission. Neuroscience, 2009, 158, 211-222.	1.1	103
3400	Expression and purification of human TRPV1 in baculovirus-infected insect cells for structural studies. Protein Expression and Purification, 2009, 65, 38-50.	0.6	12
3401	Solution structure of the KdpFABC P-type ATPase from Escherichia coli by electron microscopic single particle analysis. Journal of Structural Biology, 2009, 166, 295-302.	1.3	6
3402	Assembly of Kch, a putative potassium channel from Escherichia coli. Journal of Structural Biology, 2009, 168, 288-293.	1.3	4
3403	Molecular Biology of Background K Channels: Insights from K2P Knockout Mice. Journal of Molecular Biology, 2009, 385, 1331-1344.	2.0	21
3404	Fas Apoptosis Inhibitory Molecule Contains a Novel β-Sandwich in Contact with a Partially Ordered Domain. Journal of Molecular Biology, 2009, 386, 1024-1037.	2.0	17

#	Article	IF	CITATIONS
3405	Mechanism of Aquaporin-4's Fast and Highly Selective Water Conduction and Proton Exclusion. Journal of Molecular Biology, 2009, 389, 694-706.	2.0	114
3406	Theory of single-file multiparticle diffusion in narrow pores. Physical Review E, 2009, 80, 031118.	0.8	5
3407	Crystal structure of full-length KcsA in its closed conformation. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 6644-6649.	3.3	213
3408	Model Development for the Viral Kcv Potassium Channel. Biophysical Journal, 2009, 96, 485-498.	0.2	35
3409	Predictions Suggesting a Participation of β-Sheet Configuration in the M2 Domain of the P2X7 Receptor: A Novel Conformation?. Biophysical Journal, 2009, 96, 951-963.	0.2	5
3410	Changes in Negative Charge at the Luminal Mouth of the Pore Alter Ion Handling and Gating in the Cardiac Ryanodine-Receptor. Biophysical Journal, 2009, 96, 1374-1387.	0.2	16
3411	Ion Selectivity in the KcsA Potassium Channel from the Perspective of the Ion Binding Site. Biophysical Journal, 2009, 96, 2138-2145.	0.2	38
3412	Mechanism and Energetics of Charybdotoxin Unbinding from a Potassium Channel from Molecular Dynamics Simulations. Biophysical Journal, 2009, 96, 2577-2588.	0.2	36
3413	Interactions of H562 in the S5 Helix with T618 and S621 in the Pore Helix Are Important Determinants of hERG1 Potassium Channel Structure and Function. Biophysical Journal, 2009, 96, 3600-3610.	0.2	40
3415	Initial structural and dynamic characterization of the M2 protein transmembrane and amphipathic helices in lipid bilayers. Protein Science, 2009, 12, 2597-2605.	3.1	119
3416	Chapter 1 Ion Permeability of Membranes. Behavior Research Methods, 2009, , 1-27.	2.3	0
3417	Punching Holes in Membranes: How Oligomeric Pore-Forming Proteins and Lipids Cooperate to Form Aqueous Channels in Membranes. , 2009, , 223-262.		4
3418	Eine Strukturbiologie für Membranproteine. Nachrichten Aus Der Chemie, 2009, 57, 27-31.	0.0	1
3419	Marine Toxins as Research Tools. Progress in Molecular and Subcellular Biology, 2009, , .	0.9	13
3420	Ion Channels. , 2009, , 387-427.		17
3421	Receptors. , 2009, , 37-79.		0
3422	Searching for interesting channels: pairing selection and molecular evolution methods to study ion channel structure and function. Molecular BioSystems, 2009, 5, 802.	2.9	14
3423	Strategies for The Cloning and Expression of Membrane Proteins. Advances in Protein Chemistry and Structural Biology, 2009, 76, 43-86.	1.0	10

#	Article	IF	CITATIONS
3424	REVIEW : Recent advances in developing web-servers for predicting protein attributes. Natural Science, 2009, 01, 63-92.	0.2	222
3425	The TRPC Class of Ion Channels: A Critical Review of Their Roles in Slow, Sustained Increases in Intracellular Ca ²⁺ Concentrations. Annual Review of Pharmacology and Toxicology, 2009, 49, 395-426.	4.2	223
3426	Fundamental Aspects of Proteinâ 'Protein Association Kinetics. Chemical Reviews, 2009, 109, 839-860.	23.0	637
3427	Intrinsic Ion Selectivity of Narrow Hydrophobic Pores. Journal of Physical Chemistry B, 2009, 113, 7642-7649.	1.2	183
3428	Inferior Colliculus. , 2009, , 1947-1950.		0
3431	Hyperpolarization-Activated Cation Channels: From Genes to Function. Physiological Reviews, 2009, 89, 847-885.	13.1	868
3432	Modular Strategy for the Semisynthesis of a K ⁺ Channel: Investigating Interactions of the Pore Helix. ACS Chemical Biology, 2009, 4, 1029-1038.	1.6	37
3433	Aδ-, C-Fibers. , 2008, , 2-2.		0
3434	Ion selectivity of the Kat1 K ⁺ channel pore. Molecular Membrane Biology, 2009, 26, 293-308.	2.0	7
3435	Micro-solvation of the Zn2+ ion—a case study. Physical Chemistry Chemical Physics, 2009, 11, 8285.	1.3	27
3436	"Aplosspan:―a bilayer-length, ion-selective ionophore that functions in phospholipid bilayers. Chemical Communications, 2009, , 911.	2.2	12
3437	Comparative analysis of M–O, M–S and cation–π(arene) interactions in the alkali metal (Na+, K+, Rb+,) Tj	ЕТ <u>О</u> д11С).784314 rgE
3438	Length-dependent regulation of the Kv1.2 channel activation by its C-terminus. Molecular Membrane Biology, 2009, 26, 186-193.	2.0	6
3439	Determination of the charge profile in the KcsA selectivity filter using ab initio calculations and molecular dynamics simulations. Physical Chemistry Chemical Physics, 2009, 11, 8606.	1.3	9
3440	An artificial sodium ion channel from calix[4]arene in the 1,3- <i>alternate</i> conformation. Supramolecular Chemistry, 2009, 21, 55-60.	1.5	20
3442	Sea Anemone Toxins Affecting Potassium Channels. Progress in Molecular and Subcellular Biology, 2009, 46, 99-122.	0.9	37
3443	Electrophysiological Measurements of Membrane Proteins. , 2009, , 1-35.		0
3444	Kv1.3 potassium channels as a therapeutic target in multiple sclerosis. Expert Opinion on Therapeutic Targets, 2009, 13, 909-924.	1.5	79

#	Article	IF	CITATIONS
3445	Anionâ^'Macrodipole Interactions: Self-Assembling Oligourea/Amide Macrocycles as Anion Transporters that Respond to Membrane Polarization. Journal of the American Chemical Society, 2009, 131, 16889-16895.	6.6	110
3446	Conformational dynamics of the inner pore helix of voltage-gated potassium channels. Journal of Chemical Physics, 2009, 130, 215103.	1.2	12
3447	A Poisson–Nernst–Planck Model for Biological Ion Channels—An Asymptotic Analysis in a Three-Dimensional Narrow Funnel. SIAM Journal on Applied Mathematics, 2009, 70, 949-968.	0.8	80
3448	Primers on Molecular Pathways — Ion Channels: Key Regulators of Pancreatic Physiology. Pancreatology, 2009, 9, 556-559.	0.5	2
3449	Quaternary Benzyltriethylammonium Ion Binding to the Na,K-ATPase: A Tool to Investigate Extracellular K ⁺ Binding Reactions. Biochemistry, 2009, 48, 8105-8119.	1.2	9
3450	Charge fluctuations and their effect on conduction in biological ion channels. Journal of Statistical Mechanics: Theory and Experiment, 2009, 2009, P01010.	0.9	7
3451	Chlorella virus ATCV-1 encodes a functional potassium channel of 82 amino acids. Biochemical Journal, 2009, 420, 295-305.	1.7	38
3453	Revolution or passing fashion? Reassessing the precautionary principle. International Journal of Risk Assessment and Management, 2009, 12, 14.	0.2	5
3454	Chapter 7 Influenza A M2. Behavior Research Methods, 2009, 10, 161-201.	2.3	6
3456	Voltage Gated Potassium Channels: Structure and Function of Kv1 to Kv9 Subfamilies. , 2009, , 397-425.		22
3457	In Silico Prediction of Drug Properties. Current Medicinal Chemistry, 2009, 16, 189-202.	1.2	46
3458	Evolution of the Human Ion Channel Set. Combinatorial Chemistry and High Throughput Screening, 2009, 12, 2-23.	0.6	90
3459	Ephedrine Controls Heart Rhythms by Activating Cardiac Iks Currents. Journal of Cardiovascular Pharmacology, 2010, 55, 145-152.	0.8	6
3460	Regulation and function of potassium channels in aldosterone-sensitive distal nephron. Current Opinion in Nephrology and Hypertension, 2010, 19, 463-470.	1.0	36
3461	Bacterial Ion Channels. EcoSal Plus, 2010, 4, .	2.1	4
3462	The Tetrodotoxin Binding Site Is within the Outer Vestibule of the Sodium Channel. Marine Drugs, 2010, 8, 219-234.	2.2	110
3463	Cooccupancy of the Outer Vestibule of Voltage-Gated Sodium Channels by μ-Conotoxin KIIIA and Saxitoxin or Tetrodotoxin. Journal of Neurophysiology, 2010, 104, 88-97.	0.9	37
3464	Structure–Function Studies of the Claudin Pore. Current Topics in Membranes, 2010, 65, 79-95.	0.5	Ο

#	Article	IF	Citations
3467	The role of metal cation in electron-induced dissociation of tryptophan. European Physical Journal D, 2010, 60, 11-20.	0.6	16
3468	Normal Mode Analysis of Biomolecular Structures: Functional Mechanisms of Membrane Proteins. Chemical Reviews, 2010, 110, 1463-1497.	23.0	461
3469	Structures of membrane proteins. Quarterly Reviews of Biophysics, 2010, 43, 65-158.	2.4	157
3470	In Silico Binary Classification QSAR Models Based on 4D-Fingerprints and MOE Descriptors for Prediction of hERG Blockage. Journal of Chemical Information and Modeling, 2010, 50, 1304-1318.	2.5	74
3471	Protein folding in membranes. Cellular and Molecular Life Sciences, 2010, 67, 1779-1798.	2.4	69
3472	Potassium and sodium transport in non-animal cells: the Trk/Ktr/HKT transporter family. Cellular and Molecular Life Sciences, 2010, 67, 2511-2532.	2.4	215
3473	A theoretical study of the hydration of Rb+ by Monte Carlo simulations with refined ab initio-based model potentials. Theoretical Chemistry Accounts, 2010, 126, 197-211.	0.5	22
3474	Mutations in the K+-Channel KcsA Toward Kir Channels Alter Salt-Induced Clusterization and Blockade by Quaternary Alkylammonium Ions. Journal of Membrane Biology, 2010, 233, 43-50.	1.0	3
3475	The "Flipped―State in E71A-K+-Channel KcsA Exclusively Alters the Channel Gating Properties by Tetraethylammonium and Phosphatidylglycerol. Journal of Membrane Biology, 2010, 234, 1-11.	1.0	8
3476	The Intracellular Localization and Function of the ATP-Sensitive K+ Channel Subunit Kir6.1. Journal of Membrane Biology, 2010, 234, 137-147.	1.0	20
3477	The Role of Phosphatidic Acid and Cardiolipin in Stability of the Tetrameric Assembly of Potassium Channel KcsA. Journal of Membrane Biology, 2010, 234, 235-240.	1.0	22
3478	The Role of Extramembranous Cytoplasmic Termini in Assembly and Stability of the Tetrameric K+-Channel KcsA. Journal of Membrane Biology, 2010, 235, 51-61.	1.0	15
3479	Amphotericin B Membrane Action: Role for Two Types of Ion Channels in Eliciting Cell Survival and Lethal Effects. Journal of Membrane Biology, 2010, 238, 1-20.	1.0	79
3480	The role of protons in fast and slow gating of the Torpedo chloride channel ClC-0. European Biophysics Journal, 2010, 39, 869-875.	1.2	20
3481	Salt bridges in the miniature viral channel Kcv are important for function. European Biophysics Journal, 2010, 39, 1057-1068.	1.2	21
3482	Crystal structures of all-alpha type membrane proteins. European Biophysics Journal, 2010, 39, 723-755.	1.2	27
3483	Orientation and dynamics of transmembrane peptides: the power of simple models. European Biophysics Journal, 2010, 39, 609-621.	1.2	114
3484	Structural modeling of calcium binding in the selectivity filter of the L-type calcium channel. European Biophysics Journal, 2010, 39, 839-853.	1.2	16

#	Article	IF	CITATIONS
3485	Sieving experiments and pore diameter: it's not a simple relationship. European Biophysics Journal, 2010, 39, 1513-1521.	1.2	13
3486	Ion selectivity from local configurations of ligands in solutions and ion channels. Chemical Physics Letters, 2010, 485, 1-7.	1.2	80
3487	Molecular simulation study of the effect of inner wall modified groups on ionic hydration confined in carbon nanotube. Fluid Phase Equilibria, 2010, 297, 215-220.	1.4	36
3488	Stochastic resonance in a surface dipole. Chemical Physics, 2010, 375, 410-415.	0.9	4
3489	Asynchronous motion and transport of in the KcsA selectivity filter. Physica A: Statistical Mechanics and Its Applications, 2010, 389, 3013-3022.	1.2	4
3490	Shape-dependent global deformation modes of large protein structures. Journal of Molecular Structure, 2010, 972, 41-50.	1.8	2
3491	Gating in CNGA1 channels. Pflugers Archiv European Journal of Physiology, 2010, 459, 547-555.	1.3	22
3492	HCN-related channelopathies. Pflugers Archiv European Journal of Physiology, 2010, 460, 405-415.	1.3	84
3493	Identification and characterization of a novel bacterial ATP-sensitive K+ channel. Journal of Microbiology, 2010, 48, 325-330.	1.3	6
3494	On the Origin of Ion Selectivity in the Cys-Loop Receptor Family. Journal of Molecular Neuroscience, 2010, 40, 70-76.	1.1	24
3495	The Biochemistry, Ultrastructure, and Subunit Assembly Mechanism of AMPA Receptors. Molecular Neurobiology, 2010, 42, 161-184.	1.9	71
3496	The New York Consortium on Membrane Protein Structure (NYCOMPS): a high-throughput platform for structural genomics of integral membrane proteins. Journal of Structural and Functional Genomics, 2010, 11, 191-199.	1.2	57
3497	Pancreatic β-cell KATP channels: Hypoglycaemia and hyperglycaemia. Reviews in Endocrine and Metabolic Disorders, 2010, 11, 157-163.	2.6	54
3498	Single particle reconstruction of membrane proteins: A tool for understanding the 3D structure of disease-related macromolecules. Progress in Biophysics and Molecular Biology, 2010, 103, 122-130.	1.4	2
3499	Ca2+ channels and skeletal muscle diseases. Progress in Biophysics and Molecular Biology, 2010, 103, 35-43.	1.4	38
3500	Reverse Micelle Encapsulation of Membrane-Anchored Proteins for Solution NMR Studies. Structure, 2010, 18, 9-16.	1.6	48
3501	Structural Dynamics of the Magnesium-Bound Conformation of CorA in a Lipid Bilayer. Structure, 2010, 18, 868-878.	1.6	30
3502	Mg2+ Channel Selectivity Probed by EPR. Structure, 2010, 18, 759-760.	1.6	0

#	Article	IF	CITATIONS
3503	The amiodarone derivative KB130015 activates hERG1 potassium channels via a novel mechanism. European Journal of Pharmacology, 2010, 632, 52-59.	1.7	23
3504	Linking structure to function: Recent lessons from inositol 1,4,5-trisphosphate receptor mutagenesis. Cell Calcium, 2010, 47, 469-479.	1.1	77
3505	Design and characterization of a constitutively open KcsA. FEBS Letters, 2010, 584, 1133-1138.	1.3	25
3506	Large conductance, Ca ²⁺ â€activated K ⁺ channels (BK _{Ca}) and arteriolar myogenic signaling. FEBS Letters, 2010, 584, 2033-2042.	1.3	120
3507	Separation of heteromeric potassium channel Kcv towards probing subunit compositionâ€regulated ion permeation and gating. FEBS Letters, 2010, 584, 1602-1608.	1.3	3
3508	K ⁺ transport characteristics of the plasma membrane tandemâ€pore channel TPK4 and pore chimeras with its vacuolar homologs. FEBS Letters, 2010, 584, 2433-2439.	1.3	21
3509	Toward a Consensus Model of the hERG Potassium Channel. ChemMedChem, 2010, 5, 455-467.	1.6	66
3510	Prospective Validation of a Comprehensive In silico hERG Model and its Applications to Commercial Compound and Drug Databases. ChemMedChem, 2010, 5, 716-729.	1.6	87
3511	Structural Water Drives Selfâ€assembly of Organic Rosette Nanotubes and Holds Host Atoms in the Channel. ChemPhysChem, 2010, 11, 361-367.	1.0	43
3512	Dissecting the pathogenic mechanisms of mutations in the pore region of the human cone photoreceptor cyclic nucleotide-gated channel. Human Mutation, 2010, 31, 830-839.	1.1	20
3513	KvDB; mining and mapping sequence variants in voltage-gated potassium channels. Human Mutation, 2010, 31, 908-917.	1.1	3
3514	The Nature of Aqueous Solutions: Insights into Multiple Facets of Chemistry and Biochemistry from Freezingâ€Point Depressions. Chemistry - A European Journal, 2010, 16, 5942-5960.	1.7	48
3515	Inside protein structures: Teaching in three dimensions. Biochemistry and Molecular Biology Education, 2010, 38, 425-429.	0.5	19
3517	Selective Aggregation of a Platinum–Gadolinium Complex Within a Tumorâ€Cell Nucleus. Angewandte Chemie - International Edition, 2010, 49, 1231-1233.	7.2	44
3518	Modeling electrokinetic flows in microchannels using coupled lattice Boltzmann methods. Journal of Computational Physics, 2010, 229, 728-744.	1.9	117
3519	Molecular modelling of central nervous system receptors. Mendeleev Communications, 2010, 20, 243-248.	0.6	3
3520	Vibrational signatures of zwitterionic and charge-solvated structures for alkaline earth-tryptophan dimer complexes in the gas phase. International Journal of Mass Spectrometry, 2010, 297, 131-138.	0.7	31
3521	Dimer currents on one dimensional asymmetric substrates. Chemical Physics, 2010, 375, 458-463.	0.9	2

#	Article	IF	CITATIONS
3522	Macrodipoles of potassium and chloride ion channels as revealed by electronic structure calculations. Computational and Theoretical Chemistry, 2010, 950, 79-82.	1.5	6
3523	A high-throughput differential filtration assay to screen and select detergents for membrane proteins. Analytical Biochemistry, 2010, 407, 1-11.	1.1	31
3524	Studies of ion channels using expressed protein ligation. Current Opinion in Chemical Biology, 2010, 14, 797-802.	2.8	12
3525	Fluxes of non-interacting and strongly repelling particles through a single conical channel: Analytical results and their numerical tests. Chemical Physics, 2010, 375, 523-528.	0.9	14
3526	Applications of biological pores in nanomedicine, sensing, and nanoelectronics. Current Opinion in Biotechnology, 2010, 21, 439-476.	3.3	298
3527	Ion channels in T lymphocytes: An update on facts, mechanisms and therapeutic targeting in autoimmune diseases. Immunology Letters, 2010, 130, 19-25.	1.1	46
3528	Models of membraneâ€bound Alzheimer's Abeta peptide assemblies. Proteins: Structure, Function and Bioinformatics, 2010, 78, 3473-3487.	1.5	65
3529	TREKâ€1 channels do not mediate nitrergic neurotransmission in circular smooth muscle from the lower oesophageal sphincter. British Journal of Pharmacology, 2010, 159, 362-373.	2.7	7
3530	Identification of amino acids in the pore region of Kv1.2 potassium channel that regulate its glycosylation and cell surface expression. Journal of Neurochemistry, 2010, 112, 913-923.	2.1	5
3531	Repolarization of the cardiac action potential. Does an increase in repolarization capacity constitute a new antiâ€arrhythmic principle?. Acta Physiologica, 2010, 198, 1-48.	1.8	60
3532	The birth and postnatal development of purinergic signalling. Acta Physiologica, 2010, 199, 93-147.	1.8	114
3533	Ion channel remodeling in gastrointestinal inflammation. Neurogastroenterology and Motility, 2010, 22, 1045-1055.	1.6	36
3534	Structure and mechanism of a pentameric formate channel. Nature Structural and Molecular Biology, 2010, 17, 31-37.	3.6	86
3535	Molecular determinants of coupling between the domain III voltage sensor and pore of a sodium channel. Nature Structural and Molecular Biology, 2010, 17, 230-237.	3.6	49
3536	Novel insights into K+ selectivity from high-resolution structures of an open K+ channel pore. Nature Structural and Molecular Biology, 2010, 17, 1019-1023.	3.6	122
3537	Structural mechanism of C-type inactivation in K+ channels. Nature, 2010, 466, 203-208.	13.7	437
3538	Ionâ€dependent gating of kainate receptors. Journal of Physiology, 2010, 588, 67-81.	1.3	30
3539	SYMPOSIUM REVIEW: Going native: voltage-gated potassium channels controlling neuronal excitability. Journal of Physiology, 2010, 588, 3187-3200.	1.3	243

# 3540	ARTICLE SYMPOSIUM REVIEW: Gating of two pore domain potassium channels. Journal of Physiology, 2010, 588, 3149-3156.	IF 1.3	CITATIONS
3541	BK-type calcium-activated potassium channels: coupling of metal ions and voltage sensing. Journal of Physiology, 2010, 588, 4651-4658.	1.3	25
3542	Ion Permeation. , 2010, , 217-220.		0
3543	IP3 Receptors. , 2010, , 921-925.		0
3544	Ryanodine Receptors. , 2010, , 927-935.		1
3549	The Outer Vestibule of the Na+ Channel–Toxin Receptor and Modulator of Permeation as Well as Gating. Marine Drugs, 2010, 8, 1373-1393.	2.2	13
3551	The neurobiology of consciousness. , 2010, , 24-46.		12
3552	Mutagenesis and Functional Analysis of Ion Channels Heterologously Expressed in Mammalian Cells. Journal of Visualized Experiments, 2010, , .	0.2	3
3553	The molecular mechanisms and pharmacotherapy of ATP-sensitive potassium channel gene mutations underlying neonatal diabetes. Pharmacogenomics and Personalized Medicine, 2010, 3, 145.	0.4	12
3554	Structural basis underlying the dual gate properties of KcsA. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 6216-6221.	3.3	113
3555	Inactivation of the KcsA potassium channel explored with heterotetramers. Journal of General Physiology, 2010, 135, 29-42.	0.9	22
3556	The Ryanodine Receptor Pore. Current Topics in Membranes, 2010, 66, 49-67.	0.5	6
3557	Molecular Model of Anticonvulsant Drug Binding to the Voltage-Gated Sodium Channel Inner Pore. Molecular Pharmacology, 2010, 78, 631-638.	1.0	102
3559	Potassium channel gating: Not an open and shut case. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 7623-7624.	3.3	2
3560	Electrostatic Interactions Determining the Selectivity of KcsA Channel and Its Mutants. Chinese Physics Letters, 2010, 27, 088701.	1.3	0
3561	Activation of Slo2.1 channels by niflumic acid. Journal of General Physiology, 2010, 135, 275-295.	0.9	24
3562	Probing Pore Constriction in a Ligand-gated Ion Channel by Trapping a Metal Ion in the Pore upon Agonist Dissociation. Journal of Biological Chemistry, 2010, 285, 26519-26531.	1.6	8
3563	3V: cavity, channel and cleft volume calculator and extractor. Nucleic Acids Research, 2010, 38, W555-W562.	6.5	427

# 3564	ARTICLE Fast and slow voltage sensor rearrangements during activation gating in Kv1.2 channels detected using tetramethylrhodamine fluorescence. Journal of General Physiology, 2010, 136, 83-99.	IF 0.9	CITATIONS
3565	Lipid bilayer regulation of membrane protein function: gramicidin channels as molecular force probes. Journal of the Royal Society Interface, 2010, 7, 373-395.	1.5	265
3566	Charges in the hydrophobic interior of proteins. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 16096-16100.	3.3	195
3567	Mechanosensitivity of ion channels based on protein–lipid interactions. Journal of the Royal Society Interface, 2010, 7, S307-20.	1.5	40
3568	Insights into the Molecular Mechanism of hERG1 Channel Activation and Blockade by Drugs. Current Medicinal Chemistry, 2010, 17, 3514-3532.	1.2	51
3569	Comparative Study of the Gating Motif and C-type Inactivation in Prokaryotic Voltage-gated Sodium Channels. Journal of Biological Chemistry, 2010, 285, 3685-3694.	1.6	62
3570	Rearrangements in the KcsA Cytoplasmic Domain Underlie Its Gating. Journal of Biological Chemistry, 2010, 285, 3777-3783.	1.6	25
3571	Ca ²⁺ -Activated K ⁺ Channels: From Protein Complexes to Function. Physiological Reviews, 2010, 90, 1437-1459.	13.1	225
3572	Quantum coherence in ion channels: resonances, transport and verification. New Journal of Physics, 2010, 12, 085001.	1.2	67
3573	Molecular simulations of ion channels: a quantum chemist's perspective. Journal of General Physiology, 2010, 135, 549-554.	0.9	35
3574	Gating of a G protein-sensitive Mammalian Kir3.1 Prokaryotic Kir Channel Chimera in Planar Lipid Bilayers. Journal of Biological Chemistry, 2010, 285, 39790-39800.	1.6	34
3575	Fatty acid modulation and polyamine block of GluK2 kainate receptors analyzed by scanning mutagenesis. Journal of General Physiology, 2010, 136, 339-352.	0.9	19
3576	Application of Function Domain and Pseudo Amino Acid Composition to Predict Hetero-Oligomer Protein Structural Types. International Conference on Bioinformatics and Biomedical Engineering: [proceedings] International Conference on Bioinformatics and Biomedical Engineering, 2010, , .	0.0	0
3577	Beyond small-angle x-ray scattering: Exploiting angular correlations. Physical Review B, 2010, 81, .	1.1	59
3578	lon transport through confined ion channels in the presence of immobile charges. Physical Review E, 2010, 81, 031928.	0.8	0
3579	Principles of conduction and hydrophobic gating in K ⁺ channels. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 5833-5838.	3.3	298
3580	Thermosensitive TRP channel pore turret is part of the temperature activation pathway. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 7083-7088.	3.3	183
3581	Separate Gating Mechanisms Mediate the Regulation of K2P Potassium Channel TASK-2 by Intra- and Extracellular pH. Journal of Biological Chemistry, 2010, 285, 16467-16475.	1.6	59

#	Article	IF	Citations
3582	Characterization and Functional Restoration of a Potassium Channel Kir6.2 Pore Mutation Identified in Congenital Hyperinsulinism. Journal of Biological Chemistry, 2010, 285, 6012-6023.	1.6	5
3583	Molecular endpoints of Ca2+/calmodulin- and voltage-dependent inactivation of Cav1.3 channels. Journal of General Physiology, 2010, 135, 197-215.	0.9	58
3584	Gain of Function Mutations in Membrane Region M2C2 of KtrB Open a Gate Controlling K+ Transport by the KtrAB System from Vibrio alginolyticus. Journal of Biological Chemistry, 2010, 285, 10318-10327.	1.6	27
3585	Changes in Accessibility of Cytoplasmic Substances to the Pore Associated with Activation of the Cystic Fibrosis Transmembrane Conductance Regulator Chloride Channel. Journal of Biological Chemistry, 2010, 285, 32126-32140.	1.6	53
3586	Transient and Big Are Key Features of an Invertebrate T-type Channel (LCa3) from the Central Nervous System of Lymnaea stagnalis. Journal of Biological Chemistry, 2010, 285, 7447-7458.	1.6	36
3587	Overlapping Binding Sites of Structurally Different Antiarrhythmics Flecainide and Propafenone in the Subunit Interface of Potassium Channel Kv2.1*. Journal of Biological Chemistry, 2010, 285, 33898-33905.	1.6	17
3588	Membrane Region M2C2 in Subunit KtrB of the K+ Uptake System KtrAB from Vibrio alginolyticus Forms a Flexible Gate Controlling K+ Flux. Journal of Biological Chemistry, 2010, 285, 28210-28219.	1.6	29
3589	A homology model of the pore domain of a voltage-gated calcium channel is consistent with available SCAM data. Journal of General Physiology, 2010, 135, 261-274.	0.9	17
3590	A Molecular Switch between the Outer and the Inner Vestibules of the Voltage-gated Na+ Channel. Journal of Biological Chemistry, 2010, 285, 39458-39470.	1.6	21
3591	Stoichiometry of the KCNQ1Â-ÂKCNE1 ion channel complex. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 18862-18867.	3.3	174
3592	Alkali metal and ammonium cation–arene interactions with tetraphenylborate anion. Supramolecular Chemistry, 2010, 22, 73-80.	1.5	10
3593	The β Subunit of Voltage-Gated Ca ²⁺ Channels. Physiological Reviews, 2010, 90, 1461-1506.	13.1	346
3594	An Overview of Ion Channel Structure. , 2010, , 201-207.		3
3595	Probing single nanometer-scale pores with polymeric molecular rulers. Journal of Chemical Physics, 2010, 132, 135101.	1.2	47
3596	Synchrotron radiation circular dichroism spectroscopy-defined structure of the C-terminal domain of NaChBac and its role in channel assembly. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 14064-14069.	3.3	41
3597	Old Gate Gets a New Look. Science, 2010, 329, 151-152.	6.0	4
3598	Ancillary Subunits Associated With Voltage-Dependent K ⁺ Channels. Physiological Reviews, 2010, 90, 755-796.	13.1	258
3599	Characterization of the PCMBS-dependent modification of KCa3.1 channel gating. Journal of General Physiology, 2010, 136, 367-387.	0.9	12

		CITATION R	REPORT	
#	Article		IF	Citations
3600	A Trk/HKT-Type K ⁺ Transporter from Trypanosoma brucei. Eukaryotic Cell, 20	10, 9, 539-546.	3.4	18
3601	Extracellular K + Is a Prerequisite for the Function and Plasma Membrane Stability of HERG Circulation Research, 2010, 106, 1072-1082.	Channels.	2.0	40
3602	A conserved arginine near the filter of Kir1.1 controls Rb/K selectivity. Channels, 2010, 4, 2	03-214.	1.5	8
3603	Controlling current reversals in synchronized underdamped ratchets. Journal of Physics A: Mathematical and Theoretical, 2010, 43, 165101.		0.7	7
3604	Connexin Modulators and Their Potential Targets under the Magnifying Class. Current Mec Chemistry, 2010, 17, 4191-4230.	licinal	1.2	52
3605	Toward the Rational Design of Constitutively Active KCa3.1 Mutant Channels. Methods in 2010, 485, 437-457.	Enzymology,	0.4	4
3606	Electron Microscopy of Ryanodine Receptors. Current Topics in Membranes, 2010, 66, 27-	47.	0.5	5
3607	Molecular Architecture of the Inositol 1,4,5-Trisphosphate Receptor Pore. Current Topics in Membranes, 2010, 66, 191-207.		0.5	7
3608	Kv1.5-Kvβ Interactions: Molecular Determinants and Pharmacological Consequences Mini-Reviews in Medicinal Chemistry, 2010, 10, 635-642.	i.	1.1	12
3609	Understanding ion channels using computational approaches. Future Medicinal Chemistry, 697-701.	, 2010, 2,	1.1	1
3610	On the Domain of Applicability of Currently used Force Fields for the Calculation of the Act Alkali Ions at Physiological Ionic Strength. Biophysical Journal, 2010, 98, 330a-331a.	ivity of	0.2	1
3611	Electron Spin-Echo Envelope Modulation (ESEEM) Reveals Water and Phosphate Interactio KcsA Potassium Channel [,] . Biochemistry, 2010, 49, 1486-1494.	ns with the	1.2	35
3612	Combined Voltage-Clamp and Atomic Force Microscope for the Study of Membrane Electro 2010, , 461-489.	omechanics. ,		0
3613	A Combined Experimental and Theoretical Study of Ion Solvation in Liquid <i>N</i> -Methyl Journal of the American Chemical Society, 2010, 132, 10847-10856.	acetamide.	6.6	35
3614	Protein Crystallization Using Microfluidic Technologies Based on Valves, Droplets, and Slip Annual Review of Biophysics, 2010, 39, 139-158.	Chip.	4.5	166
3615	Electrophysiology of Islet Cells. Advances in Experimental Medicine and Biology, 2010, 654	, 115-163.	0.8	123
3616	Gramicidin Channels Are Internally Gated. Biophysical Journal, 2010, 98, 1486-1493.		0.2	13
3617	Coordination Numbers of K+ and Na+ Ions Inside the Selectivity Filter ofÂtheÂKcsA Potassi Insights from First Principles MolecularÂDynamics. Biophysical Journal, 2010, 98, L47-L49.	um Channel:	0.2	64

#	Article	IF	CITATIONS
3618	Exploring the Ion Selectivity Properties of a Large Number of Simplified Binding Site Models. Biophysical Journal, 2010, 98, 2877-2885.	0.2	29
3619	The Effects of pKa Tuning on the Thermodynamics and Kinetics ofÂFolding:ÂDesign of a Solvent-Shielded Carboxylate Pair at the a-PositionÂof a Coiled-Coil. Biophysical Journal, 2010, 99, 2299-2308.	0.2	10
3620	Voltage Profile along the Permeation Pathway of an Open Channel. Biophysical Journal, 2010, 99, 2863-2869.	0.2	18
3621	Changes in Single K+ Channel Behavior Induced by a Lipid Phase Transition. Biophysical Journal, 2010, 99, 3675-3683.	0.2	41
3622	New Trends in Cancer Therapy: Targeting Ion Channels and Transporters. Pharmaceuticals, 2010, 3, 1202-1224.	1.7	42
3623	Sandwiched Grapheneâ ^{~,} Membrane Superstructures. ACS Nano, 2010, 4, 229-234.	7.3	252
3624	Factors Governing the Na ⁺ vs K ⁺ Selectivity in Sodium Ion Channels. Journal of the American Chemical Society, 2010, 132, 2321-2332.	6.6	83
3625	Use of Venom Peptides to Probe Ion Channel Structure and Function. Journal of Biological Chemistry, 2010, 285, 13315-13320.	1.6	144
3626	Molecular Dynamics in Physiological Solutions: Force Fields, Alkali Metal Ions, and Ionic Strength. Journal of Chemical Theory and Computation, 2010, 6, 2167-2175.	2.3	56
3627	Conformational Consequences of Ionization of Lys, Asp, and Clu Buried at Position 66 in Staphylococcal Nuclease. Biochemistry, 2010, 49, 4138-4146.	1.2	49
3628	Controllable Synthetic Molecular Channels: Biomimetic Ammonia Switch. Journal of Physical Chemistry B, 2010, 114, 1174-1179.	1.2	9
3629	Current reversals and synchronization in coupled ratchets. Physical Review E, 2010, 82, 046208.	0.8	27
3630	Proteinâ^'Protein Recognition Control by Modulating Electrostatic Interactions. Journal of Proteome Research, 2010, 9, 3118-3125.	1.8	32
3631	Molecular Mechanism of Flop Selectivity and Subsite Recognition for an AMPA Receptor Allosteric Modulator: Structures of GluA2 and GluA3 in Complexes with PEPA. Biochemistry, 2010, 49, 2843-2850.	1.2	31
3632	A Single Glutamate Residue Controls the Oligomerization, Function, and Stability of the Aquaglyceroporin GlpF. Biochemistry, 2010, 49, 279-286.	1.2	32
3633	Ion Binding to KcsA: Implications in Ion Selectivity and Channel Gating. Biochemistry, 2010, 49, 9480-9487.	1.2	19
3634	Computational Studies on Polarization Effects and Selectivity in K ⁺ Channels. Journal of Chemical Theory and Computation, 2010, 6, 3780-3792.	2.3	26
3635	Cation Selectivity by the CorA Mg ²⁺ Channel Requires a Fully Hydrated Cation. Biochemistry, 2010, 49, 5998-6008.	1.2	19

#	Article	IF	CITATIONS
3636	A Dynamical System for Action Potentials in the Giant Axon of the Squid. Journal of Physical Chemistry C, 2010, 114, 20350-20361.	1.5	2
3637	Approximation of super-ions for single-file diffusion of multiple ions through narrow pores. Physical Review E, 2010, 82, 051103.	0.8	13
3638	Modulation of Buried Ionizable Groups in Proteins with Engineered Surface Charge. Journal of the American Chemical Society, 2010, 132, 1218-1219.	6.6	31
3639	Mechanically, Magnetically, and "Rotationally Aligned―Membrane Proteins in Phospholipid Bilayers Give Equivalent Angular Constraints for NMR Structure Determination. Journal of Physical Chemistry B, 2010, 114, 13995-14003.	1.2	44
3640	Revised electrostatics from invariom refinement of the 18-residue peptaibol antibiotic trichotoxin A50E. CrystEngComm, 2010, 12, 2419.	1.3	12
3641	Energetics of Double-Ion Occupancy in the Gramicidin A Channel. Journal of Physical Chemistry B, 2010, 114, 13881-13888.	1.2	15
3642	Occupancy of Nonannular Lipid Binding Sites on KcsA Greatly Increases the Stability of the Tetrameric Protein. Biochemistry, 2010, 49, 5397-5404.	1.2	30
3643	Biocrystallography: Past, present, future. HFSP Journal, 2010, 4, 109-121.	2.5	17
3644	Biology on the NanoscaleBiology on the nanoscale. , 2010, , 527-614.		0
3645	Structure of the MthK RCK in complex with cadmium. Journal of Structural Biology, 2010, 171, 231-237.	1.3	14
3646	The Electrostatics of VDAC: Implications for Selectivity and Gating. Journal of Molecular Biology, 2010, 396, 580-592.	2.0	81
3647	Functional Transfer of an Essential Aspartate for the Ion-binding Site in the Stator Proteins of the Bacterial Flagellar Motor. Journal of Molecular Biology, 2010, 397, 689-696.	2.0	28
3648			
3040	Conformational Dynamics in the Selectivity Filter of KcsA in Response to Potassium Ion Concentration. Journal of Molecular Biology, 2010, 401, 155-166.	2.0	85
3649	Conformational Dynamics in the Selectivity Filter of KcsA in Response to Potassium Ion Concentration. Journal of Molecular Biology, 2010, 401, 155-166. Ion Selectivity of the KcsA Channel: A Perspective from Multi-Ion Free Energy Landscapes. Journal of Molecular Biology, 2010, 401, 831-842.	2.0 2.0	85 90
	Concentration. Journal of Molecular Biology, 2010, 401, 155-166. Ion Selectivity of the KcsA Channel: A Perspective from Multi-Ion Free Energy Landscapes. Journal of		
3649	Concentration. Journal of Molecular Biology, 2010, 401, 155-166. Ion Selectivity of the KcsA Channel: A Perspective from Multi-Ion Free Energy Landscapes. Journal of Molecular Biology, 2010, 401, 831-842. Probing the Transition State of the Allosteric Pathway of the Shaker Kv Channel Pore by Linear	2.0	90
3649 3650	Concentration. Journal of Molecular Biology, 2010, 401, 155-166. Ion Selectivity of the KcsA Channel: A Perspective from Multi-Ion Free Energy Landscapes. Journal of Molecular Biology, 2010, 401, 831-842. Probing the Transition State of the Allosteric Pathway of the Shaker Kv Channel Pore by Linear Free-Energy Relations. Journal of Molecular Biology, 2010, 403, 167-173. Transporters, channels, or simple diffusion? Dogmas, atypical roles and complexity in transport	2.0 2.0	90

#	Article	IF	CITATIONS
3654	A method for solution NMR structural studies of large integral membrane proteins: Reverse micelle encapsulation. Biochimica Et Biophysica Acta - Biomembranes, 2010, 1798, 150-160.	1.4	27
3655	CLC channels and transporters: Proteins with borderline personalities. Biochimica Et Biophysica Acta - Biomembranes, 2010, 1798, 1457-1464.	1.4	87
3656	Hydration valve controlled non-selective conduction of Na+ and K+ in the NaK channel. Biochimica Et Biophysica Acta - Biomembranes, 2010, 1798, 1474-1479.	1.4	11
3657	Homodimeric intrinsic membrane proteins. Identification and modulation of interactions between mitochondrial transporter (carrier) subunits. Biochemical and Biophysical Research Communications, 2010, 393, 746-750.	1.0	2
3658	A Bivalent Tarantula Toxin Activates the Capsaicin Receptor, TRPV1, by Targeting the Outer Pore Domain. Cell, 2010, 141, 834-845.	13.5	289
3659	Domain Reorientation and Rotation of an Intracellular Assembly Regulate Conduction in Kir Potassium Channels. Cell, 2010, 141, 1018-1029.	13.5	141
3660	Autophagy Shows Its Animal Side. Cell, 2010, 141, 922-924.	13.5	3
3661	A Twist on Potassium Channel Gating. Cell, 2010, 141, 920-922.	13.5	4
3662	A Shaker K+ Channel with a Miniature Engineered Voltage Sensor. Cell, 2010, 142, 580-589.	13.5	44
3663	A new system for heterologous expression of membrane proteins: Rhodospirillum rubrum. Protein Expression and Purification, 2010, 70, 88-94.	0.6	15
3664	Expression and purification of recombinant human inward rectifier K+ (KCNJ) channels in Saccharomyces cerevisiae. Protein Expression and Purification, 2010, 71, 115-121.	0.6	21
3665	Small conductance calcium-activated potassium channels: From structure to function. Progress in Neurobiology, 2010, 91, 242-255.	2.8	79
3666	Ion Channel Voltage Sensors: Structure, Function, and Pathophysiology. Neuron, 2010, 67, 915-928.	3.8	448
3667	The ATP-sensitive K+-channel (KATP) controls early left–right patterning in Xenopus and chick embryos. Developmental Biology, 2010, 346, 39-53.	0.9	49
3668	Biophysical characterization of KCNQ1 P320 mutations linked to long QT syndrome 1. Journal of Molecular and Cellular Cardiology, 2010, 48, 230-237.	0.9	16
3669	The cardiac pacemaker current. Journal of Molecular and Cellular Cardiology, 2010, 48, 55-64.	0.9	133
3670	Molecular determinants of cardiac transient outward potassium current (Ito) expression and regulation. Journal of Molecular and Cellular Cardiology, 2010, 48, 12-25.	0.9	199
3671	Cardiac strong inward rectifier potassium channels. Journal of Molecular and Cellular Cardiology, 2010, 48, 45-54.	0.9	143

#	Article	IF	CITATIONS
3672	Monitoring the effects of strong cosolvent hexafluoroisopropanol in investigation of the tetrameric structure and stability of K+-channel KcsA. Archives of Biochemistry and Biophysics, 2010, 498, 1-6.	1.4	4
3673	Glutamate Receptor Ion Channels: Structure, Regulation, and Function. Pharmacological Reviews, 2010, 62, 405-496.	7.1	2,973
3674	Molecular dynamics simulations of valinomycin interactions with potassium and sodium ions in water solvent. Advances in Bioscience and Biotechnology (Print), 2010, 01, 216-223.	0.3	7
3675	Practical Considerations of Membrane Protein Instability during Purification and Crystallisation. Methods in Molecular Biology, 2010, 601, 187-203.	0.4	100
3676	lon channels as novel therapeutic targets in the treatment of pain. Journal of Pharmacy and Pharmacology, 2010, 62, 1089-1095.	1.2	51
3677	Mechanosensitive Channels in Microbes. Annual Review of Microbiology, 2010, 64, 313-329.	2.9	287
3678	New Insights into the Regulation of Ion Channels by Integrins. International Review of Cell and Molecular Biology, 2010, 279, 135-190.	1.6	38
3679	Introduction to Ion Channels. Advances in Experimental Medicine and Biology, 2010, 674, 9-21.	0.8	21
3680	Calix[n]arenes as Synthetic Membrane Transporters: A Minireview. Analytical Letters, 2010, 43, 1355-1366.	1.0	20
3681	Gated Ion Transport through Dense Carbon Nanotube Membranes. Journal of the American Chemical Society, 2010, 132, 8285-8290.	6.6	40
3682	Membrane Protein Dynamics from Femtoseconds to Seconds. Methods in Molecular Biology, 2010, 654, 423-440.	0.4	10
3683	Importance of oligo-(R)-3-hydroxybutyrates to S. lividans KcsA channel structure and function. Molecular BioSystems, 2010, 6, 2249.	2.9	10
3684	Negative Rejection of NaCl in Ultrafiltration of Aqueous Solution of NaCl and KCl Using Sodalite Octahydrate Zeoliteâ^'Clay Charged Ultrafiltration Membrane. Industrial & Engineering Chemistry Research, 2010, 49, 6539-6546.	1.8	11
3685	Ion Channels and Plant Stress Responses. Signaling and Communication in Plants, 2010, , .	0.5	11
3686	A simple peptidomimetic that self-associates on the solid state to form a nanoporous architecture containing chiral π-channels. CrystEngComm, 2010, 12, 1722.	1.3	15
3687	Heterobimetallic Metal-Complex Assemblies Constructed from the Flexible Arm-Like Ligand 1,1′-Bis[(3-pyridylamino)carbonyl]ferrocene: Structural Versatility in the Solid State. Inorganic Chemistry, 2010, 49, 1834-1848.	1.9	37
3688	Membrane Protein Structure Determination. Methods in Molecular Biology, 2010, , .	0.4	7
3689	Liposomes on a Streptavidin Crystal: A System to Study Membrane Proteins by Cryo-EM. Methods in Enzymology, 2010, 481, 147-164.	0.4	22

#	Article	IF	CITATIONS
3690	Dehydration and ionic conductance quantization in nanopores. Journal of Physics Condensed Matter, 2010, 22, 454126.	0.7	38
3691	Affinity of C ₆₀ Neat Fullerenes with Membrane Proteins: A Computational Study on Potassium Channels. ACS Nano, 2010, 4, 4158-4164.	7.3	63
3692	Relating Binding Affinity to Dynamical Selectivity from Dynamic Monte Carlo Simulations of a Model Calcium Channel. Journal of Physical Chemistry Letters, 2010, 1, 2179-2184.	2.1	21
3693	Heterologous Expression of Membrane Proteins. Methods in Molecular Biology, 2010, , .	0.4	2
3695	Studying the stoichiometries of membrane proteins by mass spectrometry: microbial rhodopsins and a potassium ion channel. Physical Chemistry Chemical Physics, 2010, 12, 3480.	1.3	58
3696	Inwardly Rectifying Potassium Channels: Their Structure, Function, and Physiological Roles. Physiological Reviews, 2010, 90, 291-366.	13.1	1,272
3697	Ion-imprinted polymers supported by SiO <inf>2</inf> with a chitosan incorporated sol-gel process for selective separation of Pb(II) and Cu(II) system. , 2011, , .		0
3698	Charybdotoxin Unbinding from the <i>m</i> Kv1.3 Potassium Channel: A Combined Computational and Experimental Study. Journal of Physical Chemistry B, 2011, 115, 11490-11500.	1.2	28
3699	Insights on the permeability of wide protein channels: measurement and interpretation of ion selectivity. Integrative Biology (United Kingdom), 2011, 3, 159-172.	0.6	49
3700	Voltage-Gated Ion Channels: The Machines Responsible for the Nerve Impulse. , 2011, , 231-248.		1
3701	Mimicking multipass transmembrane proteins: synthesis, assembly and folding of alternating amphiphilic multiblock molecules in liposomal membranes. Chemical Communications, 2011, 47, 194-196.	2.2	34
3702	Extracelluar potassium ions play important roles in the selectivity of mutant KcsA channel. , 2011, , .		0
3703	Ultra-rapid delayed rectifier channels: molecular basis and therapeutic implications. Cardiovascular Research, 2011, 89, 776-785.	1.8	112
3704	Computer Simulations of Structure–Activity Relationships for hERG Channel Blockers. Biochemistry, 2011, 50, 6146-6156.	1.2	38
3705	A Specific Two-pore Domain Potassium Channel Blocker Defines the Structure of the TASK-1 Open Pore. Journal of Biological Chemistry, 2011, 286, 13977-13984.	1.6	69
3706	Selective Inhibition of the K _{ir} 2 Family of Inward Rectifier Potassium Channels by a Small Molecule Probe: The Discovery, SAR, and Pharmacological Characterization of ML133. ACS Chemical Biology, 2011, 6, 845-856.	1.6	80
3707	Oligomeric State of the Oxalate Transporter, OxlT. Biochemistry, 2011, 50, 8445-8453.	1.2	7
3708	Sodium Ion Binding Sites and Hydration in the Lumen of a Bacterial Ion Channel from Molecular Dynamics Simulations. Journal of Physical Chemistry Letters, 2011, 2, 2504-2508.	2.1	59

		CITATION RE	PORT	
#	Article		IF	CITATIONS
3709	NaChBac: The Long Lost Sodium Channel Ancestor. Biochemistry, 2011, 50, 6742-675	52.	1.2	60
3710	Oriented Reconstitution of a Membrane Protein in a Giant Unilamellar Vesicle: Experim Verification with the Potassium Channel KcsA. Journal of the American Chemical Socie 11774-11779.	iental ty, 2011, 133,	6.6	104
3712	Transmembrane Extension and Oligomerization of the CLIC1 Chloride Intracellular Chaupon Membrane Interaction. Biochemistry, 2011, 50, 10887-10897.	annel Protein	1.2	43
3713	The Role of Bulk Protein in Local Models of Ion-Binding to Proteins: Comparative Study Semisynthetic Analog with a Locked-in Binding Site, and Valinomycin. Biophysical Jour 1542-1549.		0.2	11
3714	History of Basic Science in Cardiac Electrophysiology. Cardiac Electrophysiology Clinic	s, 2011, 3, 1-10.	0.7	0
3715	Mapping the Importance of Four Factors in Creating Monovalent Ion Selectivity in Biol Molecules. Biophysical Journal, 2011, 100, 60-69.	ogical	0.2	19
3717	Comparative Study of the Energetics of Ion Permeation in Kv1.2 and KcsA Potassium C Biophysical Journal, 2011, 100, 629-636.	Channels.	0.2	24
3719	A Multipoint Hydrogen-Bond Network Underlying KcsA C-Type Inactivation. Biophysica 100, 2387-2393.	l Journal, 2011,	0.2	92
3720	Molecular Dynamics Simulation of the Antiamoebin Ion Channel: Linking Structure and Biophysical Journal, 2011, 100, 2394-2402.	l Conductance.	0.2	39
3721	Blockade of Permeation by Potassium but Normal Gating of the G628S Nonconductin Mutant. Biophysical Journal, 2011, 101, 662-670.	g hERG Channel	0.2	8
3722	Gating at the Selectivity Filter of Ion Channels that Conduct Na+ and K+ Ions. Biophys 2011, 101, 1623-1631.	ical Journal,	0.2	19
3723	Role of the KcsA Channel Cytoplasmic Domain in pH-Dependent Gating. Biophysical Jo 2157-2162.	urnal, 2011, 101,	0.2	28
3724	Permeation and Block of the Kv1.2 Channel Examined Using Brownian and Molecular I Biophysical Journal, 2011, 101, 2671-2678.	Jynamics.	0.2	14
3725	Thermo-TRP Channels: Biophysics of Polymodal Receptors. Advances in Experimental N Biology, 2011, 704, 469-490.	Nedicine and	0.8	31
3726	Ion Channels, Nanotubes in Living Cells. , 2011, , 1-9.			0
3727	Non-equilibrium statistical mechanics: from a paradigmatic model to biological transpo Progress in Physics, 2011, 74, 116601.	ort. Reports on	8.1	398
3728	Modular design for the controlled production of polymeric nanotubes from polymer/po conjugates. Polymer Chemistry, 2011, 2, 1956.	2ptide	1.9	81
3729	Functional Classification of Plant Plasma Membrane Transporters. Plant Cell Monograp 131-176.	bhs, 2011, ,	0.4	9

		CITATION RE	PORT	
#	Article		IF	CITATIONS
3730	Transient Receptor Potential Channels. Advances in Experimental Medicine and Biology, 20)11,,.	0.8	35
3731	Designing Drugs to Avoid Toxicity. Progress in Medicinal Chemistry, 2011, 50, 1-47.		4.1	93
3734	Hydrophobic pulses predict transmembrane helix irregularities and channel transmembran BMC Bioinformatics, 2011, 12, 135.	e units.	1.2	4
3735	Permanent Electric Dipole Moments of Carboxyamides in Condensed Media: What Are the of Theory and Experiment?. Journal of Physical Chemistry B, 2011, 115, 9473-9490.	Limitations	1.2	39
3736	What's in a Drop? Correlating Observations and Outcomes to Guide Macromolecular (Experiments. Crystal Growth and Design, 2011, 11, 651-663.	Crystallization	1.4	52
3737	Dielectric metamaterial particles with enhanced efficiency of mechanical/electrical energy transformation. Journal of Materials Chemistry, 2011, 21, 394-399.		6.7	8
3738	Site-Directed Spin Labeling of Membrane Proteins. Topics in Current Chemistry, 2011, 321	, 121-157.	4.0	59
3739	Tuning the ion selectivity of tetrameric cation channels by changing the number of ion bin Proceedings of the National Academy of Sciences of the United States of America, 2011, 1	ding sites. 08, 598-602.	3.3	105
3740	Heart Rate and Rhythm. , 2011, , .			8
3741	Argiotoxin in the Closed AMPA Receptor Channel: Experimental and Modeling Study. Bioch 2011, 50, 8213-8220.	iemistry,	1.2	16
3742	Ion Channels and Their Inhibitors. , 2011, , .			3
3743	Key Factors for Successful Generation of Protein–Fragment Structures. Methods in Enzy 493, 61-89.	mology, 2011,	0.4	16
3744	Helical Water Chain Mediated Proton Conductivity in Homochiral Metal–Organic Frame Unprecedented Zeolitic <i>unh</i> -Topology. Journal of the American Chemical Society, 20 17950-17958.		6.6	354
3745	Inverse problems in ion channel modelling. Inverse Problems, 2011, 27, 083001.		1.0	27
3746	A leaf cell consists of several metabolic compartments. , 2011, , 1-42.			2
3747	The potassium channel KcsA: A model protein in studying membrane protein oligomerizati stability of oligomeric assembly?. Archives of Biochemistry and Biophysics, 2011, 510, 1-10	on and).	1.4	26
3748	Crystal Structure of the Mammalian GIRK2 K+ Channel and Gating Regulation by G Protein Sodium. Cell, 2011, 147, 199-208.	s, PIP2, and	13.5	422
3749	Minimal art: Or why small viral K+ channels are good tools for understanding basic structu function relations. Biochimica Et Biophysica Acta - Biomembranes, 2011, 1808, 580-588.	re and	1.4	35

ARTICLE IF CITATIONS Viral channel forming proteins — Modeling the target. Biochimica Et Biophysica Acta - Biomembranes, 3750 31 1.4 2011, 1808, 561-571. Diverse gating in K+ channels: Differential role of the pore-helix glutamate in stabilizing the channel 3751 1.0 pore. Biochemical and Biophysical Research Communications, 2011, 413, 1-4. 3752 hERG1 Channel Blockers and Cardiac Arrhythmia., 2011, , 611-625. 0 1,4-Dihydropyridine Scaffold in Medicinal Chemistry, The Story so Far And Perspectives (Part 1): Action 1.2 in Ion Channels and GPCRs. Current Medicinal Chemistry, 2011, 18, 4901-4922. Stability of gp41 hairpin and helix bundle assembly probed by combined stacking and circular dichroic 3754 1.31 approaches. Journal of Structural Biology, 2011, 175, 406-414. Selectivity and Permeation of Alkali Metal Ions in K+-channels. Journal of Molecular Biology, 2011, 409, 867-878. Crucial Points within the Pore as Determinants of K+ Channel Conductance and Gating. Journal of 3756 2.0 18 Molecular Biology, 2011, 411, 27-35. Dynamics May Significantly Influence the Estimation of Interatomic Distances in Biomolecular X-ray 2.0 Structures. Journal of Molecular Biology, 2011, 411, 286-297. 3758 Simple screening method for improving membrane protein thermostability. Methods, 2011, 55, 324-329. 1.9 42 3759 Crystallization chaperone strategies for membrane proteins. Methods, 2011, 55, 293-302. 1.9 Sodium Leak Channels in Neuronal Excitability and Rhythmic Behaviors. Neuron, 2011, 72, 899-911. 3760 3.8 128 Estudio genético en el sÃndrome de QT largo en nuestro medio. Revista Espanola De Cardiologia, 2011, 0.6 64, 71-74. High-Resolution ³⁹K NMR Spectroscopy of Bio-organic Solids. Journal of the American 3762 6.6 20 Chemical Society, 2011, 133, 19570-19573. Electrostatic interactions in biological DNA-related systems. Physical Chemistry Chemical Physics, 3763 1.3 141 2011, 13, 9942. 3764 Prediction of hERG Channel Inhibition Using In Silico Techniques., 2011, , 191-239. 1 Biopolymers in nanopores: challenges and opportunities. Soft Matter, 2011, 7, 5898. 3765 1.2 39 Thermodynamic coupling between activation and inactivation gating in potassium channels revealed 3766 0.9 49 by free energy molecular dynamics simulations. Journal of General Physiology, 2011, 138, 571-580. Viewing Angle Classification of Cryo-Electron Microscopy Images Using Eigenvectors. SIAM Journal on 3767 1.3 Imaging Sciences, 2011, 4, 723-759.

#	Article	IF	CITATIONS
3768	The influence of potassium cation on a strong OHO hydrogen bond. Organic and Biomolecular Chemistry, 2011, 9, 1466.	1.5	6
3770	Stability of the gramicidin-A channel structure in view of nanofiltration: a computational and experimental study. Soft Matter, 2011, 7, 10651.	1.2	6
3771	Genetic Testing of Patients With Long QT Syndrome. Revista Espanola De Cardiologia (English Ed), 2011, 64, 71-74.	0.4	0
3772	Richard Darwin Keynes CBE. 14 August 1919 — 12 June 2010. Biographical Memoirs of Fellows of the Royal Society, 2011, 57, 205-227.	0.1	0
3773	Thermodynamics of Protein Structure Formation and Function. , 0, , .		0
3774	Review on Regulation of Inwardly Rectifying Potassium Channels. Critical Reviews in Eukaryotic Gene Expression, 2011, 21, 303-311.	0.4	14
3775	Kinetic model based on molecular mechanism for action potential. Nature Precedings, 2011, , .	0.1	0
3779	Cyclic Nucleotides and Nucleotide Cyclases in Plant Stress Responses. , 2011, , .		6
3780	Dissipative Effect and Tunneling Time. Advances in Mathematical Physics, 2011, 2011, 1-13.	0.4	3
3781	The Voltage-Sensing Domain of Kv7.2 Channels as a Molecular Target for Epilepsy-Causing Mutations and Anticonvulsants. Frontiers in Pharmacology, 2011, 2, 2.	1.6	24
3782	The Sodium Channel as a Target for Local Anesthetic Drugs. Frontiers in Pharmacology, 2011, 2, 68.	1.6	87
3783	Cycle Flux Algebra for Ion and Water Flux through the KcsA Channel Single-File Pore Links Microscopic Trajectories and Macroscopic Observables. PLoS ONE, 2011, 6, e16578.	1.1	17
3784	Cardiac rhythm. , 0, , 293-315.		0
3786	In Silico Predictions of hERG Channel Blockers in Drug Discovery: From Ligand-Based and Target-Based Approaches to Systems Chemical Biology. Combinatorial Chemistry and High Throughput Screening, 2011, 14, 375-387.	0.6	44
3787	The Design and Application of Target-Focused Compound Libraries. Combinatorial Chemistry and High Throughput Screening, 2011, 14, 521-531.	0.6	98
3789	Extracellular pH in Restricted Domains as a Gating Signal for Ion Channels Involved in Transepithelial Transport. Biological and Pharmaceutical Bulletin, 2011, 34, 803-809.	0.6	12
3792	Representation theoretic patterns in three dimensional Cryo-Electron Microscopy I: The intrinsic reconstitution algorithm. Annals of Mathematics, 2011, 174, 1219-1241.	2.1	26
3793	lonic Channels as Targets for Drug Design: A Review on Computational Methods. Pharmaceutics, 2011, 3, 932-953.	2.0	23

#	Article		IF	CITATIONS
3796	Kinetic modeling of Nav1.7 provides insight into erythromelalgia-associated F1449V m of Neurophysiology, 2011, 105, 1546-1557.	nutation. Journal	0.9	16
3797	Effect of verapamil on the action of methanethiosulfonate reagents on human voltage K _v 1.3 channels: implications for the Câ€type inactivated state. British Jou Pharmacology, 2011, 163, 662-674.	2â€gated urnal of	2.7	3
3798	Naringin directly activates inwardly rectifying potassium channels at an overlapping bi tertiapinâ€Q. British Journal of Pharmacology, 2011, 163, 1017-1033.	nding site to	2.7	49
3799	Guide to Receptors and Channels (GRAC), 5th edition. British Journal of Pharmacology	, 2011, 164, S1-324.	2.7	827
3800	Consultants. British Journal of Pharmacology, 2011, 164, S3-S3.		2.7	10
3801	G PROTEIN OUPLED RECEPTORS. British Journal of Pharmacology, 2011, 164, S5.		2.7	16
3802	LIGANDâ€GATED ION CHANNELS. British Journal of Pharmacology, 2011, 164, S115.		2.7	13
3803	ION CHANNELS. British Journal of Pharmacology, 2011, 164, S137.		2.7	22
3804	NUCLEAR RECEPTORS. British Journal of Pharmacology, 2011, 164, S175-S188.		2.7	0
3805	CATALYTIC RECEPTORS. British Journal of Pharmacology, 2011, 164, S189-S212.		2.7	1
3806	TRANSPORTERS. British Journal of Pharmacology, 2011, 164, S213.		2.7	2
3808	A K ⁺ channel from saltâ€ŧolerant melon inhibited by Na ⁺ . Ne 189, 856-868.	ew Phytologist, 2011,	3.5	25
3809	Potassium channels in plant cells. FEBS Journal, 2011, 278, 4293-4303.		2.2	232
3810	A porous maze. Nature Chemistry, 2011, 3, 429-430.		6.6	39
3811	Architecture of receptor-operated ion channels of biological membranes. Biophysics (F	Russian) Tj ETQq0 0 0 rgBT	/Overlock	10 Tf 50 182
3812	Role of image force in the water pore of a K+ channel in channel permeability: Nonloca effects. Biophysics (Russian Federation), 2011, 56, 117-118.	al electrostatic	0.2	0
3813	Mapping the sequence of conformational changes underlying selectivity filter gating in potassium channel. Nature Structural and Molecular Biology, 2011, 18, 35-41.	n the Kv11.1	3.6	49

3814	On the structural basis of modal gating behavior in K+ channels. Nature Structural and Molecular Biology, 2011, 18, 67-74.	3.6	71
	Siciogy, 2011, 10, 07 7 1.		

# 3815	ARTICLE Crystal structure of a potassium ion transporter, TrkH. Nature, 2011, 471, 336-340.	IF 13.7	CITATIONS
3816	Flexible Architecture of IP3R1 by Cryo-EM. Structure, 2011, 19, 1192-1199.	1.6	80
3817	Symmetry-Restrained Flexible Fitting for Symmetric EM Maps. Structure, 2011, 19, 1211-1218.	1.6	66
3818	Mechanosensitive Channels: What Can They Do and How Do They Do It?. Structure, 2011, 19, 1356-1369.	1.6	303
3819	Toward the Fourth Dimension of Membrane Protein Structure: Insight into Dynamics from Spin-Labeling EPR Spectroscopy. Structure, 2011, 19, 1549-1561.	1.6	215
3820	Cardiac cell modelling: Observations from the heart of the cardiac physiome project. Progress in Biophysics and Molecular Biology, 2011, 104, 2-21.	1.4	139
3821	Fungicidal efficiency of electrolyzed oxidizing water on Candida albicans and its biochemical mechanism. Journal of Bioscience and Bioengineering, 2011, 112, 86-91.	1.1	28
3822	KtrB, a member of the superfamily of K+ transporters. European Journal of Cell Biology, 2011, 90, 696-704.	1.6	19
3823	The KdpFABC complex from Escherichia coli: A chimeric K+ transporter merging ion pumps with ion channels. European Journal of Cell Biology, 2011, 90, 705-710.	1.6	26
3824	Ion channels in key marine invertebrates; their diversity and potential for applications in biotechnology. Biotechnology Advances, 2011, 29, 457-467.	6.0	5
3825	Extraction of cellulose-synthesizing activity of Gluconacetobacter xylinus by alkylmaltoside. Carbohydrate Research, 2011, 346, 2760-2768.	1.1	14
3826	Chemical Synthesis of Integral Membrane Proteins: Methods and Applications. Israel Journal of Chemistry, 2011, 51, 940-952.	1.0	19
3827	Clusters of Proteins in Biomembranes: Insights into the Roles of Interaction Potential Shapes and of Protein Diversity. Journal of Physical Chemistry B, 2011, 115, 7190-7199.	1.2	33
3828	Pore formation in phospholipid bilayers by amphiphilic cavitands. Organic and Biomolecular Chemistry, 2011, 9, 4498.	1.5	24
3829	The Evolution of Protein Kinase Inhibitors from Antagonists to Agonists of Cellular Signaling. Annual Review of Biochemistry, 2011, 80, 769-795.	5.0	316
3830	A Critical Assessment of Combined Ligand- and Structure-Based Approaches to hERG Channel Blocker Modeling. Journal of Chemical Information and Modeling, 2011, 51, 2948-2960.	2.5	60
3831	How Far Can a Sodium Ion Travel within a Lipid Bilayer?. Journal of the American Chemical Society, 2011, 133, 6481-6483.	6.6	79
3832	KCNQ1 Channels Voltage Dependence through a Voltage-dependent Binding of the S4-S5 Linker to the Pore Domain. Journal of Biological Chemistry, 2011, 286, 707-716.	1.6	49

#	Article	IF	Citations
3833	Allosteric Features of KCNQ1 Gating Revealed by Alanine Scanning Mutagenesis. Biophysical Journal, 2011, 100, 885-894.	0.2	36
3834	Update 1 of: Computational Modeling Approaches to Structure–Function Analysis of G Protein-Coupled Receptors. Chemical Reviews, 2011, 111, PR438-PR535.	23.0	71
3835	The crystal structure of a voltage-gated sodium channel. Nature, 2011, 475, 353-358.	13.7	1,278
3836	Assembly of Bacterial Inner Membrane Proteins. Annual Review of Biochemistry, 2011, 80, 161-187.	5.0	141
3837	The Explanatory Force of Dynamical and Mathematical Models in Neuroscience: A Mechanistic Perspective. Philosophy of Science, 2011, 78, 601-627.	0.5	221
3838	Puerarin: a novel antagonist to inward rectifier potassium channel (I K1). Molecular and Cellular Biochemistry, 2011, 352, 117-123.	1.4	34
3839	Explanation and description in computational neuroscience. SynthÃ^se, 2011, 183, 339-373.	0.6	135
3840	Solvation free energies of glutamate and its metal complexes: A computer simulation study. Journal of Molecular Modeling, 2011, 17, 889-898.	0.8	4
3841	Disinfection effect and its mechanism of electrolyzed oxidizing water on spores of Bacillus subtilis var. niger. Food Science and Biotechnology, 2011, 20, 889.	1.2	28
3842	Representation Theoretic Patterns in Three-Dimensional Cryo-Electron Microscopy Il—The Class Averaging Problem. Foundations of Computational Mathematics, 2011, 11, 589-616.	1.5	19
3843	K+ Channels of Squid Giant Axons Open by an Osmotic Stress in Hypertonic Solutions Containing Nonelectrolytes. Journal of Membrane Biology, 2011, 242, 119-135.	1.0	8
3844	Selectivity sequences in a model calcium channel: role of electrostatic field strength. European Biophysics Journal, 2011, 40, 775-782.	1.2	26
3845	Functional interactions between residues in the S1, S4, and S5 domains of Kv2.1. European Biophysics Journal, 2011, 40, 783-793.	1.2	15
3846	Long ranged interactions in computer simulations and for quasi-2D systems. Physics Reports, 2011, 500, 43-116.	10.3	53
3847	The Jackprot Simulation Couples Mutation Rate with Natural Selection to Illustrate How Protein Evolution Is Not Random. Evolution: Education and Outreach, 2011, 4, 502-514.	0.3	3
3848	Activator-induced dynamic disorder and molecular memory in human two-pore domain hTREK1 K+ channel. Journal of Chemical Biology, 2011, 4, 69-84.	2.2	5
3849	The structural biology of ryanodine receptors. Science China Life Sciences, 2011, 54, 712-724.	2.3	39
3850	Aquaporin Membrane Channels: Biophysics, Classification, Functions, and Possible Biotechnological	1.4	30

#	Article	IF	CITATIONS
3851	Depletion of the heaviest stable N isotope is associated with NH4+/NH3 toxicity in NH4+-fed plants. BMC Plant Biology, 2011, 11, 83.	1.6	41
3852	Topological characterisation and identification of critical domains within glucosyltransferase IV (GtrIV) of Shigella flexneri. BMC Biochemistry, 2011, 12, 67.	4.4	11
3853	The αâ€sheet: A missingâ€inâ€action secondary structure?. Proteins: Structure, Function and Bioinformatics, 2011, 79, 937-946.	1.5	19
3854	Structural physiology based on electron crystallography. Protein Science, 2011, 20, 806-817.	3.1	11
3855	Direct Manipulation of a Single Potassium Channel Gate with an Atomic Force Microscope Probe. Small, 2011, 7, 2379-2383.	5.2	7
3856	Unraveling lipid/protein interaction in model lipid bilayers by Atomic Force Microscopy. Journal of Molecular Recognition, 2011, 24, 387-396.	1.1	37
3860	Solid‣tate Ion Channels for Potentiometric Sensing. Angewandte Chemie - International Edition, 2011, 50, 1656-1659.	7.2	72
3861	Putting Anion–π Interactions Into Perspective. Angewandte Chemie - International Edition, 2011, 50, 9564-9583.	7.2	591
3862	Optochemical Genetics. Angewandte Chemie - International Edition, 2011, 50, 12156-12182.	7.2	341
3863	Small angle Xâ€ray scattering as a complementary tool for highâ€throughput structural studies. Biopolymers, 2011, 95, 517-530.	1.2	69
3864	Beyond the crystallization paradigm: Structure determination from diffraction patterns from ensembles of randomly oriented particles. Ultramicroscopy, 2011, 111, 798-806.	0.8	9
3865	Molecular Dynamics Approach of Ion Channeling through Peptide Nanotubes. Japanese Journal of Applied Physics, 2011, 50, 037002.	0.8	2
3866	Inferring Structures of Kinetic Intermediates in Ca2+-Triggered Exocytosis. Current Topics in Membranes, 2011, 68, 185-208.	0.5	6
3867	A molecular model of the inner pore of the Ca channel in its open state. Channels, 2011, 5, 482-488.	1.5	4
3868	TRP Channel Gating Physiology. Current Topics in Medicinal Chemistry, 2011, 11, 2131-2150.	1.0	41
3869	Editing of Neurotransmitter Receptor and Ion Channel RNAs in the Nervous System. Current Topics in Microbiology and Immunology, 2011, 353, 61-90.	0.7	59
3870	Vibrational excitons in ionophores: experimental probes for quantum coherence-assisted ion transport and selectivity in ion channels. New Journal of Physics, 2011, 13, 113030.	1.2	32
3872	Why Does the Inner-Helix Mutation A413C Double the Stoichiometry of Kv1.3 Channel Block by Emopamil but Not by Verapamil?. Molecular Pharmacology, 2011, 79, 681-691.	1.0	14

#	Article	IF	CITATIONS
3873	Biogenesis of the pore architecture of a voltage-gated potassium channel. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 3240-3245.	3.3	27
3874	Low resistance, large dimension entrance to the inner cavity of BK channels determined by changing side-chain volume. Journal of General Physiology, 2011, 137, 533-548.	0.9	27
3875	Where's the gate? Gating in the deep pore of the BKCa channel. Journal of General Physiology, 2011, 138, 133-136.	0.9	8
3876	Activity-dependent targeting of TRPV1 with a pore-permeating capsaicin analog. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 8497-8502.	3.3	30
3877	Counting Ion and Water Molecules in a Streaming File through the Open-Filter Structure of the K Channel. Journal of Neuroscience, 2011, 31, 12180-12188.	1.7	52
3878	Origins of ion selectivity in potassium channels from the perspective of channel block. Journal of General Physiology, 2011, 137, 405-413.	0.9	66
3879	Redesigning allosteric activation in an enzyme. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 5221-5225.	3.3	25
3880	Primary Hyperparathyroidism With Concurrent Primary Aldosteronism. Hypertension, 2011, 58, 341-346.	1.3	79
3881	Structural studies of ion selectivity in tetrameric cation channels. Journal of General Physiology, 2011, 137, 397-403.	0.9	38
3882	Forced Gating Motions by a Substituted Titratable Side Chain at the Bundle Crossing of a Potassium Channel. Journal of Biological Chemistry, 2011, 286, 36686-36693.	1.6	7
3883	Simplified Bacterial "Pore―Channel Provides Insight into the Assembly, Stability, and Structure of Sodium Channels. Journal of Biological Chemistry, 2011, 286, 16386-16391.	1.6	31
3884	Charge substitution for a deep-pore residue reveals structural dynamics during BK channel gating. Journal of General Physiology, 2011, 138, 137-154.	0.9	37
3885	An alternative to the RNA World Hypothesis. Trends in Evolutionary Biology, 2011, 3, 2.	0.4	16
3886	K+ Transport by the OsHKT2;4 Transporter from Rice with Atypical Na+ Transport Properties and Competition in Permeation of K+ over Mg2+ and Ca2+ Ions Á Â Â. Plant Physiology, 2011, 156, 1493-1507.	2.3	138
3887	Mechanism for selectivity-inactivation coupling in KcsA potassium channels. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 5272-5277.	3.3	80
3888	Protein interactions central to stabilizing the K ⁺ channel selectivity filter in a four-sited configuration for selective K ⁺ permeation. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 16634-16639.	3.3	41
3889	Distal End of Carboxyl Terminus Is Not Essential for the Assembly of Rat Eag1 Potassium Channels. Journal of Biological Chemistry, 2011, 286, 27183-27196.	1.6	10
3890	Interactions of Cations with the Cytoplasmic Pores of Inward Rectifier K+ Channels in the Closed State. Journal of Biological Chemistry, 2011, 286, 41801-41811.	1.6	10

#	Article	IF	Citations
3891	Thermodynamics of ion selectivity in the KcsA K+ channel. Journal of General Physiology, 2011, 137, 427-433.	0.9	20
3892	Understanding the yeast host cell response to recombinant membrane protein production. Biochemical Society Transactions, 2011, 39, 719-723.	1.6	13
3893	Kir4.1 K ⁺ channels are regulated by external cations. Channels, 2011, 5, 269-279.	1.5	16
3894	Prediction of GPCRs with Pseudo Amino Acid Composition: Employing Composite Features and Grey Incidence Degree Based Classification. Protein and Peptide Letters, 2011, 18, 872-878.	0.4	13
3895	Identification of New Batrachotoxin-sensing Residues in Segment IIIS6 of the Sodium Channel. Journal of Biological Chemistry, 2011, 286, 13151-13160.	1.6	57
3896	Double Mutant Cycle Analysis Identified a Critical Leucine Residue in the IIS4S5 Linker for the Activation of the CaV2.3 Calcium Channel. Journal of Biological Chemistry, 2011, 286, 27197-27205.	1.6	31
3897	Structural studies of ion permeation and Ca ²⁺ blockage of a bacterial channel mimicking the cyclic nucleotide-gated channel pore. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 592-597.	3.3	37
3898	A Synthetic S6 Segment Derived from KvAP Channel Self-assembles, Permeabilizes Lipid Vesicles, and Exhibits Ion Channel Activity in Bilayer Lipid Membrane. Journal of Biological Chemistry, 2011, 286, 24828-24841.	1.6	11
3899	Plasma Membrane Aquaporin AqpZ Protein Is Essential for Glucose Metabolism during Photomixotrophic Growth of Synechocystis sp. PCC 6803. Journal of Biological Chemistry, 2011, 286, 25224-25235.	1.6	23
3900	Membrane Anchoring and Interaction between Transmembrane Domains are Crucial for K+ Channel Function. Journal of Biological Chemistry, 2011, 286, 11299-11306.	1.6	19
3901	Molecular Coupling in the Human ether-a-go-go-related gene-1 (hERG1) K+ Channel Inactivation Pathway. Journal of Biological Chemistry, 2011, 286, 39091-39099.	1.6	14
3902	Mechanism of Accelerated Current Decay Caused by an Episodic Ataxia Type-1-Associated Mutant in a Potassium Channel Pore. Journal of Neuroscience, 2011, 31, 17449-17459.	1.7	13
3903	Structural basis for the channel function of a degraded ABC transporter, CFTR (ABCC7). Journal of General Physiology, 2011, 138, 495-507.	0.9	63
3904	Ion selectivity in channels and transporters. Journal of General Physiology, 2011, 137, 415-426.	0.9	142
3905	On the selective ion binding hypothesis for potassium channels. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 17963-17968.	3.3	80
3906	K ⁺ Channel Mutations in Adrenal Aldosterone-Producing Adenomas and Hereditary Hypertension. Science, 2011, 331, 768-772.	6.0	866
3907	Voltage-gated sodium channel (Na _V) protein dissection creates a set of functional pore-only proteins. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 12313-12318.	3.3	83
3908	Theory and simulations of water flow through carbon nanotubes: prospects and pitfalls. Journal of Physics Condensed Matter, 2011, 23, 184110.	0.7	32

# 3909	ARTICLE Perspectives on: Ion selectivity. Journal of General Physiology, 2011, 137, 393-395.	IF 0.9	CITATIONS
3910	TWIK-1 Two-Pore Domain Potassium Channels Change Ion Selectivity and Conduct Inward Leak Sodium Currents in Hypokalemia. Science Signaling, 2011, 4, ra37.	1.6	63
3911	The Nanopore Inner Sphere Enhancement Effect on Cation Adsorption: Sodium and Nickel. Soil Science Society of America Journal, 2011, 75, 378-388.	1.2	24
3912	Design principles for K+ selectivity in membrane transport. Journal of General Physiology, 2011, 137, 479-488.	0.9	74
3913	ENaC structure and function in the wake of a resolved structure of a family member. American Journal of Physiology - Renal Physiology, 2011, 301, F684-F696.	1.3	121
3914	Potassium-selective block of barium permeation through single KcsA channels. Journal of General Physiology, 2011, 138, 421-436.	0.9	51
3915	NMR structures of polytopic integral membrane proteins. Molecular Membrane Biology, 2011, 28, 370-397.	2.0	18
3916	Selectivity filter gating in large-conductance Ca2+-activated K+ channels. Journal of General Physiology, 2012, 139, 235-244.	0.9	38
3917	On Conduction in a Bacterial Sodium Channel. PLoS Computational Biology, 2012, 8, e1002476.	1.5	79
3918	Challenges in the Development of Functional Assays of Membrane Proteins. Materials, 2012, 5, 2205-2242.	1.3	40
3919	The Rice Monovalent Cation Transporter OsHKT2;4: Revisited Ionic Selectivity Â. Plant Physiology, 2012, 160, 498-510.	2.3	80
3920	Structure determination through correlated fluctuations in x-ray scattering. Journal of Physics B: Atomic, Molecular and Optical Physics, 2012, 45, 223001.	0.6	40
3921	CAVER 3.0: A Tool for the Analysis of Transport Pathways in Dynamic Protein Structures. PLoS Computational Biology, 2012, 8, e1002708.	1.5	991
3922	Molecular and Electrophysiological Characterization of a Novel Cation Channel of Trypanosoma cruzi. PLoS Pathogens, 2012, 8, e1002750.	2.1	33
3923	Molecular assembly and dynamics of fluorescent protein-tagged single K _{Ca} 1.1 channel in expression system and vascular smooth muscle cells. American Journal of Physiology - Cell Physiology, 2012, 302, C1257-C1268.	2.1	37
3924	Glutamate Receptor Homologs in Plants: Functions and Evolutionary Origins. Frontiers in Plant Science, 2012, 3, 235.	1.7	99
3925	Sodium and Potassium – Channels and Pumps. , 2012, , 177-195.		0
3926	Evolutionary and Structural Perspectives of Plant Cyclic Nucleotide-Gated Cation Channels. Frontiers in Plant Science, 2012, 3, 95.	1.7	126

#	Article	IF	CITATIONS
3927	The contribution of hydrophobic residues in the pore-forming region of the ryanodine receptor channel to block by large tetraalkylammonium cations and Shaker B inactivation peptides. Journal of General Physiology, 2012, 140, 325-339.	0.9	7
3928	Role of hydrophobic and ionic forces in the movement of S4 of the Shaker potassium channel. Molecular Membrane Biology, 2012, 29, 321-332.	2.0	2
3929	Unlocking the mechanisms of HCN channel gating with locked-open and locked-closed channels. Journal of General Physiology, 2012, 140, 457-461.	0.9	3
3930	NONEQUILIBRIUM RATE THEORY FOR CONDUCTION IN OPEN ION CHANNELS. Fluctuation and Noise Letters, 2012, 11, 1240016.	1.0	7
3931	Targeting Ion Channels in Leukemias: A New Challenge for Treatment. Current Medicinal Chemistry, 2012, 19, 683-696.	1.2	54
3932	Electrically Silent Kv Subunits: Their Molecular and Functional Characteristics. Physiology, 2012, 27, 73-84.	1.6	73
3933	Electrical Excitability and Ion Channels. , 2012, , 63-80.		8
3934	MOLEonline 2.0: interactive web-based analysis of biomacromolecular channels. Nucleic Acids Research, 2012, 40, W222-W227.	6.5	123
3935	The cytoplasmic coiled-coil mediates cooperative gating temperature sensitivity in the voltage-gated H+ channel Hv1. Nature Communications, 2012, 3, 816.	5.8	90
3936	Molecular and functional determinants of local anesthetic inhibition of NaChBac. Channels, 2012, 6, 403-406.	1.5	17
3937	Potassium channels in articular chondrocytes. Channels, 2012, 6, 416-425.	1.5	47
3938	Architecture and Pore Block of Eukaryotic Voltage-Gated Sodium Channels in View of NavAb Bacterial Sodium Channel Structure. Molecular Pharmacology, 2012, 82, 97-104.	1.0	94
3939	Assessing toxicity of polyamidoamine dendrimers by neuronal signaling functions. Nanotoxicology, 2012, 6, 576-586.	1.6	14
3940	Diffusion in a quasi-one-dimensional system on a periodic substrate. Physical Review E, 2012, 85, 021136.	0.8	11
3941	Initial steps in the opening of a Shaker potassium channel. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 12800-12804.	3.3	12
3942	Ion transport through a graphene nanopore. Nanotechnology, 2012, 23, 395501.	1.3	53
3943	Automating Single Subunit Counting of Membrane Proteins in Mammalian Cells. Journal of Biological Chemistry, 2012, 287, 35912-35921.	1.6	85
3944	Pore collapse underlies irreversible inactivation of TRPM2 cation channel currents. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 13440-13445.	3.3	60

#	Article	IF	CITATIONS
3945	Probing the activation sequence of NMDA receptors with lurcher mutations. Journal of General Physiology, 2012, 140, 267-277.	0.9	32
3946	Structure of a bacterial voltage-gated sodium channel pore reveals mechanisms of opening and closing. Nature Communications, 2012, 3, 1102.	5.8	255
3947	Hypertension with or without adrenal hyperplasia due to different inherited mutations in the potassium channel <i>KCNJ5</i> . Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 2533-2538.	3.3	261
3948	Preferential binding of K+ ions in the selectivity filter at equilibrium explains high selectivity of K+ channels. Journal of General Physiology, 2012, 140, 671-679.	0.9	23
3949	Structural asymmetry in the magnesium channel CorA points to sequential allosteric regulation. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 18809-18814.	3.3	62
3950	Protonation state of E71 in KcsA and its role for channel collapse and inactivation. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 15265-15270.	3.3	70
3951	Histidine pairing at the metal transport site of mammalian ZnT transporters controls Zn ²⁺ over Cd ²⁺ selectivity. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 7202-7207.	3.3	117
3952	Molecular Modelling of Oligomeric States of DmOR83b, an Olfactory Receptor in <i>D. Melanogaster</i> . Bioinformatics and Biology Insights, 2012, 6, BBI.S8990.	1.0	11
3953	Thermodynamics of electromechanical coupling in voltage-gated ion channels. Journal of General Physiology, 2012, 140, 613-623.	0.9	38
3954	The LRRC26 Protein Selectively Alters the Efficacy of BK Channel Activators. Molecular Pharmacology, 2012, 81, 21-30.	1.0	40
3955	Molecular mechanism for depolarization-induced modulation of Kv channel closure. Journal of General Physiology, 2012, 140, 481-493.	0.9	39
3956	Realistic simulation of the activation of voltage-gated ion channels. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 3335-3340.	3.3	32
3957	Architecture of the HCN selectivity filter and control of cation permeation. Scientific Reports, 2012, 2, 894.	1.6	11
3958	The pH sensor of the plant K+-uptake channel KAT1 is built from a sensory cloud rather than from single key amino acids. Biochemical Journal, 2012, 442, 57-63.	1.7	20
3959	Structural modelling and mutant cycle analysis predict pharmacoresponsiveness of a Nav1.7 mutant channel. Nature Communications, 2012, 3, 1186.	5.8	88
3960	Emerging approaches to probing ion channel structure and function. Neuroscience Bulletin, 2012, 28, 351-374.	1.5	4
3961	Oligomerization of polytopic \hat{I}_{\pm} -helical membrane proteins: causes and consequences. Biological Chemistry, 2012, 393, 1215-1230.	1.2	21
3962	A ring of threonines in the inner vestibule of the pore of CNGA1 channels constitutes a binding site for permeating ions. Journal of Physiology, 2012, 590, 5075-5090.	1.3	5

#	Article	IF	CITATIONS
3963	Role of vascular potassium channels in the regulation of renal hemodynamics. American Journal of Physiology - Renal Physiology, 2012, 302, F505-F518.	1.3	29
3964	Molecular Determinants of Pentamidine-Induced hERG Trafficking Inhibition. Molecular Pharmacology, 2012, 81, 198-209.	1.0	60
3965	Crystal Structure of the Human Two–Pore Domain Potassium Channel K2P1. Science, 2012, 335, 432-436.	6.0	282
3966	Molecular modelling of cation–i̇́€ interactions. Molecular Simulation, 2012, 38, 704-722.	0.9	23
3967	Analytical Approaches for Studying Transporters, Channels and Porins. Chemical Reviews, 2012, 112, 6227-6249.	23.0	42
3968	Disease Detection and Management via Single Nanopore-Based Sensors. Chemical Reviews, 2012, 112, 6431-6451.	23.0	222
3969	Introduction to Ion Channels and Disease. Chemical Reviews, 2012, 112, 6215-6217.	23.0	27
3970	Modeling the Ion Selectivity of the Phosphate Specific Channel OprP. Journal of Physical Chemistry Letters, 2012, 3, 3639-3645.	2.1	28
3971	Detergent selection for enhanced extraction of membrane proteins. Protein Expression and Purification, 2012, 86, 12-20.	0.6	140
3972	Evolution of the Ion Channel Concept: The Historical Perspective. Chemical Reviews, 2012, 112, 6218-6226.	23.0	23
3973	Ion transport through dimethyl sulfoxide (DMSO) induced transient water pores in cell membranes. Molecular Membrane Biology, 2012, 29, 107-113.	2.0	40
3974	Ion Channel Associated Diseases: Overview of Molecular Mechanisms. Chemical Reviews, 2012, 112, 6319-6333.	23.0	47
3975	Ion Channel Mutations in Neuronal Diseases: A Genetics Perspective. Chemical Reviews, 2012, 112, 6334-6352.	23.0	35
3976	Genetics of Hearing and Deafness. Anatomical Record, 2012, 295, 1812-1829.	0.8	98
3977	Physiological Importance of Polyâ€(<i>R</i>)â€3â€hydroxybutyrates. Chemistry and Biodiversity, 2012, 9, 2343-2366.	1.0	37
3978	Potassium supply and homeostasis in the osmotolerant non-conventional yeasts Zygosaccharomyces rouxii differ from Saccharomyces cerevisiae. Current Genetics, 2012, 58, 255-264.	0.8	15
3979	The preferential permeation of ions across carbon and boron nitride nanotubes. Chemical Physics, 2012, 403, 105-112.	0.9	27
3980	K+ uptake systems in the yeast Hansenula polymorpha. Transcriptional and post-translational mechanisms involved in high-affinity K+ transporter regulation. Fungal Genetics and Biology, 2012, 49, 755-763	0.9	17

#	Article	IF	CITATIONS
3981	Metal ion binding to peptides: Oxygen or nitrogen sites?. International Journal of Mass Spectrometry, 2012, 330-332, 71-77.	0.7	51
3982	NMR spectroscopy of G-quadruplexes. Methods, 2012, 57, 11-24.	1.9	249
3983	How insensitive … How a mutation in the SCN5A voltage sensor leads to clinical arrhythmia. Heart Rhythm, 2012, 9, 1689-1690.	0.3	0
3984	Nonselective Conduction in a Mutated NaK Channel with Three Cation-Binding Sites. Biophysical Journal, 2012, 103, 2106-2114.	0.2	17
3985	Sequence Alignment of Viral Channel Proteins with Cellular Ion Channels. Journal of Computational Biology, 2012, 19, 1060-1072.	0.8	5
3986	Ion-pair induced self-assembly of molecular barrels with encapsulated tetraalkylammonium cations based on a bis–trisurea stave. Chemical Communications, 2012, 48, 3097.	2.2	19
3987	Ion Channels in Plants. Physiological Reviews, 2012, 92, 1777-1811.	13.1	398
3988	Identifying protein quaternary structural attributes by incorporating physicochemical properties into the general form of Chou's PseAAC via discrete wavelet transform. Molecular BioSystems, 2012, 8, 3178.	2.9	83
3989	Recent developments in utilising yoctowells for investigations in nanospace. Chemical Society Reviews, 2012, 41, 1637-1651.	18.7	12
3990	Mechanism for Variable Selectivity and Conductance in Mutated NaK Channels. Journal of Physical Chemistry Letters, 2012, 3, 2887-2891.	2.1	10
3991	Structural Characterization of the Voltage-Sensor Domain and Voltage-Gated K ⁺ -Channel Proteins Vectorially Oriented within a Single Bilayer Membrane at the Solid/Vapor and Solid/Liquid Interfaces via Neutron Interferometry. Langmuir, 2012, 28, 10504-10520.	1.6	14
3992	Toward a Digital Gene Response: RNA G-Quadruplexes with Fewer Quartets Fold with Higher Cooperativity. Journal of the American Chemical Society, 2012, 134, 812-815.	6.6	46
3993	Symmetry-Constrained Analysis of Pulsed Double Electron–Electron Resonance (DEER) Spectroscopy Reveals the Dynamic Nature of the KcsA Activation Gate. Journal of the American Chemical Society, 2012, 134, 16360-16369.	6.6	32
3994	High-Risk Long QT Syndrome Mutations in the Kv7.1 (KCNQ1) Pore Disrupt the Molecular Basis for Rapid K ⁺ Permeation. Biochemistry, 2012, 51, 9076-9085.	1.2	17
3995	The Cytosolic GH Loop Regulates the Phosphatidylinositol 4,5-Bisphosphate-induced Gating Kinetics of Kir2 Channels. Journal of Biological Chemistry, 2012, 287, 42278-42287.	1.6	17
3996	Competition among Ca ²⁺ , Mg ²⁺ , and Na ⁺ for Model Ion Channel Selectivity Filters: Determinants of Ion Selectivity. Journal of Physical Chemistry B, 2012, 116, 10703-10714.	1.2	45
3997	Computer Simulations of Voltage-Gated Cation Channels. Journal of Physical Chemistry Letters, 2012, 3, 1017-1023.	2.1	13
3998	Effects of Hydration during Strontium Exchange into Nanoporous Hydrogen Niobium Titanium Silicate. Inorganic Chemistry, 2012, 51, 6251-6258.	1.9	5

#	Article	IF	CITATIONS
3999	QM/MM Prediction of the Stark Shift in the Active Site of a Protein. Journal of Chemical Theory and Computation, 2012, 8, 2817-2823.	2.3	17
4000	Multiple Binding Sites for Fatty Acids on the Potassium Channel KcsA. Biochemistry, 2012, 51, 2889-2898.	1.2	10
4001	Variable-Temperature Scanning Tunneling Microscopy and Computational Studies Examining Water and Potassium Adsorption on Au(100). Journal of Physical Chemistry C, 2012, 116, 555-562.	1.5	5
4002	Accommodation of a Central Arginine in a Transmembrane Peptide by Changing the Placement of Anchor Residues. Journal of Physical Chemistry B, 2012, 116, 12980-12990.	1.2	22
4004	Properties of Membrane-Incorporated WALP Peptides That Are Anchored on Only One End. Biochemistry, 2012, 51, 10066-10074.	1.2	7
4005	Characterizing the Fatty Acid Binding Site in the Cavity of Potassium Channel KcsA. Biochemistry, 2012, 51, 7996-8002.	1.2	13
4006	ATR-FTIR Spectroscopy Revealing the Different Vibrational Modes of the Selectivity Filter Interacting with K ⁺ and Na ⁺ in the Open and Collapsed Conformations of the KcsA Potassium Channel. Journal of Physical Chemistry Letters, 2012, 3, 3806-3810.	2.1	32
4007	Effects of Lipid Structure on the State of Aggregation of Potassium Channel KcsA. Biochemistry, 2012, 51, 6010-6016.	1.2	5
4008	Observing a Model Ion Channel Gating Action in Model Cell Membranes in Real Time in Situ: Membrane Potential Change Induced Alamethicin Orientation Change. Journal of the American Chemical Society, 2012, 134, 6237-6243.	6.6	88
4009	Musa paradisica RCI complements AtRCI and confers Na+ tolerance and K+ sensitivity in Arabidopsis. Plant Science, 2012, 184, 102-111.	1.7	20
4010	Sensing pressure with ion channels. Trends in Neurosciences, 2012, 35, 477-486.	4.2	134
4011	Expression and isotopic labelling of the potassium channel blocker ShK toxin as a thioredoxin fusion protein in bacteria. Toxicon, 2012, 60, 840-850.	0.8	23
4012	Membrane Protein Structure and Dynamics from NMR Spectroscopy. Annual Review of Physical Chemistry, 2012, 63, 1-24.	4.8	179
4013	From linking of metal-oxide building blocks in a dynamic library to giant clusters with unique properties and towards adaptive chemistry. Chemical Society Reviews, 2012, 41, 7431.	18.7	340
4014	Ligand-Gated Ion Channels: New Insights into Neurological Disorders and Ligand Recognition. Chemical Reviews, 2012, 112, 6285-6318.	23.0	133
4015	Contribution of Ion Binding Affinity to Ion Selectivity and Permeation in KcsA, a Model Potassium Channel. Biochemistry, 2012, 51, 3891-3900.	1.2	12
4016	hERG K ⁺ Channels: Structure, Function, and Clinical Significance. Physiological Reviews, 2012, 92, 1393-1478.	13.1	581
4017	Nanochannels Preparation and Application in Biosensing. ACS Nano, 2012, 6, 7556-7583.	7.3	184

		CITATION REPORT	
#	Article	IF	CITATIONS
4018	Oligomerization at the Membrane. Advances in Experimental Medicine and Biology, 2012, 747, 12	2-136. 0.8	15
4019	Glycines: Role in α-Helical Membrane Protein Structures and a Potential Indicator of Native Conformation. Biochemistry, 2012, 51, 4779-4789.	1.2	71
4020	Modeling and Simulation of Ion Channels. Chemical Reviews, 2012, 112, 6250-6284.	23.0	0 196
4021	Ion channel drug discovery: challenges and future directions. Future Medicinal Chemistry, 2012, 4, 661-679.	1.1	47
4022	The Distal C-Terminal Region of the KcsA Potassium Channel Is a pH-Dependent Tetramerization De Journal of Molecular Biology, 2012, 418, 237-247.	omain. 2.0	9
4023	From microhydration to bulk hydration of Sr2+ metal ion: DFT, MP2 and molecular dynamics study Journal of Molecular Liquids, 2012, 172, 110-118.	· 2.3	20
4024	Analysis of IP3 receptors in and out of cells. Biochimica Et Biophysica Acta - General Subjects, 2012 1820, 1214-1227.	2, 1.1	15
4025	Coarse grained model for exploring voltage dependent ion channels. Biochimica Et Biophysica Acta Biomembranes, 2012, 1818, 303-317.	- 1.4	28
4026	Structural correlates of selectivity and inactivation in potassium channels. Biochimica Et Biophysic Acta - Biomembranes, 2012, 1818, 272-285.	a 1.4	65
4027	Electrostatic interaction between inactivation ball and T1–S1 linker region of Kv1.4 channel. Biochimica Et Biophysica Acta - Biomembranes, 2012, 1818, 55-63.	1.4	6
4028	Current and selectivity in a model sodium channel under physiological conditions: Dynamic Monte Carlo simulations. Biochimica Et Biophysica Acta - Biomembranes, 2012, 1818, 592-600.	1.4	33
4029	Coupling between the voltage-sensing and pore domains in a voltage-gated potassium channel. Biochimica Et Biophysica Acta - Biomembranes, 2012, 1818, 1726-1736.	1.4	18
4030	Hinge-bending motions in the pore domain of a bacterial voltage-gated sodium channel. Biochimic Biophysica Acta - Biomembranes, 2012, 1818, 2120-2125.	a Et 1.4	31
4031	Electrospinning. , 2012, , 769-775.		2
4032	Harnessing Human Nâ€ŧype Ca ²⁺ Channel Receptor by Identifying the Atomic Hotsp for Its Structureâ€Based Blocker Design. Molecular Informatics, 2012, 31, 643-657.	ot Regions 1.4	7
4033	In silico modeling of the pore region of a KCNQ4 missense mutant from a patient with hearing loss BMC Research Notes, 2012, 5, 145.	. 0.6	11
4034	Biocompatible Xanthine-Quadruplex Scaffold for Ion-Transporting DNA Channels. Journal of Physic Chemistry Letters, 2012, 3, 1788-1792.	al 2.1	23
4035	Structure and Function of Copper Uptake Transporters. Current Topics in Membranes, 2012, 69, 9	7-112. 0.5	28

#	Article	IF	CITATIONS
4036	End-Plate Acetylcholine Receptor: Structure, Mechanism, Pharmacology, and Disease. Physiological Reviews, 2012, 92, 1189-1234.	13.1	108
4037	Targeting ion channels for the treatment of gastrointestinal motility disorders. Therapeutic Advances in Gastroenterology, 2012, 5, 5-21.	1.4	64
4038	Electrostatic RF MEMS Switches. , 2012, , 783-783.		0
4039	3.13 The Membrane Factor: Biophysical Studies of Alpha Helical Transmembrane Protein Folding. , 2012, , 290-316.		1
4040	6.1 Channel Proteins – An Introduction. , 2012, , 1-3.		0
4041	6.2 Structure-Function Correlates of Glutamate-Gated Ion Channels. , 2012, , 4-30.		0
4042	6.3 Gating Dynamics of the Potassium Channel Pore. , 2012, , 31-67.		4
4043	6.10 Structure–Function Correlates in Plant Ion Channels. , 2012, , 234-245.		6
4044	5.7 Solution NMR Spectroscopy of Integral Membrane Proteins. , 2012, , 120-138.		2
4045	8.11 Transporters and Co-transporters in Theory and Practice. , 2012, , 228-264.		6
4046	Regulation of Ion Channels by Membrane Lipids. , 2012, 2, 31-68.		69
4047	Techniques and Methodologies to Study the Ryanodine Receptor at the Molecular, Subcellular and Cellular Level. Advances in Experimental Medicine and Biology, 2012, 740, 183-215.	0.8	10
4048	Mechanism of Ion Permeation and Selectivity in a Voltage Gated Sodium Channel. Journal of the American Chemical Society, 2012, 134, 1840-1846.	6.6	155
4049	Looking over Toxin–K ⁺ Channel Interactions. Clues from the Structural and Functional Characterization of α-KTx Toxin Tc32, a Kv1.3 Channel Blocker. Biochemistry, 2012, 51, 1885-1894.	1.2	17
4050	A hard X-ray nanoprobe beamline for nanoscale microscopy. Journal of Synchrotron Radiation, 2012, 19, 1056-1060.	1.0	152
4051	Ion solvation and structural stability in a sodium channel investigated by molecular dynamics calculations. Biochimica Et Biophysica Acta - Biomembranes, 2012, 1818, 2529-2535.	1.4	34
4052	Multi-Ion Distributions in the Cytoplasmic Domain of Inward Rectifier Potassium Channels. Biophysical Journal, 2012, 103, 434-443.	0.2	7
4053	Interaction of the S6 Proline Hinge with N-Type and C-Type Inactivation inÂKv1.4 Channels. Biophysical Journal, 2012, 103, 1440-1450.	0.2	5

C_{1}	DEDODT
	Report

#	Article	IF	CITATIONS
4054	1.11 The Hybrid Solution/Solid-State NMR Method for Membrane Protein Structure Determination. , 2012, , 182-198.		4
4055	Rigid Body Brownian Dynamics as a Tool for Studying Ion Channel Blockers. Journal of Physical Chemistry B, 2012, 116, 1933-1941.	1.2	8
4056	Structural rearrangements underlying ligand-gating in Kir channels. Nature Communications, 2012, 3, 617.	5.8	30
4057	Charybdotoxin and Margatoxin Acting on the Human Voltage-Gated Potassium Channel <i>h</i> K _v 1.3 and Its H399N Mutant: An Experimental and Computational Comparison. Journal of Physical Chemistry B, 2012, 116, 5132-5140.	1.2	15
4058	Planar Lipid Bilayer Method for Studying Channel Molecules. Springer Protocols, 2012, , 229-275.	0.1	10
4059	Construction of biomimetic smart nanochannels with polymer membranes and application in energy conversion systems. Physical Chemistry Chemical Physics, 2012, 14, 4027.	1.3	53
4060	K ⁺ Channels: Functionâ€6tructural Overview. , 2012, 2, 2087-2149.		179
4061	Development and applications of the ABEEM fluctuating charge molecular force field in the ion-containing systems. Science China Chemistry, 2012, 55, 2471-2484.	4.2	23
4062	Regulation of Transport in the Connecting Tubule and Cortical Collecting Duct. , 2012, 2, 1541-1584.		92
4063	Bennett's acceptance ratio and histogram analysis methods enhanced by umbrella sampling along a reaction coordinate in configurational space. Journal of Chemical Physics, 2012, 136, 164103.	1.2	25
4064	Identification and characterization of a bacterial hydrosulphide ion channel. Nature, 2012, 483, 494-497.	13.7	133
4066	Mechanism of Function of Viral Channel Proteins and Implications for Drug Development. International Review of Cell and Molecular Biology, 2012, 294, 259-321.	1.6	30
4067	Protein Dimerization and Oligomerization in Biology. Advances in Experimental Medicine and Biology, 2012, , .	0.8	40
4068	Ion fluxes through nanopores and transmembrane channels. Physical Review E, 2012, 85, 031914.	0.8	30
4069	Structural Determinants of the Supramolecular Organization of G Protein-Coupled Receptors in Bilayers. Journal of the American Chemical Society, 2012, 134, 10959-10965.	6.6	199
4070	PNP Equations with Steric Effects: A Model of Ion Flow through Channels. Journal of Physical Chemistry B, 2012, 116, 11422-11441.	1.2	146
4071	Functional Equilibrium of the KcsA Structure Revealed by NMR*. Journal of Biological Chemistry, 2012, 287, 39634-39641.	1.6	50
4072	The Inner Workings of a Dynamic Duo. Science, 2012, 335, 416-417.	6.0	5

	ΟΙΤΑΤΙΟ	n Report	
#	Article	IF	CITATIONS
4073	Crystal Structure of the Calcium Release–Activated Calcium Channel Orai. Science, 2012, 338, 1308-1313	. 6.0	509
4074	EPR Spectroscopy. Topics in Current Chemistry, 2012, , .	4.0	33
4075	Structure and Mechanism of Voltage-Gated Ion Channels. , 2012, , 383-408.		0
4076	Ion Channels as Targets for Toxins. , 2012, , 509-524.		1
4077	Solution Structure of Kurtoxin: A Gating Modifier Selective for Cav3 Voltage-Gated Ca ²⁺ Channels. Biochemistry, 2012, 51, 1862-1873.	1.2	17
4078	9.7 Molecular Modeling and Simulations of Transporter Proteins – The Transmembrane Allosteric Machinery. , 2012, , 105-122.		2
4079	Ionic Fluxes and Genesis of the Cardiac Action Potential. , 2012, , 67-85.		2
4080	Electrowetting-on-Dielectric (EWOD). , 2012, , 789-789.		0
4081	Bisphenol A Binds to the Local Anesthetic Receptor Site to Block the Human Cardiac Sodium Channel. PLoS ONE, 2012, 7, e41667.	1.1	63
4082	lon Conduction through the hERG Potassium Channel. PLoS ONE, 2012, 7, e49017.	1.1	24
4083	Voltage-Dependent Gating of hERG Potassium Channels. Frontiers in Pharmacology, 2012, 3, 83.	1.6	34
4084	Molecular Dynamics Simulations of Voltage-Gated Cation Channels: Insights on Voltage-Sensor Domain Function and Modulation. Frontiers in Pharmacology, 2012, 3, 97.	1.6	26
4085	Voltage-Gated Sodium Channels: Biophysics, Pharmacology, and Related Channelopathies. Frontiers in Pharmacology, 2012, 3, 124.	1.6	95
4086	Coupling of Voltage-Sensors to the Channel Pore: A Comparative View. Frontiers in Pharmacology, 2012, 3, 145.	1.6	40
4087	Mechanism of Electromechanical Coupling in Voltage-Gated Potassium Channels. Frontiers in Pharmacology, 2012, 3, 166.	1.6	78
4088	Being Flexible: The Voltage-Controllable Activation Gate of Kv Channels. Frontiers in Pharmacology, 2012, 3, 168.	1.6	49
4089	A Role for K2P Channels in the Operation of Somatosensory Nociceptors. Frontiers in Molecular Neuroscience, 2012, 5, 21.	1.4	40
4091	Disorders of Carbohydrate Metabolism. , 2012, , 1320-1329.		1

	CITATION	REPORT	
#	Article	IF	CITATIONS
4092	Genetics of hearing loss: focus on DFNA2. The Application of Clinical Genetics, 2012, 5, 97.	1.4	15
4093	Ca _v 3 Tâ€ŧype calcium channels. Environmental Sciences Europe, 2012, 1, 467-491.	2.6	22
4094	Molecular structure and function of Hv1 channels. Environmental Sciences Europe, 2012, 1, 763-777.	2.6	4
4095	Soft–Soft interactions in the protein–protein recognition process: The K ⁺ channelâ€charybdotoxin case. International Journal of Quantum Chemistry, 2012, 112, 3618-3623.	1.0	3
4096	The Importance of Dehydration in Determining Ion Transport in Narrow Pores. Small, 2012, 8, 1701-1709.	5.2	220
4097	lonic rectification by electrostatically actuated tethers on single walled carbon nanotube membranes. Chemical Communications, 2012, 48, 7979.	2.2	17
4098	Patch Clamp Techniques. Springer Protocols, 2012, , .	0.1	8
4099	Gating of cyclic nucleotide-gated channels is voltage dependent. Nature Communications, 2012, 3, 973.	5.8	17
4100	Molecular dynamics simulations of membrane proteins. Biophysical Reviews, 2012, 4, 271-282.	1.5	9
4101	Crystal structure of a voltage-gated sodium channel in two potentially inactivated states. Nature, 2012, 486, 135-139.	13.7	435
4102	A single GluN2 subunit residue controls NMDA receptor channel properties via intersubunit interaction. Nature Neuroscience, 2012, 15, 406-413.	7.1	77
4103	Computational modeling of ion transport through nanopores. Nanoscale, 2012, 4, 6166.	2.8	60
4104	Aggregation and Supramolecular Membrane Interactions that Influence Anion Transport in Tryptophan ontaining Synthetic Peptides. Chemistry - A European Journal, 2012, 18, 7608-7623.	1.7	10
4105	Allostery and the Monod-Wyman-Changeux Model After 50 Years. Annual Review of Biophysics, 2012, 41, 103-133.	4.5	329
4106	Transferring knowledge towards understanding the pore stabilizing variations in K+ channels. Journal of Bioenergetics and Biomembranes, 2012, 44, 199-205.	1.0	2
4107	Cholesterol enhances neuron susceptibility to apoptotic stimuli via cAMP/PKA/CREBâ€dependent upâ€regulation of Kv2.1. Journal of Neurochemistry, 2012, 120, 502-514.	2.1	21
4108	Modes of glutamate receptor gating. Journal of Physiology, 2012, 590, 73-91.	1.3	45
4109	Carbohydrate-based synthetic ion transporters. Carbohydrate Research, 2012, 356, 62-74.	1.1	19

#	Article	IF	CITATIONS
4110	HERG potassium channel regulation by the N-terminal eag domain. Cellular Signalling, 2012, 24, 1592-1598.	1.7	41
4111	Structure and Pharmacology of Pentameric Receptor Channels: From Bacteria to Brain. Structure, 2012, 20, 941-956.	1.6	202
4112	Metal ion shuttling mechanism through thiacalix[4]crown: a computational study. Tetrahedron Letters, 2012, 53, 2009-2012.	0.7	7
4113	Toxin modulators and blockers of hERG K+ channels. Toxicon, 2012, 60, 492-501.	0.8	24
4114	Involvement of C-type inactivation gating in the actions of voltage-gated K+ channel inhibitors. , 2012, 133, 151-158.		10
4115	NMR studies of alkali metal ions in organic and biological solids. Progress in Nuclear Magnetic Resonance Spectroscopy, 2012, 61, 1-70.	3.9	35
4116	HKT2;2/1, a K ⁺ â€permeable transporter identified in a saltâ€ŧolerant rice cultivar through surveys of natural genetic polymorphism. Plant Journal, 2012, 71, 750-762.	2.8	94
4118	Conotoxins: From the biodiversity of gastropods to new drugs. Biochemistry (Moscow) Supplement Series B: Biomedical Chemistry, 2012, 6, 107-122.	0.2	10
4119	Niflumic acid blocks native and recombinant Tâ€ŧype channels. Journal of Cellular Physiology, 2012, 227, 2542-2555.	2.0	25
4120	Voltage sensor of ion channels and enzymes. Biophysical Reviews, 2012, 4, 1-15.	1.5	16
4121	Engineering aspects of biological ion channels—from biosensors to computational models for permeation. Protoplasma, 2012, 249, 3-9.	1.0	11
4122	Solvation counteracts coulombic repulsion in the binding of two cations to a model hexapeptide. Journal of Molecular Modeling, 2012, 18, 53-64.	0.8	2
4123	Materials Science and Materials Chemistry for Large Scale Electrochemical Energy Storage: From Transportation to Electrical Grid. Advanced Functional Materials, 2013, 23, 929-946.	7.8	590
4124	Interactions of Drugs and Toxins with Permeant Ions in Potassium, Sodium, and Calcium Channels. Neuroscience and Behavioral Physiology, 2013, 43, 388-400.	0.2	2
4125	5-HT2 receptors-mediated modulation of voltage-gated K+ channels and neurophysiopathological correlates. Experimental Brain Research, 2013, 230, 453-462.	0.7	12
4126	Sodium as nutrient and toxicant. Plant and Soil, 2013, 369, 1-23.	1.8	289
4127	Electrical Activity in Neurons. , 2013, , 113-143.		0
4129	Ion Channel Models Based on Self-Assembling Cyclic Peptide Nanotubes. Accounts of Chemical Research, 2013, 46, 2955-2965.	7.6	287

#	Article	IF	CITATIONS
4130	Real-time monitoring of the oxidative response of a membrane–channel biomimetic system to free radicals. Chemical Communications, 2013, 49, 6584.	2.2	13
4131	Chemical Neurobiology. Methods in Molecular Biology, 2013, , .	0.4	0
4132	Attractive asymmetric inclusions in elastic membranes under tension: cluster phases and membrane invaginations. Soft Matter, 2013, 9, 7804.	1.2	24
4133	Gated access to microreactors. Nature Chemistry, 2013, 5, 449-451.	6.6	12
4134	MscS-like Mechanosensitive Channels in Plants and Microbes. Biochemistry, 2013, 52, 5708-5722.	1.2	62
4135	Unfolded protein ensembles, folding trajectories, and refolding rate prediction. Journal of Chemical Physics, 2013, 139, 121925.	1.2	11
4136	Modeling Complexes of Transmembrane Proteins: Systematic Analysis of ProteinProtein Docking Tools. Molecular Informatics, 2013, 32, 717-733.	1.4	27
4137	G protein modulation of K2P potassium channel TASK-2. Pflugers Archiv European Journal of Physiology, 2013, 465, 1715-1726.	1.3	22
4138	Ligands for Channels, Pores, and Transporters. , 2013, , 745-776.		0
4139	Ion selectivity and gating mechanisms of FNT channels. Current Opinion in Structural Biology, 2013, 23, 499-506.	2.6	21
4140	Template-directed self-assembly of a designed amphiphilic hexapeptide on mica surface. Colloid and Polymer Science, 2013, 291, 2263-2270.	1.0	7
4141	Applications of polymer single nanochannels in biosensors. Science Bulletin, 2013, 58, 1473-1482.	1.7	12
4142	Bioinorganic Neurochemistry. , 2013, , 207-240.		1
4143	Targeted molecular dynamics (TMD) of the full-length KcsA potassium channel: on the role of the cytoplasmic domain in the opening process. Journal of Molecular Modeling, 2013, 19, 1651-1666.	0.8	8
4144	Single-step electrochemical functionalization of double-walled carbon nanotube (DWCNT) membranes and the demonstration of ionic rectification. Nanoscale Research Letters, 2013, 8, 279.	3.1	12
4145	Chimeras Reveal a Single Lipid-Interface Residue that Controls MscL Channel Kinetics as well as Mechanosensitivity. Cell Reports, 2013, 3, 520-527.	2.9	21
4147	Potassium ion channel optical model: Membrane potential repolarization and its dynamic spread process. Neurocomputing, 2013, 99, 316-324.	3.5	1
4148	A parallel finite element simulator for ion transport through threeâ€dimensional ion channel systems. Journal of Computational Chemistry, 2013, 34, 2065-2078.	1.5	38

#	Article	IF	CITATIONS
4149	Optimization of 3D Poisson-Nernst-Planck model for fast evaluation of diverse protein channels. Proteins: Structure, Function and Bioinformatics, 2013, 81, 1802-1822.	1.5	10
4150	Combining structure- and ligand-based approaches for studies of interactions between different conformations of the hERG K+ channel pore and known ligands. Journal of Molecular Graphics and Modelling, 2013, 46, 93-104.	1.3	16
4151	K+ and Na+ Conduction in Selective and Nonselective Ion Channels Via Molecular Dynamics Simulations. Biophysical Journal, 2013, 105, 1737-1745.	0.2	38
4152	Analysis of the Interaction of Tarantula Toxin Jingzhaotoxin-III (β-TRTX-Cj1α) with the Voltage Sensor of Kv2.1 Uncovers the Molecular Basis for Cross-Activities on Kv2.1 and Nav1.5 Channels. Biochemistry, 2013, 52, 7439-7448.	1.2	15
4153	Bioinspired Graphene Nanopores with Voltage-Tunable Ion Selectivity for Na ⁺ and K ⁺ . ACS Nano, 2013, 7, 10148-10157.	7.3	199
4154	A New, Modular Mass Calibrant for High-Mass MALDI-MS. Analytical Chemistry, 2013, 85, 3425-3432.	3.2	20
4155	Energetics of Multi-Ion Conduction Pathways in Potassium Ion Channels. Journal of Chemical Theory and Computation, 2013, 9, 5176-5189.	2.3	41
4156	Computational Methods of Studying the Binding of Toxins From Venomous Animals to Biological Ion Channels: Theory and Applications. Physiological Reviews, 2013, 93, 767-802.	13.1	49
4157	Preparation of uniformly isotope labeled KcsA for solid state NMR: Expression, purification, reconstitution into liposomes and functional assay. Protein Expression and Purification, 2013, 91, 119-124.	0.6	26
4158	Structure of the TRPV1 ion channel determined by electron cryo-microscopy. Nature, 2013, 504, 107-112.	13.7	1,451
4159	Conduits of Life's Spark: A Perspective on Ion Channel Research since the Birth of Neuron. Neuron, 2013, 80, 658-674.	3.8	44
4160	A history of the role of the hERG channel in cardiac risk assessment. Journal of Pharmacological and Toxicological Methods, 2013, 68, 13-22.	0.3	76
4161	Structural basis for ion permeation mechanism in pentameric ligand-gated ion channels. EMBO Journal, 2013, 32, 728-741.	3.5	140
4162	1.2Ââ,,« X-ray Structure of the Renal Potassium Channel Kv1.3 T1 Domain. Protein Journal, 2013, 32, 533-542.	0.7	3
4163	MOLE 2.0: advanced approach for analysis of biomacromolecular channels. Journal of Cheminformatics, 2013, 5, 39.	2.8	262
4164	The structure and regulation of magnesium selective ion channels. Biochimica Et Biophysica Acta - Biomembranes, 2013, 1828, 2778-2792.	1.4	57
4165	Side-effects of protein kinase inhibitors on ion channels. Journal of Biosciences, 2013, 38, 937-949.	0.5	7
4166	Electrophysiology of Bacteria. Annual Review of Microbiology, 2013, 67, 179-197.	2.9	29

#	Article	IF	CITATIONS
4167	Solid state NMR and protein–protein interactions in membranes. Current Opinion in Structural Biology, 2013, 23, 919-928.	2.6	32
4168	A distinct mechanism for activating uncoupled nicotinic acetylcholine receptors. Nature Chemical Biology, 2013, 9, 701-707.	3.9	89
4169	Detailed Examination of a Single Conduction Event in a Potassium Channel. Journal of Physical Chemistry Letters, 2013, 4, 3104-3109.	2.1	8
4170	Teaching structure: Student use of software tools for understanding macromolecular structure in an undergraduate biochemistry course. Biochemistry and Molecular Biology Education, 2013, 41, 351-359.	0.5	18
4171	Protein Fluorescent Dye Labeling. , 2013, , 2015-2015.		0
4172	Maleimide-containing polymer inverse opals: a new kind of reactive photonic structure with significant extendibility. Journal of Materials Chemistry C, 2013, 1, 6120.	2.7	13
4173	Phylogeny and effects of anoxia on hyperpolarization-activated, cyclic nucleotide-gated channel gene expression in the heart of a primitive chordate, the Pacific Hagfish (<i>eptatretus stoutii</i>). Journal of Experimental Biology, 2013, 216, 4462-72.	0.8	21
4174	Molecular dynamics of ion transport through the open conformation of a bacterial voltage-gated sodium channel. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 6364-6369.	3.3	149
4175	Catalysis of Na ⁺ permeation in the bacterial sodium channel Na _V Ab. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 11331-11336.	3.3	113
4176	Stochastic dynamics of remote knock-on permeation in biological ion channels. , 2013, , .		3
4177	New cylindrical peptide assemblies defined by extended parallel β-sheets. Organic and Biomolecular Chemistry, 2013, 11, 425-429.	1.5	25
4178	The NaV1.7 sodium channel: from molecule to man. Nature Reviews Neuroscience, 2013, 14, 49-62.	4.9	474
4179	Anthranilamides as Bioinspired Molecular Electrets: Experimental Evidence for a Permanent Ground-State Electric Dipole Moment. Journal of Organic Chemistry, 2013, 78, 1994-2004.	1.7	41
4180	Analysis of the selectivity filter of the voltage-gated sodium channel NavRh. Cell Research, 2013, 23, 409-422.	5.7	46
4181	From microhydration to bulk hydration of Rb+ metal ion: DFT, MP2 and AIMD simulation study. Journal of Molecular Liquids, 2013, 179, 34-45.	2.3	9
4182	Hydration structure of salt solutions from <i>ab initio</i> molecular dynamics. Journal of Chemical Physics, 2013, 138, 014501.	1.2	158
4183	The molecular mystique of tetrodotoxin. Toxicon, 2013, 63, 165-183.	0.8	109
4184	Structural Determinants of Skeletal Muscle Ryanodine Receptor Gating*. Journal of Biological Chemistry, 2013, 288, 6154-6165.	1.6	48

#	Article	IF	CITATIONS
4185	Ion Channels as Therapeutic Targets: A Drug Discovery Perspective. Journal of Medicinal Chemistry, 2013, 56, 593-624.	2.9	240
4186	Cationâ^ïĺ€ Interaction: Its Role and Relevance in Chemistry, Biology, and Material Science. Chemical Reviews, 2013, 113, 2100-2138.	23.0	871
4187	Potassium channels: a review of broadening therapeutic possibilities for neurological diseases. Journal of Neurology, 2013, 260, 2201-2211.	1.8	57
4188	Lipid–protein nanodiscs promote in vitro folding of transmembrane domains of multi-helical and multimeric membrane proteins. Biochimica Et Biophysica Acta - Biomembranes, 2013, 1828, 776-784.	1.4	42
4190	Decrease in RNA Folding Cooperativity by Deliberate Population of Intermediates in RNA Gâ€Quadruplexes. Angewandte Chemie - International Edition, 2013, 52, 683-686.	7.2	23
4191	The future of the protein data bank. Biopolymers, 2013, 99, 218-222.	1.2	65
4192	Theoretical Investigation of Macrodipoles in Supramolecular Columnar Stackings. Chemistry - A European Journal, 2013, 19, 1647-1657.	1.7	49
4193	Generation of an antibody toolbox to characterize hERG. Biochemical and Biophysical Research Communications, 2013, 431, 70-75.	1.0	6
4194	Ionic hydration of Na+ inside carbon nanotubes, under electric fields. Fluid Phase Equilibria, 2013, 353, 1-6.	1.4	14
4195	Coupled effect of salt and pH on proteins probed with NMR spectroscopy. Chemical Physics Letters, 2013, 579, 114-121.	1.2	13
4196	A novel homology model of TRPC3 reveals allosteric coupling between gate and selectivity filter. Cell Calcium, 2013, 54, 175-185.	1.1	25
4197	How does overcoordination create ion selectivity?. Biophysical Chemistry, 2013, 172, 37-42.	1.5	6
4198	Evolution of diffraction methods for solving crystal structures. Acta Crystallographica Section A: Foundations and Advances, 2013, 69, 51-59.	0.3	23
4199	Kapitza-Landau time window for a periodically driven system with friction: a system-bath Hamiltonian approach. European Physical Journal B, 2013, 86, 1.	0.6	3
4200	Ion Channel-like Crystallographic Signatures in Modified Guanine–Potassium/Sodium Interactions. Crystal Growth and Design, 2013, 13, 455-459.	1.4	14
4201	Insights into hERG K+ channel structure and function from NMR studies. European Biophysics Journal, 2013, 42, 71-79.	1.2	10
4202	New allelic variants found in key rice saltâ€ŧolerance genes: an association study. Plant Biotechnology Journal, 2013, 11, 87-100.	4.1	120
4203	Renal Ion Channels, Electrophysiology of Transport, and Channelopathies. , 2013, , 217-262.		2

# 4204	ARTICLE Mechanisms of Ion Transport across Cell Membranes. , 2013, , 45-66.	IF	CITATIONS
4205	Molecular determinants for the tarantula toxin jingzhaotoxin-l interacting with potassium channel Kv2.1. Toxicon, 2013, 63, 129-136.	0.8	11
4206	An NMR investigation of the structure, function and role of the hERG channel selectivity filter in the long QT syndrome. Biochimica Et Biophysica Acta - Biomembranes, 2013, 1828, 1494-1502.	1.4	8
4207	Gating of the TrkH ion channel by its associated RCK protein TrkA. Nature, 2013, 496, 317-322.	13.7	74
4208	Energetic role of the paddle motif in voltage gating of Shaker K+ channels. Nature Structural and Molecular Biology, 2013, 20, 574-581.	3.6	22
4209	Fluorescence Recovery After Photobleaching. , 2013, , 814-815.		0
4210	Markov Models of Molecular Kinetics. , 2013, , 1385-1394.		2
4211	Photoblinking. , 2013, , 1862-1862.		0
4212	X-ray Scattering Determination of the Structure of Water during Carbon Nanotube Filling. Nano Letters, 2013, 13, 1751-1756.	4.5	35
4213	Exploiting Peptide Nanostructures To Construct Functional Artificial Ion Channels. Accounts of Chemical Research, 2013, 46, 2934-2943.	7.6	85
4214	Calcium Channels as Molecular Target Sites of Novel Insecticides. Advances in Insect Physiology, 2013, , 287-347.	1.1	14
4215	Phylogeny and a structural model of plant MHX transporters. BMC Plant Biology, 2013, 13, 75.	1.6	27
4216	The interactions of apamin and tetraethylammonium are differentially affected by single mutations in the pore mouth of small conductance calcium-activated potassium (SK) channels. Biochemical Pharmacology, 2013, 85, 560-569.	2.0	8
4217	Self-Learning Adaptive Umbrella Sampling Method for the Determination of Free Energy Landscapes in Multiple Dimensions. Journal of Chemical Theory and Computation, 2013, 9, 1885-1895.	2.3	80
4218	Evolution of the Genetic Code by Incorporation of Amino Acids that Improved or Changed Protein Function. Journal of Molecular Evolution, 2013, 77, 134-158.	0.8	28
4219	Flash Photolysis. , 2013, , 765-768.		2
4220	Positron Emission Tomography Methodology. , 2013, , 1912-1919.		0
4221	Consequences of Dimerization of the Voltage-Gated Proton Channel. Progress in Molecular Biology and Translational Science, 2013, 117, 335-360.	0.9	13

#	Article	IF	CITATIONS
4222	Asymmetric Ion Transport through Ion-Channel-Mimetic Solid-State Nanopores. Accounts of Chemical Research, 2013, 46, 2834-2846.	7.6	369
4223	Membrane Transport. , 2013, , 305-337.		6
4224	Cation Effects on Rotational Dynamics of Anions and Water Molecules in Alkali (Li ⁺ ,) Tj ETQq0 0 0 r Journal of Physical Chemistry B, 2013, 117, 7972-7984.	gBT /Over 1.2	lock 10 Tf 50 64
4225	Binding of Fluorescent Proteins at Gold Nanoparticles. , 2013, , 263-263.		0
4226	p101., 2013,, 1623-1623.		0
4227	Engineered nanostructured β-sheet peptides protect membrane proteins. Nature Methods, 2013, 10, 759-761.	9.0	110
4228	The structure of the KtrAB potassium transporter. Nature, 2013, 496, 323-328.	13.7	100
4229	Ion Transport through Lipid Bilayers by Synthetic Ionophores: Modulation of Activity and Selectivity. Accounts of Chemical Research, 2013, 46, 2781-2790.	7.6	89
4230	The present and future of solution NMR in investigating the structure and dynamics of channels and transporters. Current Opinion in Structural Biology, 2013, 23, 547-554.	2.6	20
4231	The voltage-dependent gate in MthK potassium channels is located at the selectivity filter. Nature Structural and Molecular Biology, 2013, 20, 159-166.	3.6	60
4232	Synthetic Ion Channels: From Pores to Biological Applications. Accounts of Chemical Research, 2013, 46, 2824-2833.	7.6	229
4233	Voltage-dependent inhibition of outward Kir2.1 currents by extracellular spermine. Biochimica Et Biophysica Acta - Biomembranes, 2013, 1828, 765-775.	1.4	7
4234	The role of tryptophan side chains in membrane protein anchoring and hydrophobic mismatch. Biochimica Et Biophysica Acta - Biomembranes, 2013, 1828, 864-876.	1.4	182
4235	Detergent-labile, supramolecular assemblies of KcsA: Relative abundance and interactions involved. Biochimica Et Biophysica Acta - Biomembranes, 2013, 1828, 193-200.	1.4	15
4236	Effect of Ion Pairing on the Solution Dynamics Investigated by the Simulations of the Optical Kerr Effect and the Dielectric Relaxation Spectra. Journal of Physical Chemistry B, 2013, 117, 15395-15406.	1.2	15
4237	INVERTED TOPOLOGIES IN MEMBRANE PROTEINS: A MINI-REVIEW. Computational and Structural Biotechnology Journal, 2013, 8, e201308004.	1.9	41
4238	Protein Dielectric Constants Determined from NMR Chemical Shift Perturbations. Journal of the American Chemical Society, 2013, 135, 16968-16976.	6.6	82
4239	A residue in the transmembrane segment 6 of domain I in insect and mammalian sodium channels regulate differential sensitivities to pyrethroid insecticides. NeuroToxicology, 2013, 38, 42-50.	1.4	26

		CITATION RE	EPORT	
#	Article		IF	CITATIONS
4240	Membrane Transport, General Concepts. , 2013, , 49-51.			1
4241	Statistical mechanics of Coulomb gases as quantum theory on Riemann surfaces. Journ Experimental and Theoretical Physics, 2013, 117, 517-537.	nal of	0.2	10
4242	Dynamics of ions in the selectivity filter of the KcsA channel. European Physical Journal Topics, 2013, 222, 2595-2605.	: Special	1.2	2
4243	The <scp>Ktr</scp> potassium transport system in <i><scp>S</scp>taphylococcus au role in cell physiology, antimicrobial resistance and pathogenesis. Molecular Microbiolo 760-773.</i>		1.2	61
4244	Engineered Nanopore of Phi29 DNA-Packaging Motor for Real-Time Detection of Single Specific Antibody in Serum. ACS Nano, 2013, 7, 9814-9822.	Colon Cancer	7.3	112
4245	STEREOCHEMISTRY OF POLYPEPTIDE CONFORMATION IN COARSE GRAINED ANALYSIS	5. , 2013, , 136-147.		1
4246	Potassium Ion Channels: Could They Have Evolved from Viruses?. Plant Physiology, 201	.3, 162, 1215-1224.	2.3	19
4247	Identification of a Probable Pore-Forming Domain in the Multimeric Vacuolar Anion Cha Â. Plant Physiology, 2013, 163, 830-843.	annel AtALMT9 Â	2.3	31
4248	Receptor Heteromeric Assembly—How It Works and Why It Matters. Progress in Mole and Translational Science, 2013, 117, 361-386.	ecular Biology	0.9	35
4249	Q/R site interactions with the M3 helix in GluK2 kainate receptor channels revealed by mutant cycles. Journal of General Physiology, 2013, 142, 225-239.	thermodynamic	0.9	14
4250	Hydrodynamic flow in the vicinity of a nanopore induced by an applied voltage. Nanote 24, 245202.	chnology, 2013,	1.3	34
4251	Application of Improved Three-Dimensional Kernel Approach to Prediction of Protein St Class. BioMed Research International, 2013, 2013, 1-8.	ructural	0.9	0
4252	Hydraphiles: A Rigorously Studied Class of Synthetic Channel Compounds with <i>In Vi International Journal of Biomedical Imaging, 2013, 2013, 1-11.</i>	voActivity.	3.0	9
4253	Exploring Volatile General Anesthetic Binding to a Closed Membrane-Bound Bacterial V Sodium Channel via Computation. PLoS Computational Biology, 2013, 9, e1003090.	oltage-Gated	1.5	71
4254	Introduction to special issue, $\hat{a} \in \mathbb{R}$ How nature shaped echolocation in animals $\hat{a} \in \mathbb{R}$ Front 2013, 4, 193.	iers in Physiology,	1.3	41
4255	Probing the Energy Landscape of Activation Gating of the Bacterial Potassium Channel Computational Biology, 2013, 9, e1003058.	KcsA. PLoS	1.5	31
4256	An Entropic Mechanism of Generating Selective Ion Binding in Macromolecules. PLoS G Biology, 2013, 9, e1002914.	Computational	1.5	12
4257	TASK-2: a K2P K+ channel with complex regulation and diverse physiological functions. Physiology, 2013, 4, 198.	Frontiers in	1.3	44

#	Article	IF	Citations
4258	A computational study of barium blockades in the KcsA potassium channel based on multi-ion potential of mean force calculations and free energy perturbation. Journal of General Physiology, 2013, 142, 451-463.	0.9	16
4259	Semisynthetic K ⁺ channels show that the constricted conformation of the selectivity filter is not the C-type inactivated state. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 15698-15703.	3.3	62
4260	Force fields for divalent cations based on single-ion and ion-pair properties. Journal of Chemical Physics, 2013, 138, 024505.	1.2	118
4261	Molecular evidence for dual pyrethroid-receptor sites on a mosquito sodium channel. Proceedings of the United States of America, 2013, 110, 11785-11790.	3.3	223
4262	Structural basis of ion permeation gating in Slo2.1 K+ channels. Journal of General Physiology, 2013, 142, 523-542.	0.9	23
4263	Nicotinic acetylcholine receptor and the structural basis of neuromuscular transmission: insights from <i>Torpedo</i> postsynaptic membranes. Quarterly Reviews of Biophysics, 2013, 46, 283-322.	2.4	114
4264	Coordination of K ⁺ Transporters in Neurospora: TRK1 Is Scarce and Constitutive, while HAK1 Is Abundant and Highly Regulated. Eukaryotic Cell, 2013, 12, 684-696.	3.4	17
4265	Investigations of the Contribution of a Putative Glycine Hinge to Ryanodine Receptor Channel Gating. Journal of Biological Chemistry, 2013, 288, 16671-16679.	1.6	12
4266	K+ Channelopathies (IKs, IKr, and Ito). , 2013, , 233-244.		0
4267	Using protein backbone mutagenesis to dissect the link between ion occupancy and C-type inactivation in K ⁺ channels. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 17886-17891.	3.3	31
4268	Fluorescence and FRET in Membranes. , 2013, , 779-784.		0
4269	The gating charge pathway of an epilepsy-associated potassium channel accommodates chemical ligands. Cell Research, 2013, 23, 1106-1118.	5.7	53
4270	Gold Nanotubes from Organic Scaffolds for Biomedical Applications. Materials Science Forum, 0, 754, 109-119.	0.3	0
4271	Advancing Methods for Biomolecular Crystallography. NATO Science for Peace and Security Series A: Chemistry and Biology, 2013, , .	0.5	3
4272	A Common Structural Component for �-Subunit Mediated Modulation of Slow Inactivation in Different KVChannels. Cellular Physiology and Biochemistry, 2013, 31, 968-980.	1.1	4
4273	Atomic-level simulation of current–voltage relationships in single-file ion channels. Journal of General Physiology, 2013, 141, 619-632.	0.9	98
4274	Molecular interactions involved in proton-dependent gating in KcsA potassium channels. Journal of General Physiology, 2013, 142, 613-624.	0.9	22
4275	Pore Helices Play a Dynamic Role as Integrators of Domain Motion during Kv11.1 Channel Inactivation Gating. Journal of Biological Chemistry, 2013, 288, 11482-11491.	1.6	20

		CITATION REPORT	
#	Article	IF	CITATIONS
4276	Sodium/Potassium Homeostasis in the Cell. Metal Ions in Life Sciences, 2013, 12, 41-67.	2.8	39
4277	Recent progress in robot-based systems for crystallography and their contribution to drug discovery. Expert Opinion on Drug Discovery, 2013, 8, 835-847.	2.5	19
4278	The Effect of Cell Size and Channel Density on Neuronal Information Encoding and Energy Effici Journal of Cerebral Blood Flow and Metabolism, 2013, 33, 1465-1473.	ency. 2.4	80
4279	Mechanism of ion permeation through a model channel: Roles of energetic and entropic contributions. Journal of Chemical Physics, 2013, 139, 165106.	1.2	9
4280	Non-Syndromic Hearing Loss and High-Throughput Strategies to Decipher Its Genetic Heteroge Journal of Otology, 2013, 8, 6-24.	neity. 0.4	18
4281	Multiple mechanisms underlying rectification in retinal cyclic nucleotide-gated (CNGA1) channe Physiological Reports, 2013, 1, e00148.	ls. 0.7	11
4282	Tools of our trade. Acta Physiologica, 2013, 208, 289-291.	1.8	0
4283	The Concise Guide to PHARMACOLOGY 2013/14: Ion Channels. British Journal of Pharmacology 1607-1651.	y, 2013, 170, 2.7	226
4285	Potassium ions in the cavity of a KcsA channel model. Physical Review E, 2013, 88, 062712.	0.8	6
4286	Filter gate closure inhibits ion but not water transport through potassium channels. Proceeding the National Academy of Sciences of the United States of America, 2013, 110, 10842-10847.	s of 3.3	61
4287	Decomposition of Slide Helix Contributions to ATP-dependent Inhibition of Kir6.2 Channels. Jou Biological Chemistry, 2013, 288, 23038-23049.	rnal of 1.6	12
4288	Two Conserved Arginine Residues from the SK3 Potassium Channel Outer Vestibule Control Selectivity of Recognition by Scorpion Toxins. Journal of Biological Chemistry, 2013, 288, 1254	4-12553. ^{1.6}	26
4289	Conserved Aromatic Residue Confers Cation Selectivity in Claudin-2 and Claudin-10b. Journal of Biological Chemistry, 2013, 288, 22790-22797.	1.6	20
4290	A uniquely adaptable pore is consistent with NALCN being an ion sensor. Channels, 2013, 7, 60	-68. 1.5	20
4291	Endoplasmic Reticulum Protein Quality Control Is Determined by Cooperative Interactions betw Hsp/c70 Protein and the CHIP E3 Ligase. Journal of Biological Chemistry, 2013, 288, 31069-310	veen 1.6 79.	55
4292	A Conserved Mechanism for Gating in an Ionotropic Glutamate Receptor. Journal of Biological Chemistry, 2013, 288, 18842-18852.	1.6	9
4293	ICA-105574 Interacts with a Common Binding Site to Elicit Opposite Effects on Inactivation Ga EAG and ERG Potassium Channels. Molecular Pharmacology, 2013, 83, 805-813.	ting of 1.0	21
4294	Shab K+channel slow inactivation. Channels, 2013, 7, 97-108.	1.5	10

#	Article	IF	CITATIONS
4295	3 Challenges and opportunities for optochemical genetics. , 2013, , 35-46.		1
4296	Allosteric coupling of the inner activation gate to the outer pore of a potassium channel. Scientific Reports, 2013, 3, 3025.	1.6	17
4297	The Open Gate Structure of the Membrane-Embedded KcsA Potassium Channel Viewed From the Cytoplasmic Side. Scientific Reports, 2013, 3, 1063.	1.6	28
4298	SILICON MULTIMODE PHOTONIC INTEGRATED DEVICES FOR ON-CHIP MODE-DIVISION-MULTIPLEXED OPTICAL INTERCONNECTS. Progress in Electromagnetics Research, 2013, 143, 773-819.	1.6	109
4299	Targeting Host Store-Operated Ca ²⁺ Release to Attenuate Viral Infections. Current Topics in Medicinal Chemistry, 2013, 13, 1916-1932.	1.0	15
4300	Fluorescent Pore-Former Suggests an Approach for the Enhancement of Antibiotic Efficacy. Biosensors Journal, 2013, 02, .	0.4	0
4301	Identification of the Molecular Site of Ivabradine Binding to HCN4 Channels. PLoS ONE, 2013, 8, e53132.	1.1	51
4302	lon Concentration-Dependent Ion Conduction Mechanism of a Voltage-Sensitive Potassium Channel. PLoS ONE, 2013, 8, e56342.	1.1	13
4303	S6 Peptide Derived from KvAP Channel Shows Cooperativity in Gating on Bilayer Lipid Membrane. PLoS ONE, 2013, 8, e78845.	1.1	8
4304	Computational Studies of Marine Toxins Targeting Ion Channels. Marine Drugs, 2013, 11, 848-869.	2.2	26
4305	How "Pharmacoresistant―is Cav2.3, the Major Component of Voltage-Gated R-type Ca2+ Channels?. Pharmaceuticals, 2013, 6, 759-776.	1.7	14
4306	Antiarrhythmic Drugs. , 2013, , 426-444.		1
4307	Protein Crystallography. , 2013, , .		0
4308	Ion Selectivity Mechanism of Escherichia Coli OmpF Porin: a Molecular Dynamics Simulation/ free Energy Calculation Study. Journal of Computer Chemistry Japan, 2014, 13, 278-291.	0.0	0
4309	Structural and Molecular Bases of Cardiac Inward Rectifier Potassium Channel Function. , 2014, , 33-41.		3
4310	Structural Determinants and Biophysical Properties of hERG1 Channel Gating. , 2014, , 121-128.		0
4311	Intracellular Gold Nanoparticles Increase Neuronal Excitability and Aggravate Seizure Activity in the Mouse Brain. PLoS ONE, 2014, 9, e91360.	1.1	54
4312	Molecular Dynamics Study of Binding of µ-Conotoxin GIIIA to the Voltage-Gated Sodium Channel Nav1.4. PLoS ONE, 2014, 9, e105300.	1.1	26

	Сітатіо	CITATION REPORT	
#	Article	IF	Citations
4313	Characterization of Structure and Function of ZS-9, a K+ Selective Ion Trap. PLoS ONE, 2014, 9, e114686.	1.1	140
4314	Biology of the KCNQ1 Potassium Channel. New Journal of Science, 2014, 2014, 1-26.	1.0	80
4315	Biophysics, pathophysiology, and pharmacology of ion channel gating pores. Frontiers in Pharmacology, 2014, 5, 53.	1.6	74
4316	Overall Transport Capabilities of Bacillus subtilis. , 2014, , 111-128.		7
4317	Molecular Modelling-Based Investigations of a Mutant Protein in Patients with Hearing Loss. , 0, , .		0
4319	A single amino acid gates the KcsA channel. Biochemical and Biophysical Research Communications, 2014, 450, 1537-1540.	1.0	6
4320	TRPV channel-mediated calcium transients in nociceptor neurons are dispensable for avoidance behaviour. Nature Communications, 2014, 5, 4734.	5.8	17
4321	Effects of potassium doping on solution processed kesterite Cu2ZnSnS4 thin film solar cells. Applied Physics Letters, 2014, 105, .	1.5	101
4322	The Voltage Sensor Module in Sodium Channels. Handbook of Experimental Pharmacology, 2014, 221, 7-31.	0.9	12
4323	Folding energetics and oligomerization of polytopic α-helical transmembrane proteins. Archives of Biochemistry and Biophysics, 2014, 564, 281-296.	1.4	27
4324	The conserved potassium channel filter can have distinct ion binding profiles: Structural analysis of rubidium, cesium, and barium binding in NaK2K. Journal of General Physiology, 2014, 144, 181-192.	0.9	16
4325	Individual I _{Ks} channels at the surface of mammalian cells contain two KCNE1 accessory subunits. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, E1438-46.	3.3	72
4326	Minimization of extracellular space as a driving force in prokaryote association and the origin of eukaryotes. Biology Direct, 2014, 9, 24.	1.9	3
4327	Structural Biology of TRP Channels. Handbook of Experimental Pharmacology, 2014, 223, 963-990.	0.9	66
4328	Probing "ambivalent―snug-fit sites in the KcsA potassium channel using three-dimensional reference interaction site model (3D-RISM) theory. Pure and Applied Chemistry, 2014, 86, 97-104.	0.9	12
4329	Inward rectifiers and their regulation by endogenous polyamines. Frontiers in Physiology, 2014, 5, 325.	1.3	63
4330	Radial symmetry in a chimeric glutamate receptor pore. Nature Communications, 2014, 5, 3349.	5.8	16
4331	Biophysics of Voltage-Gated Ion Channels. , 2014, , 377-407.		4

ARTICLE IF CITATIONS # Voltage-Sensor Transitions of the Inward-Rectifying K+ Channel KAT1 Indicate a Latching Mechanism 4332 2.3 21 Biased by Hydration within the Voltage Sensor Â. Plant Physiology, 2014, 166, 960-975. Viruses infecting marine picoplancton encode functional potassium ion channels. Virology, 2014, 1.1 466-467, 103-111. Molecular determinants of tetramerization in the KcsA cytoplasmic domain. Protein Science, 2014, 23, 4334 3.18 1403-1416. Potassium channels in cell cycle and cell proliferation. Philosophical Transactions of the Royal 1.8 305 Society B: Biological Sciences, 2014, 369, 20130094. Paxilline inhibits BK channels by an almost exclusively closed-channel block mechanism. Journal of 4336 0.9 117 General Physiology, 2014, 144, 415-440. Transmembrane Helix Straightening and Buckling Underlies Activation of Mechanosensitive and Thermosensitive K2P Channels. Neuron, 2014, 84, 1198-1212. 3.8 109 lonic size effects to molecular solvation energy and to ion current across a channel resulted from 4339 1.2 22 the nonuniform size-modified PNP equations. Journal of Chemical Physics, 2014, 140, 174102. Structure and Function of the ThermoTRP Channel Pore. Current Topics in Membranes, 2014, 74, 4340 0.5 29 233-257. Reconciling Structural and Thermodynamic Predictions Using All-Atom and Coarse-Grain Force Fields: 4341 The Case of Charged Oligo-Arginine Translocation into DMPC Bilayers. Journal of Physical Chemistry 1.2 14 B, 2014, 118, 11973-11992. The physiology of channelâ€mediated K⁺ acquisition in roots of higher plants. Physiologia 4342 2.6 24 Plantarum, 2014, 151, 305-312. Early onset severe pulmonary arterial hypertension with †two-hit' digenic mutations in both BMPR2 4343 0.8 33 and KCNA5 genes. International Journal of Cardiology, 2014, 177, e167-e169. Quantifying resource use complementarity in grassland species: A comparison of different nutrient 4344 0.5 tracers. Pedobiologia, 2014, 57, 251-256. Self-Consistent Approach to Global Charge Neutrality in Electrokinetics: A Surface Potential Trap 4345 2.8 14 Model. Physical Review X, 2014, 4, . Ionic interactions of Ba2+ blockades in the MthK K+ channel. Journal of General Physiology, 2014, 144, 4346 193-200. Large-scale mutational analysis of Kv11.1 reveals molecular insights into type 2 long QT syndrome. 4347 142 5.8 Nature Communications, 2014, 5, 5535. Bacterial Sodium Channels: Models for Eukaryotic Sodium and Calcium Channels. Handbook of 4348 Experimental Pharmacology, 2014, 221, 269-291. Computational approaches for designing potent and selective analogs of peptide toxins as novel 4349 1.1 26 therapeutics. Future Medicinal Chemistry, 2014, 6, 1645-1658. Modelling the effect of a GHz electric field on the dynamics of K⁺ions in KcsA potassium channel. Molecular Simulation, 2014, 40, 399-407.

		CITATION RE	EPORT	
#	Article		IF	Citations
4351	Ion Channels in the Cell Membrane: Structure, Function, and Modeling. , 2014, , 71-81.			0
4352	Potassium channel genes and benign familial neonatal epilepsy. Progress in Brain Resear 17-53.	ch, 2014, 213,	0.9	89
4353	Concerted All-or-none Subunit Interactions Mediate Slow Deactivation of Human ether-Ã-go-go-related Gene K+ Channels. Journal of Biological Chemistry, 2014, 289, 234	128-23436.	1.6	13
4354	Conformational Mechanisms of Signaling Bias of Ion Channels. , 2014, , 173-207.			3
4355	Structure of Urea Transporters. Sub-Cellular Biochemistry, 2014, 73, 65-78.		1.0	15
4356	Riemann surface dynamics of periodic non-Hermitian Hamiltonians. Journal of Physics A: and Theoretical, 2014, 47, 085001.	Mathematical	0.7	2
4357	A fully genetically encoded protein architecture for optical control of peptide ligand con- Nature Communications, 2014, 5, 3019.	centration.	5.8	55
4358	lsothermal titration calorimetry in membrane protein research. Journal of Pharmaceutica Biomedical Analysis, 2014, 87, 313-325.	l and	1.4	34
4359	Membrane channels as integrators of G-protein-mediated signaling. Biochimica Et Bioph Biomembranes, 2014, 1838, 521-531.	ysica Acta -	1.4	26
4360	Competition among Metal Ions for Protein Binding Sites: Determinants of Metal Ion Sele Proteins. Chemical Reviews, 2014, 114, 538-556.	ectivity in	23.0	329
4361	Oxidative Modulation of Voltage-Gated Potassium Channels. Antioxidants and Redox Sig 21, 933-952.	ınaling, 2014,	2.5	60
4362	The fall and rise of pharmacology – (Re-)defining the discipline?. Biochemical Pharmac 4-24.	ology, 2014, 87,	2.0	28
4363	Solid state NMR: The essential technology for helical membrane protein structural chara Journal of Magnetic Resonance, 2014, 239, 100-109.	cterization.	1.2	31
4364	Ion channel stability of Gramicidin A in lipid bilayers: Effect of hydrophobic mismatch. Bio Biophysica Acta - Biomembranes, 2014, 1838, 328-338.	ochimica Et	1.4	23
4365	Biophysical Highlights from 54 Years of Macromolecular Crystallography. Biophysical Jou 106, 510-525.	ırnal, 2014,	0.2	10
4366	Methods for quantification of pore–voltage sensor interaction in CaV1.2. Pflugers Arc Journal of Physiology, 2014, 466, 265-274.	hiv European	1.3	4
4367	Fundamental water and salt transport properties of polymeric materials. Progress in Poly 2014, 39, 1-42.	mer Science,	11.8	597
4368	Water wettability in nanoconfined environment. Science China: Physics, Mechanics and 2014, 57, 836-843.	Astronomy,	2.0	10

#	Article	IF	CITATIONS
4369	Molecular biology of insect sodium channels and pyrethroid resistance. Insect Biochemistry and Molecular Biology, 2014, 50, 1-17.	1.2	361
4370	A KcsA/MloK1 Chimeric Ion Channel Has Lipid-dependent Ligand-binding Energetics. Journal of Biological Chemistry, 2014, 289, 9535-9546.	1.6	12
4371	Regulation of Ion Channel Function by the Host Lipid Bilayer Examined by a Stopped-Flow Spectrofluorometric Assay. Biophysical Journal, 2014, 106, 1070-1078.	0.2	33
4372	A conservative finite difference scheme for Poisson–Nernst–Planck equations. Journal of Computational Electronics, 2014, 13, 235-249.	1.3	49
4373	The permeation of potassium and chloride ions through nanotubes: a molecular simulation study. Monatshefte Für Chemie, 2014, 145, 881-890.	0.9	23
4374	Structure–Activity Relationship of a Highly Selective Peptidyl Inhibitor of Kv1.3 Voltage-Gated K+-Channel from Scorpion (B. sindicus) Venom. International Journal of Peptide Research and Therapeutics, 2014, 20, 19-32.	0.9	7
4375	The excitation–contraction coupling mechanism in skeletal muscle. Biophysical Reviews, 2014, 6, 133-160.	1.5	118
4376	Sodium channel selectivity and conduction: Prokaryotes have devised their own molecular strategy. Journal of General Physiology, 2014, 143, 157-171.	0.9	52
4377	A brief history of macromolecular crystallography, illustrated by a family tree and its <scp>N</scp> obel fruits. FEBS Journal, 2014, 281, 3985-4009.	2.2	83
4378	Mitochondrial Channels: Ion Fluxes and More. Physiological Reviews, 2014, 94, 519-608.	13.1	281
4380	Saxitoxin. Angewandte Chemie - International Edition, 2014, 53, 5760-5784.	7.2	124
4381	T-type Channels Become Highly Permeable to Sodium Ions Using an Alternative Extracellular Turret Region (S5-P) Outside the Selectivity Filter. Journal of Biological Chemistry, 2014, 289, 11952-11969.	1.6	29
4382	Silencing Neurons with Light. Science, 2014, 344, 369-370.	6.0	5
4383	Advancing simulations of biological materials: applications of coarse-grained models on graphics processing unit hardware. Molecular Simulation, 2014, 40, 802-820.	0.9	3
4385	Determinants of pore folding in potassium channel biogenesis. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 4620-4625.	3.3	16
4386	How Simulations Reveal Dynamics, Disorder, and the Energy Landscapes of Biomolecular Function. Israel Journal of Chemistry, 2014, 54, 1093-1107.	1.0	3
4387	Cav3 T-type channels: regulators for gating, membrane expression, and cation selectivity. Pflugers Archiv European Journal of Physiology, 2014, 466, 645-660.	1.3	27
4388	Permeation Redux: Thermodynamics and Kinetics of Ion Movement through Potassium Channels. Biophysical Journal, 2014, 106, 1859-1863.	0.2	30

#	Article	IF	CITATIONS
4389	Transmembrane allosteric coupling of the gates in a potassium channel. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 185-190.	3.3	91
4390	Ruled surface underlying KcsA potassium channels. Soft Matter, 2014, 10, 540-543.	1.2	1
4391	Potassium Channels: Structures, Diseases, and Modulators. Chemical Biology and Drug Design, 2014, 83, 1-26.	1.5	77
4392	Lipid modulation of ion channels through specific binding sites. Biochimica Et Biophysica Acta - Biomembranes, 2014, 1838, 1560-1567.	1.4	63
4393	A comparison of the electromechanical properties of structurally diverse proteins by molecular dynamics simulation. Journal of Biomolecular Structure and Dynamics, 2014, 32, 1734-1741.	2.0	0
4394	The projection structure of Kch, a putative potassium channel in Escherichia coli, by electron crystallography. Biochimica Et Biophysica Acta - Biomembranes, 2014, 1838, 237-243.	1.4	6
4395	The ryanodine receptor store-sensing gate controls Ca2+ waves and Ca2+-triggered arrhythmias. Nature Medicine, 2014, 20, 184-192.	15.2	172
4396	L-Type Ca _V 1.2 Calcium Channels: From In Vitro Findings to In Vivo Function. Physiological Reviews, 2014, 94, 303-326.	13.1	275
4397	Epithelial sodium channel (ENaC) and the control of blood pressure. Current Opinion in Pharmacology, 2014, 15, 33-46.	1.7	97
4398	Functional dynamics of cell surface membrane proteins. Journal of Magnetic Resonance, 2014, 241, 86-96.	1.2	11
4399	Gating of Thermally Activated Channels. Current Topics in Membranes, 2014, 74, 51-87.	0.5	35
4400	A Glimpse of Structural Biology through X-Ray Crystallography. Cell, 2014, 159, 995-1014.	13.5	227
4401	The role of spatial dispersion of the dielectric constant of spherical water cavity in the lowering of the free energy of ion transfer to the cavity. Russian Journal of Electrochemistry, 2014, 50, 1090-1094.	0.3	4
4402	Selecting Ions by Size in a Calcium Channel: The Ryanodine Receptor Case Study. Biophysical Journal, 2014, 107, 2263-2273.	0.2	27
4403	Gating of the Kir2.1 Channel at the Bundle Crossing Region by Intracellular Spermine and Other Cations. Journal of Cellular Physiology, 2014, 229, 1703-1721.	2.0	4
4404	Functional architecture of the CFTR chloride channel. Molecular Membrane Biology, 2014, 31, 1-16.	2.0	46
4405	BK channel opening involves side-chain reorientation of multiple deep-pore residues. Proceedings of the United States of America, 2014, 111, E79-88.	3.3	43
4406	Capturing distinct KCNQ2 channel resting states by metal ion bridges in the voltage-sensor domain. Journal of General Physiology, 2014, 144, 513-527.	0.9	11

ARTICLE IF CITATIONS From Brownian Dynamics to Markov Chain: An Ion Channel Example. SIAM Journal on Applied 4407 0.8 7 Mathematics, 2014, 74, 208-235. X-ray Crystallography: One Century of Nobel Prizes. Journal of Chemical Education, 2014, 91, 2009-2012. 4408 1.1 Insights into the Gating Mechanism of the Ryanodine-Modified Human Cardiac 4409 1.0 5 Ca²⁺-Release Channel (Ryanodine Receptor 2). Molecular Pharmacology, 2014, 86, 318-329. The SARS Coronavirus 3a protein binds calcium in its cytoplasmic domain. Virus Research, 2014, 191, 4410 1.1 180-183. Domain and Interdomain Energetics Underlying Gating in Shaker -Type K V Channels. Biophysical 4411 0.2 9 Journal, 2014, 107, 1841-1852. Ion permeation in K ⁺ channels occurs by direct Coulomb knock-on. Science, 2014, 346, 6.0 271 352-355. Structure and selectivity in bestrophin ion channels. Science, 2014, 346, 355-359. 4413 6.0 133 Anion transfer across "anion channels―at the liquid/liquid interface modified by anion-exchange 4414 1.7 membrane. RSC Advances, 2014, 4, 57035-57040. Quantum model for a periodically driven selectivity filter in a K+ion channel. Journal of Physics B: 4415 0.6 6 Atomic, Molecular and Optical Physics, 2014, 47, 225503. A mechanical nanogate based on a carbon nanotube for reversible control of ion conduction. 4416 2.8 Nanoscale, 2014, 6, 3686-3694. The Os-AKT1 Channel Is Critical for K⁺ Uptake in Rice Roots and Is Modulated by the Rice 4417 221 3.1CBL1-CIPK23 Complex. Plant Cell, 2014, 26, 3387-3402. Altered and dynamic ion selectivity of K+ channels in cell development and excitability. Trends in 4.0 29 Pharmacological Sciences, 2014, 35, 461-469. Potassium ions line up. Science, 2014, 346, 303-303. 4419 6.0 23 Biological Macromolecules at Interfaces Probed by Chiral Vibrational Sum Frequency Generation 4420 23.0 224 Spectroscopy. Chemical Reviews, 2014, 114, 8471-8498. Molecular Strategies to Achieve Selective Conductance in NaK Channel Variants. Journal of Physical 4421 1.2 11 Chemistry B, 2014, 118, 2041-2049. Structures of KcsA in Complex with Symmetrical Quaternary Ammonium Compounds Reveal a 4422 1.2 54 Hydrophobic Binding Site. Biochemistry, 2014, 53, 5365-5373. Toward a high-resolution structure of IP3R channel. Cell Calcium, 2014, 56, 125-132. 4423 1.1 37 Controlled thermal oxidative crosslinking of polymers of intrinsic microporosity towards tunable 4424 5.8 molecular sieve membranes. Nature Communications, 2014, 5, 4813.

#	Article	IF	CITATIONS
4425	A Bacterial Iron Exporter for Maintenance of Iron Homeostasis. Journal of Biological Chemistry, 2014, 289, 16498-16507.	1.6	28
4426	Real-Time Monitoring of Membrane-Protein Reconstitution by Isothermal Titration Calorimetry. Analytical Chemistry, 2014, 86, 920-927.	3.2	27
4427	Revisiting Secondary Structures in NCA Polymerization: Influences on the Analysis of Protected Polylysines. Macromolecules, 2014, 47, 928-936.	2.2	81
4428	Probing Structure and Function of Ion Channels Using Limited Proteolysis and Microfluidics. Journal of the American Chemical Society, 2014, 136, 14875-14882.	6.6	3
4429	Recent progress on the structure and function of the TrkH/KtrB ion channel. Current Opinion in Structural Biology, 2014, 27, 95-101.	2.6	21
4430	Counterion-Assisted Cation Transport in a Biological Calcium Channel. Journal of Physical Chemistry B, 2014, 118, 9668-9676.	1.2	15
4431	Big Potassium (BK) ion channels in biology, disease and possible targets for cancer immunotherapy. International Immunopharmacology, 2014, 22, 427-443.	1.7	74
4432	Comparative Normal/Failing Rat Myocardium Cell Membrane Chromatographic Analysis System for Screening Specific Components That Counteract Doxorubicin-Induced Heart Failure from <i>Acontium carmichaeli</i> . Analytical Chemistry, 2014, 86, 4748-4757.	3.2	87
4433	General rules for the arrangements and gating motions of pore-lining helices in homomeric ion channels. Nature Communications, 2014, 5, 4641.	5.8	15
4434	Folding similarity of the outer pore region in prokaryotic and eukaryotic sodium channels revealed by docking of conotoxins GIIIA, PIIIA, and KIIIA in a NavAb-based model of Nav1.4. Journal of General Physiology, 2014, 144, 231-244.	0.9	35
4435	The crystal structure of ferritin from Chlorobium tepidum reveals a new conformation of the 4-fold channel for this protein family. Biochimie, 2014, 106, 39-47.	1.3	13
4436	Ligand-induced structural changes in the cyclic nucleotide-modulated potassium channel MloK1. Nature Communications, 2014, 5, 3106.	5.8	59
4437	Hydration structure of Na ⁺ and K ⁺ from <i>ab initio</i> molecular dynamics based on modern density functional theory. Molecular Physics, 2014, 112, 1448-1456.	0.8	37
4438	Dipole-Mediated Rectification of Intramolecular Photoinduced Charge Separation and Charge Recombination. Journal of the American Chemical Society, 2014, 136, 12966-12973.	6.6	48
4439	Bringing Dynamic Molecular Machines into Focus by Methyl-TROSY NMR. Annual Review of Biochemistry, 2014, 83, 291-315.	5.0	200
4440	Feeling the hidden mechanical forces in lipid bilayer is an original sense. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 7898-7905.	3.3	236
4441	Biomimetic and bioinspired membranes: Preparation and application. Progress in Polymer Science, 2014, 39, 1668-1720.	11.8	174
4442	Conductance Simulation of the Purinergic P2X ₂ , P2X ₄ , and P2X ₇ Ionic Channels Using a Combined Brownian Dynamics and Molecular Dynamics Approach. Journal of Physical Chemistry B, 2014, 118, 9119-9127.	1.2	7

#	Article	IF	CITATIONS
4443	Na ⁺ and K ⁺ ion selectivity by size-controlled biomimetic graphene nanopores. Nanoscale, 2014, 6, 10666-10672.	2.8	89
4444	Evidence for Follicle-stimulating Hormone Receptor as a Functional Trimer. Journal of Biological Chemistry, 2014, 289, 14273-14282.	1.6	98
4445	NMDA receptor structures reveal subunit arrangement and pore architecture. Nature, 2014, 511, 191-197.	13.7	441
4446	Mammalian Transient Receptor Potential (TRP) Cation Channels. Handbook of Experimental Pharmacology, 2014, , .	0.9	22
4447	Quantum effects in the understanding of consciousness. Journal of Integrative Neuroscience, 2014, 13, 229-252.	0.8	41
4448	Solution NMR Structure and Functional Analysis of the Integral Membrane Protein YgaP from Escherichia coli. Journal of Biological Chemistry, 2014, 289, 23482-23503.	1.6	16
4449	Fishing for holes in transporters: How protons breach the Na/K pump security gates. Journal of General Physiology, 2014, 143, 437-441.	0.9	3
4450	Probing α -3 10 Transitions in a Voltage-Sensing S4 Helix. Biophysical Journal, 2014, 107, 1117-1128.	0.2	23
4451	Assessing hERG Pore Models As Templates for Drug Docking Using Published Experimental Constraints: The Inactivated State in the Context of Drug Block. Journal of Chemical Information and Modeling, 2014, 54, 601-612.	2.5	56
4452	Quantitative Analysis of the Water Occupancy around the Selectivity Filter of a K ⁺ Channel in Different Gating Modes. Journal of the American Chemical Society, 2014, 136, 2000-2007.	6.6	70
4453	An ESIPT fluorescent probe sensitive to protein $\hat{I}\pm$ helix structures. Organic and Biomolecular Chemistry, 2014, 12, 5250-5259.	1.5	33
4454	P4 Pathophysiology of anoctaminopathy (LGMD2L). Neuromuscular Disorders, 2014, 24, S8.	0.3	0
4455	Proline Scan of the hERG Channel S6 Helix Reveals the Location of the Intracellular Pore Gate. Biophysical Journal, 2014, 106, 1057-1069.	0.2	32
4456	The twins K+ and Na+ in plants. Journal of Plant Physiology, 2014, 171, 723-731.	1.6	216
4457	K+ uptake in plant roots. The systems involved, their regulation and parallels in other organisms. Journal of Plant Physiology, 2014, 171, 688-695.	1.6	178
4458	A Simple Atomic-Level Hydrophobicity Scale Reveals Protein Interfacial Structure. Journal of Molecular Biology, 2014, 426, 484-498.	2.0	107
4459	Modeling ion channels: Past, present, and future. Journal of General Physiology, 2014, 144, 7-26.	0.9	53
4460	Pain enters through the side door. Nature Chemical Biology, 2014, 10, 171-172.	3.9	2

#	Article	IF	Citations
4461	Pore Dynamics and Conductance of RyR1 Transmembrane Domain. Biophysical Journal, 2014, 106, 2375-2384.	0.2	20
4462	Pseudo painting/air bubble technique for planar lipid bilayers. Journal of Neuroscience Methods, 2014, 233, 13-17.	1.3	23
4463	Structure of a Prokaryotic Sodium Channel Pore Reveals Essential Gating Elements and an Outer Ion Binding Site Common to Eukaryotic Channels. Journal of Molecular Biology, 2014, 426, 467-483.	2.0	129
4464	Viral potassium channels as a robust model system for studies of membrane–protein interaction. Biochimica Et Biophysica Acta - Biomembranes, 2014, 1838, 1096-1103.	1.4	28
4466	Structures of membrane proteins. Nature, 2014, 511, 21-21.	13.7	2
4468	Molecular Properties of Ion Channels. , 2014, , 323-348.		3
4470	Computational Insights of the Interaction among Sea Anemones Neurotoxins and Kv1.3 Channel. Bioinformatics and Biology Insights, 2014, 8, BBI.S13403.	1.0	3
4473	Investigation of Ion Channel Structure Using Fluorescence Spectroscopy. , 2015, , 113-133.		2
4475	Utilizing Markov Chains to Model Ion Channel Sequence Variation and Kinetics. , 2015, , 123-132.		0
4478	Electricity, Nerves, Batteries: A Short History. , 2015, , 3-12.		0
4480	Ion Selectivity and Conductance. , 2015, , 13-23.		2
4481	Mechanism of G-Protein Regulation of K+ Channels. , 2015, , 525-538.		0
4482	Ion Channels of the Heart. , 2015, , 597-614.		0
4484	Functional diversity of the superfamily of K+ transporters to meet various requirements. Biological Chemistry, 2015, 396, 1003-1014.	1.2	42
4485	Dendritic Domains with Hexagonal Symmetry Formed by Xâ€Shaped Bolapolyphiles in Lipid Membranes. Chemistry - A European Journal, 2015, 21, 8840-8850.	1.7	15
4486	The family of K _{2P} channels: salient structural and functional properties. Journal of Physiology, 2015, 593, 2587-2603.	1.3	178
4488	Development of the field of structural physiology. Proceedings of the Japan Academy Series B: Physical and Biological Sciences, 2015, 91, 447-468.	1.6	4
4489	Numerical methods for a Poisson-Nernst-Planck-Fermi model of biological ion channels. Physical Review E, 2015, 92, 012711.	0.8	29

# 4490	ARTICLE Resin-acid derivatives as potent electrostatic openers of voltage-gated K channels and suppressors of neuronal excitability. Scientific Reports, 2015, 5, 13278.	IF 1.6	CITATIONS
4492	Screening for Voltage-Gated Sodium Channel Interacting Peptides. Scientific Reports, 2015, 4, 4569.	1.6	7
4493	Toxin acidic residue evolutionary function-guided design of de novo peptide drugs for the immunotherapeutic target, the Kv1.3 channel. Scientific Reports, 2015, 5, 9881.	1.6	26
4494	Improving the description of interactions between Ca ²⁺ and protein carboxylate groups, including 13-carboxyglutamic acid: revised CHARMM22* parameters. RSC Advances, 2015, 5, 67820-67828.	1.7	14
4495	Mechanism for attenuated outward conductance induced by mutations in the cytoplasmic pore of Kir2.1 channels. Scientific Reports, 2015, 5, 18404.	1.6	7
4496	A single conserved basic residue in the potassium channel filter region controls KCNQ1 insensitivity toward scorpion toxins. Biochemistry and Biophysics Reports, 2015, 3, 62-67.	0.7	1
4497	Cationâ€Transporting Peptides: Scaffolds for Functionalized Pores?. Chemistry - A European Journal, 2015, 21, 10179-10184.	1.7	15
4498	Poring Over Two-Pore Channel Pore Mutants. Messenger (Los Angeles, Calif: Print), 2015, 4, 46-52.	0.3	5
4499	The Legacy of Cornell Accelerators. Annual Review of Nuclear and Particle Science, 2015, 65, 1-23.	3.5	2
4500	Hierarchical domainâ€motion analysis of conformational changes in sarcoplasmic reticulum Ca ²⁺ â€ATPase. Proteins: Structure, Function and Bioinformatics, 2015, 83, 746-756.	1.5	7
4501	Structure and gating of CLC channels and exchangers. Journal of Physiology, 2015, 593, 4129-4138.	1.3	65
4502	Nedd4-2 regulation of voltage-gated ion channels: an update on structure–function relationships and the pathophysiological consequences of dysfunction. Journal of Receptor, Ligand and Channel Research, 2015, , 53.	0.7	2
4503	Computational Studies of Venom Peptides Targeting Potassium Channels. Toxins, 2015, 7, 5194-5211.	1.5	15
4504	A Double Emulsion-Based, Plastic-Glass Hybrid Microfluidic Platform for Protein Crystallization. Micromachines, 2015, 6, 1629-1644.	1.4	4
4505	Molecular pathophysiology and pharmacology of the voltage-sensing module of neuronal ion channels. Frontiers in Cellular Neuroscience, 2015, 9, 259.	1.8	13
4506	Oxidative Stress and Maxi Calcium-Activated Potassium (BK) Channels. Biomolecules, 2015, 5, 1870-1911.	1.8	47
4507	Structural Refinement of Proteins by Restrained Molecular Dynamics Simulations with Non-interacting Molecular Fragments. PLoS Computational Biology, 2015, 11, e1004368.	1.5	26
4508	Cation Selectivity in Biological Cation Channels Using Experimental Structural Information and Statistical Mechanical Simulation. PLoS ONE, 2015, 10, e0138679.	1.1	1

#	Article	IF	CITATIONS
4509	Functional Characterization of Cnidarian HCN Channels Points to an Early Evolution of Ih. PLoS ONE, 2015, 10, e0142730.	1.1	16
4510	The Hydrophobic Effect Contributes to the Closed State of a Simplified Ion Channel through a Conserved Hydrophobic Patch at the Pore-Helix Crossing. Frontiers in Pharmacology, 2015, 6, 284.	1.6	12
4511	Selectivity filters and cysteine-rich extracellular loops in voltage-gated sodium, calcium, and NALCN channels. Frontiers in Physiology, 2015, 6, 153.	1.3	47
4512	Salinity tolerance in plants. Quantitative approach to ion transport starting from halophytes and stepping to genetic and protein engineering for manipulating ion fluxes. Frontiers in Plant Science, 2015, 6, 873.	1.7	119
4513	Direct Estimation of Ca _V 1.2 Gating Parameters: Quantification of Voltage Sensor – Pore Transductions and their Modulation by FLP 64176. Current Molecular Pharmacology, 2015, 8, 87-94.	0.7	1
4514	Vitamin A Transport Mechanism of the Multitransmembrane Cell-Surface Receptor STRA6. Membranes, 2015, 5, 425-453.	1.4	55
4515	Fast Atomic Charge Calculation for Implementation into a Polarizable Force Field and Application to an Ion Channel Protein. Journal of Chemistry, 2015, 2015, 1-14.	0.9	6
4518	The staphylococcal alpha-toxin and leukotoxins. , 2015, , 739-772.		1
4519	Solvation structure and dynamics of K+ in aqueous ammonia solution: Insights from an ONIOM-XS MD simulation. Chemical Physics Letters, 2015, 633, 152-157.	1.2	11
4520	Voltage Sensing in Membranes: From Macroscopic Currents to Molecular Motions. Journal of Membrane Biology, 2015, 248, 419-430.	1.0	18
4521	Proton Transfers in a Channelrhodopsin-1 Studied by Fourier Transform Infrared (FTIR) Difference Spectroscopy and Site-directed Mutagenesis. Journal of Biological Chemistry, 2015, 290, 12719-12730.	1.6	20
4522	Action potential initiation in a multi-compartmental model with cooperatively gating Na channels in the axon initial segment. Journal of Computational Neuroscience, 2015, 39, 63-75.	0.6	10
4523	Molecular dynamics simulation of ion separation and water transport through boron nitride nanotubes. Desalination and Water Treatment, 2015, 56, 1090-1098.	1.0	10
4524	The contingency of solitary wave spreading in nonlinear and disseminative one dimensional cylindrical bio-membrane. , 2015, , .		0
4525	Designer and natural peptide toxin blockers of the KcsA potassium channel identified by phage display. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, E7013-21.	3.3	22
4526	Binding Enthalpy Calculations for a Neutral Host–Guest Pair Yield Widely Divergent Salt Effects across Water Models. Journal of Chemical Theory and Computation, 2015, 11, 4555-4564.	2.3	36
4527	Pore Hydration States of KcsA Potassium Channels in Membranes. Journal of Biological Chemistry, 2015, 290, 26765-26775.	1.6	11
4528	Spin Labeling of Potassium Channels. Methods in Enzymology, 2015, 564, 389-400.	0.4	Ο

#	Article	IF	CITATIONS
4529	Coulomb blockade model of permeation and selectivity in biological ion channels. New Journal of Physics, 2015, 17, 083021.	1.2	44
4530	A Duo of Potassium-Responsive Histidine Kinases Govern the Multicellular Destiny of Bacillus subtilis. MBio, 2015, 6, e00581.	1.8	89
4531	Scorpion toxins prefer salt solutions. Journal of Molecular Modeling, 2015, 21, 287.	0.8	2
4532	Selectivity of a Singly Permeating Ion in Nonselective NaK Channel: Combined QM and MD Based Investigations. Journal of Physical Chemistry B, 2015, 119, 12783-12797.	1.2	18
4533	Transmission Engineering as a Route to Subthermal Switching. IEEE Journal of the Electron Devices Society, 2015, 3, 135-143.	1.2	5
4534	Potassium Channels and Signal Transduction Pathways in Neurons. Neurophysiology, 2015, 47, 71-76.	0.2	1
4535	Structural implications of weak Ca2+ block in Drosophila cyclic nucleotide–gated channels. Journal of General Physiology, 2015, 146, 255-263.	0.9	1
4536	Diversity of Potassium Channel Ligands: Focus on Scorpion Toxins. Biochemistry (Moscow), 2015, 80, 1764-1799.	0.7	57
4537	Glutamate receptor pores. Journal of Physiology, 2015, 593, 49-59.	1.3	27
4538	The Mechanism of Flecainide Action in CPVT Does Not Involve a Direct Effect on RyR2. Circulation Research, 2015, 116, 1324-1335.	2.0	87
4539	The effect of K-Ion on the electrochemical performance of spinel LiMn2O4. Electronic Materials Letters, 2015, 11, 138-142.	1.0	6
4540	Ion Channels Across Cell Membranes. , 2015, , 81-130.		1
4541	Membrane proteins — do we catch up with the breathless pace of soluble protein structural biology?. Biochimica Et Biophysica Acta - General Subjects, 2015, 1850, 447-448.	1.1	12
4542	Evolution of voltage-gated ion channels at the emergence of Metazoa. Journal of Experimental Biology, 2015, 218, 515-525.	0.8	109
4543	Free RCK Arrangement in Kch, a Putative Escherichia coli Potassium Channel, as Suggested by Electron Crystallography. Structure, 2015, 23, 199-205.	1.6	3
4544	A computational design approach for virtual screening of peptide interactions across K + channel families. Computational and Structural Biotechnology Journal, 2015, 13, 85-94.	1.9	14
4545	lonotropic glutamate receptors: alive and kicking. Journal of Physiology, 2015, 593, 25-27.	1.3	0
4546	The differential contribution of GluN1 and GluN2 to the gating operation of the NMDA receptor channel. Pflugers Archiv European Journal of Physiology, 2015, 467, 1899-1917.	1.3	12

#	Article	IF	CITATIONS
4547	Insights into the Structures of the Gas-Phase Hydrated Cations M ⁺ (H ₂ O) _{<i>n</i>} Ar (M = Li, Na, K, Rb, and Cs; <i>n</i> = 3–5) Using Infrared Photodissociation Spectroscopy and Thermodynamic Analysis. Journal of Physical Chemistry A, 2015, 119, 2037-2051.	1.1	33
4548	Hydrogen-Bonded Water Molecules in the M2 Channel of the Influenza A Virus Guide the Binding Preferences of Ammonium-Based Inhibitors. Journal of Physical Chemistry B, 2015, 119, 1173-1183.	1.2	33
4549	Investigations of clustering of ions and diffusivity in concentrated aqueous solutions of lithium chloride by molecular dynamic simulations. RSC Advances, 2015, 5, 15328-15337.	1.7	33
4550	ATP-dependent potassium channels and type 2 diabetes mellitus. Clinical Biochemistry, 2015, 48, 476-482.	0.8	32
4551	Dynamic Covalent Transport of Amino Acids across Lipid Bilayers. Journal of the American Chemical Society, 2015, 137, 1476-1484.	6.6	54
4552	Hydrophobic interaction between contiguous residues in the S6 transmembrane segment acts as a stimuli integration node in the BK channel. Journal of General Physiology, 2015, 145, 61-74.	0.9	18
4553	Temperature-Resistant Bicelles for Structural Studies by Solid-State NMR Spectroscopy. Langmuir, 2015, 31, 1496-1504.	1.6	16
4554	A Case of Severe Hyperaldosteronism Caused by a De Novo Mutation Affecting a Critical Salt Bridge Kir3.4 Residue. Journal of Clinical Endocrinology and Metabolism, 2015, 100, E114-E118.	1.8	53
4555	Atomâ€byâ€atom engineering of voltageâ€gated ion channels: Magnified insights into function and pharmacology. Journal of Physiology, 2015, 593, 2627-2634.	1.3	7
4556	You are lost without a map: Navigating the sea of protein structures. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2015, 1854, 258-268.	1.1	24
4557	Molecular Aspects of Structure, Gating, and Physiology of pH-Sensitive Background K _{2P} and Kir K ⁺ -Transport Channels. Physiological Reviews, 2015, 95, 179-217.	13.1	88
4559	<scp>K_v11.1</scp> (<scp>hERG</scp>)â€induced cardiotoxicity: a molecular insight from a binding kinetics study of prototypical <scp>K_v11.1</scp> (<scp>hERG</scp>) inhibitors. British Journal of Pharmacology, 2015, 172, 940-955.	2.7	32
4560	Explanation and Levels in Cognitive Neuroscience. , 2015, , 9-29.		2
4561	A Mutation in the Intracellular Loop III/IV of Mosquito Sodium Channel Synergizes the Effect of Mutations in Helix IIS6 on Pyrethroid Resistance. Molecular Pharmacology, 2015, 87, 421-429.	1.0	35
4562	Role of the Outer Pore Domain in Transient Receptor Potential Vanilloid 1 Dynamic Permeability to Large Cations. Journal of Biological Chemistry, 2015, 290, 5707-5724.	1.6	44
4563	Selective molecular transport through the protein shell of a bacterial microcompartment organelle. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 2990-2995.	3.3	119
4564	Experimental phasing for structure determination using membrane-protein crystals grown by the lipid cubic phase method. Acta Crystallographica Section D: Biological Crystallography, 2015, 71, 104-122.	2.5	20
4565	An embryo of protocells: The capsule of graphene with selective ion channels. Scientific Reports, 2015, 5, 10258.	1.6	11

ARTICLE IF CITATIONS Membrane Protein Structure, Function, and Dynamics: a Perspective from Experiments and Theory. 1.0 157 4566 Journal of Membrane Biology, 2015, 248, 611-640. Building blocks for bioinspired electrets: molecular-level approach to materials for energy and 24 electronics. Pure and Applied Chemistry, 2015, 87, 779-792. Ion hydration number and electro-osmosis during electrodialysis of mixed salt solution. 4568 4.0 87 Desalination, 2015, 373, 38-46. Cell-free expression of a functional pore-only sodium channel. Protein Expression and Purification, 4569 2015, 111, 42-47. Biophysics of Channelrhodopsin. Annual Review of Biophysics, 2015, 44, 167-186. 4570 4.5 172 4571 Protein Crystallography and Drug Discovery., 2015, , 511-537. BK channels: multiple sensors, one activation gate. Frontiers in Physiology, 2015, 6, 29. 4572 1.3 101 Surface-enhanced IR absorption spectroscopy of the KcsA potassium channel upon application of an 1.3 10 electric field. Physical Chemistry Chemical Physics, 2015, 17, 21104-21111. Determinants of cation transport selectivity: Equilibrium binding and transport kinetics. Journal of 4574 0.9 19 General Physiology, 2015, 146, 3-13. Structural Insights into GIRK Channel Function. International Review of Neurobiology, 2015, 123, 34 117-160. A Roadmap to Success in Photopharmacology. Accounts of Chemical Research, 2015, 48, 1947-1960. 4576 7.6 561 Regulating Ion Transport in Peptide Nanotubes by Tailoring the Nanotube Lumen Chemistry. Journal of 2.1 Physical Chemistry Letters, 2015, 6, 1514-1520. Visualizing Specific Cross-Protomer Interactions in the Homo-Oligomeric Membrane Protein 4578 Proteorhodopsin by Dynamic-Nuclear-Polarization-Enhanced Solid-State NMR. Journal of the American 6.6 67 Chemical Society, 2015, 137, 9032-9043. Structural Symmetry in Membrane Proteins. Annual Review of Biophysics, 2015, 44, 311-337. 4579 4.5 Structure and Dynamics of Membrane-embedded KcsA Potassium Channel Revealed by Atomic Force 4580 0.0 2 Microscopy. Seibutsu Butsuri, 2015, 55, 005-010. Perception and Homeostatic Control of Iron in the Rhizobia and Related Bacteria. Annual Review of Microbiology, 2015, 69, 229-245. Structure-Functional Analysis of Channelrhodopsins., 2015, , 31-45. 4582 0 Bias-Exchange Metadynamics Simulations: An Efficient Strategy for the Analysis of Conduction and 2.3 Selectivity in Ion Channels. Journal of Chemical Theory and Computation, 2015, 11, 1896-1906.

#	Article	IF	Citations
4584	Driving force-dependent block by internal Ba2+ on the Kir2.1 channel: Mechanistic insight into inward rectification. Biophysical Chemistry, 2015, 202, 40-57.	1.5	12
4585	Water molecules response to an external GHz electric field in KcsA potassium channel: A molecular modeling approach. Journal of Theoretical and Computational Chemistry, 2015, 14, 1550012.	1.8	3
4586	Single pore translocation of folded, double-stranded, and tetra-stranded DNA through channel of bacteriophage phi29 DNA packaging motor. Biomaterials, 2015, 53, 744-752.	5.7	31
4587	Interactions between permeant and blocking anions inside the CFTR chloride channel pore. Biochimica Et Biophysica Acta - Biomembranes, 2015, 1848, 1573-1590.	1.4	11
4588	Ion–dipole interactions and their functions in proteins. Protein Science, 2015, 24, 1040-1046.	3.1	41
4589	Blocking the Passage: C ₆₀ Geometrically Clogs K ⁺ Channels. ACS Nano, 2015, 9, 4827-4834.	7.3	41
4590	The interaction between delayed rectifier channel alpha-subunits does not involve hetero-tetramer formation. Naunyn-Schmiedeberg's Archives of Pharmacology, 2015, 388, 973-981.	1.4	2
4591	Transient outward potassium channel: a heart failure mediator. Heart Failure Reviews, 2015, 20, 349-362.	1.7	15
4592	A transport equation for confined structures applied to the OprP, Gramicidin A, and KcsA channels. Journal of Computational Electronics, 2015, 14, 524-532.	1.3	10
4593	Theoretical and simulation studies on voltage-gated sodium channels. Protein and Cell, 2015, 6, 413-422.	4.8	10
4594	A heteromeric potassium channel involved in the modulation of the plasma membrane potential is essential for the survival of African trypanosomes. FASEB Journal, 2015, 29, 3228-3237.	0.2	21
4595	Antibody Fragments for Stabilization and Crystallization of G Protein-Coupled Receptors and Their Signaling Complexes. Methods in Enzymology, 2015, 557, 247-258.	0.4	10
4596	Model of Cation Transportation Mediated by High-Affinity Potassium Transporters (HKTs) in Higher Plants. Biological Procedures Online, 2015, 17, 1.	1.4	55
4597	High yield purification of full-length functional hERG K+ channels produced in Saccharomyces cerevisiae. Microbial Cell Factories, 2015, 14, 15.	1.9	21
4598	Global Order and Local Disorder in Brain Maps. Annual Review of Neuroscience, 2015, 38, 247-268.	5.0	36
4599	The Voltage-Gated Proton Channel: A Riddle, Wrapped in a Mystery, inside an Enigma. Biochemistry, 2015, 54, 3250-3268.	1.2	43
4600	Emerging structural insights into the function of ionotropic glutamate receptors. Trends in Biochemical Sciences, 2015, 40, 328-337.	3.7	64
4601	Transport mechanisms in nanopores and nanochannels: can we mimic nature?. Materials Today, 2015, 18, 131-142.	8.3	206

#	Article	IF	CITATIONS
4602	Computational investigations of hERG channel blockers: New insights and current predictive models. Advanced Drug Delivery Reviews, 2015, 86, 72-82.	6.6	82
4603	Classical Targets in Drug Discovery. , 2015, , 87-142.		0
4604	Multicolor Fluorescence-Based Screening Toward Structural Analysis of Multiprotein Membrane Complexes. Methods in Enzymology, 2015, 557, 3-26.	0.4	1
4605	EPR Studies of Gating Mechanisms in Ion Channels. Methods in Enzymology, 2015, 557, 279-306.	0.4	9
4606	Ion Hydration Dynamics in Conjunction with a Hydrophobic Gating Mechanism Regulates Ion Permeation in p7 Viroporin from Hepatitis C Virus. Journal of Physical Chemistry B, 2015, 119, 6204-6210.	1.2	9
4607	Simulating Current–Voltage Relationships for a Narrow Ion Channel Using the Weighted Ensemble Method. Journal of Chemical Theory and Computation, 2015, 11, 1907-1918.	2.3	22
4608	In vitro selection of a sodium-specific DNAzyme and its application in intracellular sensing. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 5903-5908.	3.3	287
4609	Channel function reconstitution and reâ€animation: a singleâ€channel strategy in the postcrystal age. Journal of Physiology, 2015, 593, 2553-2573.	1.3	28
4610	Are Aquaporins the Missing Transmembrane Osmosensors?. Journal of Membrane Biology, 2015, 248, 753-765.	1.0	25
4611	A refined atomic scale model of the Saccharomyces cerevisiae K+-translocation protein Trk1p combined with experimental evidence confirms the role of selectivity filter glycines and other key residues. Biochimica Et Biophysica Acta - Biomembranes, 2015, 1848, 1183-1195.	1.4	18
4612	Automated production of functional membrane proteins using eukaryotic cell-free translation systems. Journal of Biotechnology, 2015, 203, 45-53.	1.9	31
4613	Visualizing KcsA Conformational Changes upon Ion Binding by Infrared Spectroscopy and Atomistic Modeling. Journal of Physical Chemistry B, 2015, 119, 5824-5831.	1.2	25
4614	Crystallization of Membrane Proteins by Vapor Diffusion. Methods in Enzymology, 2015, 557, 363-392.	0.4	14
4615	Tectonics of a K+ channel: The importance of the N-terminus for channel gating. Biochimica Et Biophysica Acta - Biomembranes, 2015, 1848, 3197-3204.	1.4	8
4616	Structure of potassium channels. Cellular and Molecular Life Sciences, 2015, 72, 3677-3693.	2.4	187
4617	Cryo-electron microscopy structure of the Slo2.2 Na+-activated K+ channel. Nature, 2015, 527, 198-203.	13.7	107
4618	Physical basis of apparent pore dilation of ATP-activated P2X receptor channels. Nature Neuroscience, 2015, 18, 1577-1583.	7.1	106
4619	Quantum Effects in Cation Interactions with First and Second Coordination Shell Ligands in Metalloproteins. Journal of Chemical Theory and Computation, 2015, 11, 4992-5001.	2.3	42

		CITATION REPORT		
#	Article		IF	Citations
4620	Ion channels enable electrical communication in bacterial communities. Nature, 2015, 52	7, 59-63.	13.7	527
4621	Biomimetic Approach for Ion Channels Based on Surfactant Encapsulated Spherical Poro∟ Metalâ€Oxide Capsules. Advanced Materials, 2015, 27, 5165-5170.	IS	11.1	19
4622	Engineered Asymmetric Heterogeneous Membrane: A Concentration-Gradient-Driven Ene Device. Journal of the American Chemical Society, 2015, 137, 14765-14772.	rgy Harvesting	6.6	299
4623	hERG potassium channel inhibition by ivabradine requires channel gating. Journal of Molec Cellular Cardiology, 2015, 87, 126-128.	cular and	0.9	2
4624	Bioinspired molecular electrets: bottom-up approach to energy materials and applications Photonics for Energy, 2015, 5, 055598.	. Journal of	0.8	14
4625	Novel Chemical Tools to Study Ion Channel Biology. Advances in Experimental Medicine a 2015, , .	nd Biology,	0.8	1
4626	The Cole-Moore Effect: Still Unexplained?. Biophysical Journal, 2015, 109, 1312-1316.		0.2	22
4627	Membrane Hydration. Sub-Cellular Biochemistry, 2015, , .		1.0	21
4628	Water and Lipid Bilayers. Sub-Cellular Biochemistry, 2015, 71, 45-67.		1.0	26
4629	Sudden Cardiac Death and Disorders of the QT Interval: Anesthetic Implications and Focu Perioperative Management. Journal of Cardiothoracic and Vascular Anesthesia, 2015, 29,	s on 1723-1733.	0.6	17
4630	Determinants of Cation Permeation and Drug Sensitivity in Predicted Transmembrane Hel Adjoining Exofacial Re-entrant Loop 5 of Na+/H+ Exchanger NHE1. Journal of Biological Ch 2015, 290, 18173-18186.	ix 9 and 1emistry,	1.6	9
4631	Gating machinery of InsP3R channels revealed by electron cryomicroscopy. Nature, 2015,	527, 336-341.	13.7	199
4632	Competing Lipid-Protein and Protein-Protein Interactions Determine Clustering and Gatin the Potassium Channel from Streptomyces lividans (KcsA). Journal of Biological Chemistry 25745-25755.		1.6	20
4633	On the classical vibrational coherence of carbonyl groups in the selectivity filter backbone KcsA ion channel. Journal of Integrative Neuroscience, 2015, 14, 195-206.	e of the	0.8	6
4634	Unraveling the mechanism of selective ion transport in hydrophobic subnanometer chanr Proceedings of the National Academy of Sciences of the United States of America, 2015,		3.3	53
4635	Pharmaceutical Optimization of Peptide Toxins for Ion Channel Targets: Potent, Selective Long-Lived Antagonists of Kv1.3. Journal of Medicinal Chemistry, 2015, 58, 6784-6802.	and	2.9	41
4636	Ion-Water Cluster Molecular Dynamics Using a Semiempirical Intermolecular Potential. Le in Computer Science, 2015, , 355-370.	cture Notes	1.0	5
4637	Characterization of the direct interaction between KcsA-Kv1.3 and its inhibitors. Biochimi Biophysica Acta - Biomembranes, 2015, 1848, 1974-1980.	ca Et	1.4	22

#	Article	IF	CITATIONS
4638	Equilibrium fluctuation relations for voltage coupling in membrane proteins. Biochimica Et Biophysica Acta - Biomembranes, 2015, 1848, 2985-2997.	1.4	6
4639	<i>In silico</i> prediction of hERG inhibition. Future Medicinal Chemistry, 2015, 7, 571-586.	1.1	51
4640	TMEM175 Is an Organelle K+ Channel Regulating Lysosomal Function. Cell, 2015, 162, 1101-1112.	13.5	153
4641	Moving parts: the natural alliance between dynamical and mechanistic modeling approaches. Biology and Philosophy, 2015, 30, 757-786.	0.7	26
4642	Specific ion effects on the hydrophobic interaction of benzene self-assembled monolayers. Physical Chemistry Chemical Physics, 2015, 17, 21432-21441.	1.3	7
4643	A structural, functional, and computational analysis suggests pore flexibility as the base for the poor selectivity of CNG channels. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, E3619-28.	3.3	35
4644	How to resolve microsecond current fluctuations in single ion channels: The power of beta distributions. Channels, 2015, 9, 262-280.	1.5	25
4645	Post-expression strategies for structural investigations of membrane proteins. Current Opinion in Structural Biology, 2015, 32, 131-138.	2.6	14
4646	K ⁺ preference at the NaK channel entrance revealed by fluorescence lifetime and anisotropy analysis of site-specifically incorporated (7-hydroxycoumarin-4-yl)ethylglycine. Chemical Communications, 2015, 51, 15971-15974.	2.2	11
4647	Role of protein dynamics in ion selectivity and allosteric coupling in the NaK channel. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 15366-15371.	3.3	17
4648	NCI-H295R cell line as in vitro model of hyperaldosteronism lacks functional KCNJ5 (GIRK4; Kir3.4) channels. Molecular and Cellular Endocrinology, 2015, 412, 272-280.	1.6	4
4649	Modulation of the transient outward current (Ito) in rat cardiac myocytes and human Kv4.3 channels by mefloquine. Toxicology and Applied Pharmacology, 2015, 288, 203-212.	1.3	6
4650	Engineering a peptide inhibitor towards the KCNQ1/KCNE1 potassium channel (IKs). Peptides, 2015, 71, 77-83.	1.2	9
4651	Ion-binding properties of a K ⁺ channel selectivity filter in different conformations. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 15096-15100.	3.3	38
4652	TASK-2 K2P K+ channel: thoughts about gating and its fitness to physiological function. Pflugers Archiv European Journal of Physiology, 2015, 467, 1043-1053.	1.3	12
4653	Elucidation of Conformer Preferences for a Hydrophobic Antimicrobial Peptide by Vesicle Capture-Freeze-Drying: A Preparatory Method Coupled to Ion Mobility-Mass Spectrometry. Analytical Chemistry, 2015, 87, 578-583.	3.2	14
4654	Folding and stability of the aquaglyceroporin GlpF: Implications for human aqua(glycero)porin diseases. Biochimica Et Biophysica Acta - Biomembranes, 2015, 1848, 622-633.	1.4	14
4655	Conformational Dynamics of Shaker-Type Kv1.1 Ion Channel in Open, Closed, and Two Mutated States. Journal of Membrane Biology, 2015, 248, 241-255.	1.0	6

ARTICLE IF CITATIONS # Effect of the amino acid composition of cyclic peptides on their self-assembly in lipid bilayers. Organic 4656 1.5 26 and Biomolecular Chemistry, 2015, 13, 2464-2473. Structural model of the open–closed–inactivated cycle of prokaryotic voltage-gated sodium channels. Journal of General Physiology, 2015, 145, 5-16. Discovery of Functional Antibodies Targeting Ion Channels. Journal of Biomolecular Screening, 2015, 4658 2.6 34 20, 454-467. ATP-Sensitive Potassium Channels in Health and Disease., 2015, , 305-336. 4659 Electrophysiology of Islet Cells., 2015, , 249-303. 4660 9 Permeation and Dynamics of an Open-Activated TRPV1 Channel. Journal of Molecular Biology, 2015, 427, 39 537-549. Extracting continuum-like deformation and stress from molecular dynamics simulations. Computer 4662 3.4 27 Methods in Applied Mechanics and Engineering, 2015, 283, 1010-1031. Atomistic insights into human Cys-loop receptors by solution NMR. Biochimica Et Biophysica Acta -4663 1.4 Biomembranes, 2015, 1848, 307-314. Binding of ArgTX-636 in the NMDA Receptor Ion Channel. Journal of Molecular Biology, 2015, 427, 4664 2.0 13 176-189. Hydrophobic Gating in Ion Channels. Journal of Molecular Biology, 2015, 427, 121-130. 254 4665 Computational modeling of membrane proteins. Proteins: Structure, Function and Bioinformatics, 4666 1.5 86 2015, 83, 1-24. The size and structure of selected hydrated ions and implications for ion channel selectivity. RSC 1.7 Advances, 2015, 5, 1213-1219. A Simple Method for Estimating the Absolute Solvation Free Energy of Monovalent Ions in Different 4668 1.1 5 Solvents. Journal of Physical Chemistry A, 2015, 119, 160-171. Bacterial Voltage-Gated Sodium Channels (BacNaVs) from the Soil, Sea, and Salt Lakes Enlighten Molecular Mechanisms of Electrical Signaling and Pharmacology in the Brain and Heart. Journal of 69 Molecular Biology, 2015, 427, 3-30. pH-dependent promotion of phospholipid flip-flop by the KcsA potassium channel. Biochimica Et 4670 1.4 4 Biophysica Acta - Biomembranes, 2015, 1848, 145-150. Electrostatic field-exposed water in nanotube at constant axial pressure. Scientific Reports, 2014, 4, 4671 30 6596. CACNA1B mutation is linked to unique myoclonus-dystonia syndrome. Human Molecular Genetics, 2015, 4672 1.4 70 24, 987-993. Molecular bases of NMDA receptor subtypeâ€dependent properties. Journal of Physiology, 2015, 593, 4673 1.3 83-95.

	Charle	CHAHON REPORT		
#	Article	IF	Citations	
4674	Ion Channel Engineering: Perspectives and Strategies. Journal of Molecular Biology, 2015, 427, 190-204.	2.0	31	
4675	The inward rectifier potassium channel Kir2.1 is required for osteoblastogenesis. Human Molecular Genetics, 2015, 24, 471-479.	1.4	19	
4676	State-dependent inter-repeat contacts of exceptionally conserved asparagines in the inner helices of sodium and calcium channels. Pflugers Archiv European Journal of Physiology, 2015, 467, 253-266.	1.3	17	
4677	Cholinergic Signaling and Muscle Contraction. , 2016, , 263-327.		2	
4678	Scorpions from Mexico: From Species Diversity to Venom Complexity. Toxins, 2016, 8, 2.	1.5	77	
4679	BmP02 Atypically Delays Kv4.2 Inactivation: Implication for a Unique Interaction between Scorpion Toxin and Potassium Channel. Toxins, 2016, 8, 280.	1.5	6	
4680	Venom Gland Transcriptomic and Proteomic Analyses of the Enigmatic Scorpion Superstitionia donensis (Scorpiones: Superstitioniidae), with Insights on the Evolution of Its Venom Components. Toxins, 2016, 8, 367.	1.5	41	
4681	Genetic Deletion of TREK-1 or TWIK-1/TREK-1 Potassium Channels does not Alter the Basic Electrophysiological Properties of Mature Hippocampal Astrocytes In Situ. Frontiers in Cellular Neuroscience, 2016, 10, 13.	1.8	34	
4682	Membrane Transport. , 2016, , 423-451.		32	
4683	Applications of Solid-State NMR Spectroscopy for the Study of Lipid Membranes with Polyphilic Guest (Macro)Molecules. Polymers, 2016, 8, 439.	2.0	15	
4684	K+ Block Is the Mechanism of Functional Asymmetry in Bacterial Nav Channels. PLoS Computational Biology, 2016, 12, e1004482.	1.5	10	
4685	IBiSA_Tools: A Computational Toolkit for Ion-Binding State Analysis in Molecular Dynamics Trajectories of Ion Channels. PLoS ONE, 2016, 11, e0167524.	1.1	1	
4686	Cardiovascular Action of Insulin in Health and Disease: Endothelial L-Arginine Transport and Cardiac Voltage-Dependent Potassium Channels. Frontiers in Physiology, 2016, 7, 74.	1.3	20	
4687	Computational Modeling of Cardiac K+ Channels and Channelopathies. , 2016, , 293-330.		0	
4688	Where Biology Meets Physics—A Converging View on Membrane Microdomain Dynamics. Current Topics in Membranes, 2016, 77, 27-65.	0.5	23	
4689	HCN Channels Modulators: The Need for Selectivity. Current Topics in Medicinal Chemistry, 2016, 16, 1764-1791.	1.0	54	
4690	Effect of moderate static electric field on the growth and metabolism of Chlorella vulgaris. Bioresource Technology, 2016, 218, 700-711.	4.8	44	
4691	Effects of electromagnetic field exposure on conduction and concentration of voltage gated calcium channels: A Brownian dynamics study. Brain Research, 2016, 1646, 560-569.	1.1	13	

#	Article	IF	CITATIONS
4692	Electric Fieldâ€Responsive Nanopores with Ion Selectivity: Controlling Based on Transport Resistance. Chemical Engineering and Technology, 2016, 39, 993-997.	0.9	7
4693	Synthesis of new Azoâ€based liquid crystalline polymers and their selective sensing behaviors to alkali metal ions. Journal of Polymer Science Part A, 2016, 54, 1713-1723.	2.5	6
4694	Water and ion permeability of a claudin model: A computational study. Proteins: Structure, Function and Bioinformatics, 2016, 84, 305-315.	1.5	9
4695	Biomimetic Solid-State Nanochannels: From Fundamental Research to Practical Applications. Small, 2016, 12, 2810-2831.	5.2	150
4696	Enhanced Stability and Controllability of an Ionic Diode Based on Funnelâ€6haped Nanochannels with an Extended Critical Region. Advanced Materials, 2016, 28, 3345-3350.	11.1	109
4697	Kalium: a database of potassium channel toxins from scorpion venom. Database: the Journal of Biological Databases and Curation, 2016, 2016, baw056.	1.4	44
4698	Unambiguous observation of blocked states reveals altered, blocker-induced, cardiac ryanodine receptor gating. Scientific Reports, 2016, 6, 34452.	1.6	0
4699	Ecotoxicology of Carbon Nanotubes Toward Amphibian Larvae. , 2016, , 931-940.		0
4700	Atomic Structure of the Cystic Fibrosis Transmembrane Conductance Regulator. Cell, 2016, 167, 1586-1597.e9.	13.5	289
4701			
1701	Electric Double Layer Capacitor. , 2016, , 948-948.		Ο
4702	Electric Double Layer Capacitor. , 2016, , 948-948. Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that activates the potassium channel KcsA. Scientific Reports, 2016, 6, 23904.	1.6	0 19
	Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that	1.6 0.7	
4702	Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that activates the potassium channel KcsA. Scientific Reports, 2016, 6, 23904. Investigating the Selectivity of KcsA Channel by an Image Charge Solvation Method (ICSM) in		19
4702 4703	Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that activates the potassium channel KcsA. Scientific Reports, 2016, 6, 23904. Investigating the Selectivity of KcsA Channel by an Image Charge Solvation Method (ICSM) in Molecular Dynamics Simulations. Communications in Computational Physics, 2016, 19, 927-943.	0.7	19 6
4702 4703 4704	Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that activates the potassium channel KcsA. Scientific Reports, 2016, 6, 23904. Investigating the Selectivity of KcsA Channel by an Image Charge Solvation Method (ICSM) in Molecular Dynamics Simulations. Communications in Computational Physics, 2016, 19, 927-943. Effective pore size and radius of capture for K+ ions in K-channels. Scientific Reports, 2016, 6, 19893. Origin of the Shape of Current-Voltage Curve through Nanopores: A Molecular Dynamics Study.	0.7	19 6 19
4702 4703 4704 4705	Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that activates the potassium channel KcsA. Scientific Reports, 2016, 6, 23904. Investigating the Selectivity of KcsA Channel by an Image Charge Solvation Method (ICSM) in Molecular Dynamics Simulations. Communications in Computational Physics, 2016, 19, 927-943. Effective pore size and radius of capture for K+ ions in K-channels. Scientific Reports, 2016, 6, 19893. Origin of the Shape of Current-Voltage Curve through Nanopores: A Molecular Dynamics Study. Scientific Reports, 2016, 6, 25750. Sequential Vapor Infiltration Treatment Enhances the Ionic Current Rectification Performance of Composite Membranes Based on Mesoporous Silica Confined in Anodic Alumina. Langmuir, 2016, 32,	0.7 1.6 1.6	19 6 19 5
4702 4703 4704 4705 4706	Discovery and characterisation of a novel toxin from Dendroaspis angusticeps, named Tx7335, that activates the potassium channel KcsA. Scientific Reports, 2016, 6, 23904. Investigating the Selectivity of KcsA Channel by an Image Charge Solvation Method (ICSM) in Molecular Dynamics Simulations. Communications in Computational Physics, 2016, 19, 927-943. Effective pore size and radius of capture for K+ ions in K-channels. Scientific Reports, 2016, 6, 19893. Origin of the Shape of Current-Voltage Curve through Nanopores: A Molecular Dynamics Study. Scientific Reports, 2016, 6, 25750. Sequential Vapor Infiltration Treatment Enhances the Ionic Current Rectification Performance of Composite Membranes Based on Mesoporous Silica Confined in Anodic Alumina. Langmuir, 2016, 32, 13349-13357. Cated Molecular Transport in Highly Ordered Heterogeneous Nanochannel Array Electrode. ACS	0.7 1.6 1.6 1.6	19 6 19 5 3

# 4710	ARTICLE Perspective: Structure and dynamics of water at surfaces probed by scanning tunneling microscopy and spectroscopy. Journal of Chemical Physics, 2016, 145, 160901.	IF 1.2	Citations 38
4711	Exits in order: How crowding affects particle lifetimes. Journal of Chemical Physics, 2016, 144, 244107.	1.2	1
4712	Steep Subthreshold Switching With Nanomechanical FET Relays. IEEE Transactions on Electron Devices, 2016, 63, 1681-1688.	1.6	3
4713	Insights into the function of ion channels by computational electrophysiology simulations. Biochimica Et Biophysica Acta - Biomembranes, 2016, 1858, 1741-1752.	1.4	60
4714	Membrane-binding properties of gating modifier and pore-blocking toxins: Membrane interaction is not a prerequisite for modification of channel gating. Biochimica Et Biophysica Acta - Biomembranes, 2016, 1858, 872-882.	1.4	22
4715	Some general aspects of ion interactions with the channel pore. RSC Advances, 2016, 6, 52082-52094.	1.7	5
4716	Editorial commentary: Molecular mechanisms for fine-tuning myocardial repolarization. Trends in Cardiovascular Medicine, 2016, 26, 219-220.	2.3	0
4717	Synthesis of Constrained Peptidomimetics via the Pictet-Spengler Reaction. Topics in Heterocyclic Chemistry, 2016, , 81-103.	0.2	0
4718	Individual Ion Binding Sites in the K+ Channel Play Distinct Roles in C-type Inactivation and in Recovery from Inactivation. Structure, 2016, 24, 750-761.	1.6	41
4719	Voltage-Gated Potassium Channels: A Structural Examination of Selectivity and Gating. Cold Spring Harbor Perspectives in Biology, 2016, 8, a029231.	2.3	91
4720	The Potassium Binding Protein Kbp Is a Cytoplasmic Potassium Sensor. Structure, 2016, 24, 741-749.	1.6	38
4721	Self-assembly of cyclic peptides and peptidomimetic macrocycles: linking structure with function. Tetrahedron, 2016, 72, 3379-3387.	1.0	14
4722	Electrical resonance with voltage-gated ion channels: perspectives from biophysical mechanisms and neural electrophysiology. Acta Pharmacologica Sinica, 2016, 37, 67-74.	2.8	16
4723	Structural model of FeoB, the iron transporter from <i>Pseudomonas aeruginosa</i> , predicts a cysteine lined, GTP-gated pore. Bioscience Reports, 2016, 36, .	1.1	28
4724	The Modulation of Potassium Channels in the Smooth Muscle as a Therapeutic Strategy for Disorders of the Gastrointestinal Tract. Advances in Protein Chemistry and Structural Biology, 2016, 104, 263-305.	1.0	11
4725	Biophysical Adaptations of Prokaryotic Voltage-Gated Sodium Channels. Current Topics in Membranes, 2016, 78, 39-64.	0.5	4
4726	Targeting the Channel Activity of Viroporins. Advances in Protein Chemistry and Structural Biology, 2016, 104, 307-355.	1.0	28
4727	Characteristics of K + and Rb + as "structure-breaking―ions in dilute aqueous solution: Insights from ONIOM-XS MD simulations. Chemical Physics, 2016, 479, 72-80.	0.9	11

#	Article	IF	CITATIONS
4728	Structure and electric properties of sodium ion hydrate shell in nanopore with hydrophilic walls. Russian Journal of Electrochemistry, 2016, 52, 910-919.	0.3	3
4729	Cyclic Purine and Pyrimidine Nucleotides Bind to the HCN2 Ion Channel and Variably Promote C-Terminal Domain Interactions and Opening. Structure, 2016, 24, 1629-1642.	1.6	16
4730	Synthesis, lipid membrane incorporation, and ion permeability testing of carbon nanotube porins. Nature Protocols, 2016, 11, 2029-2047.	5.5	42
4731	Digitalized K ⁺ Occupancy in the Nanocavity Holds and Releases Queues of K ⁺ in a Channel. Journal of the American Chemical Society, 2016, 138, 10284-10292.	6.6	22
4732	Biophysics of BK Channel Gating. International Review of Neurobiology, 2016, 128, 1-49.	0.9	18
4733	Transportation of Two Coupled Particles in an Asymmetric Saw-Tooth Potential. Chinese Physics Letters, 2016, 33, 020501.	1.3	3
4735	Electrophoretic Transport of Na ⁺ and K ⁺ lons Within Cyclic Peptide Nanotubes. Journal of Physical Chemistry B, 2016, 120, 7872-7879.	1.2	12
4736	Gating, Regulation, and Structure in K _{2P} K ⁺ Channels: <i>In Varietate Concordia?</i> . Molecular Pharmacology, 2016, 90, 309-317.	1.0	39
4737	Instantaneous ion configurations in the K ⁺ ion channel selectivity filter revealed by 2D IR spectroscopy. Science, 2016, 353, 1040-1044.	6.0	174
4738	The pathophysiology of cardiac dysfunction in epilepsy. Epilepsy Research, 2016, 127, 19-29.	0.8	81
4739	Reversal of Tetracycline Resistance in <i>Escherichia coli</i> by Noncytotoxic <i>bis</i> (Tryptophan)s. Journal of the American Chemical Society, 2016, 138, 10571-10577.	6.6	20
4740	Chloride Transport through Supramolecular Barrel-Rosette Ion Channels: Lipophilic Control and Apoptosis-Inducing Activity. Journal of the American Chemical Society, 2016, 138, 16443-16451.	6.6	126
4742	Atomistic insight into lipid translocation by a TMEM16 scramblase. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 14049-14054.	3.3	92
4743	Experimental and Theoretical Study of Water-Solute Transport in Organic-Rich Carbonate Mudrocks. , 2016, , .		3
4744	Computational Structural Pharmacology and Toxicology of Voltage-Gated Sodium Channels. Current Topics in Membranes, 2016, 78, 117-144.	0.5	13
4745	Pore size matters for potassium channel conductance. Journal of General Physiology, 2016, 148, 277-291.	0.9	35
4746	Hofmeister effect for electrokinetic transport at ordered DNA layers. Microfluidics and Nanofluidics, 2016, 20, 1.	1.0	5
4747	Energetics of Ion Permeation in an Open-Activated TRPV1 Channel. Biophysical Journal, 2016, 111, 1214-1222.	0.2	21

#	Article	IF	CITATIONS
4748	Exploring the Dynamics of the TWIK-1 Channel. Biophysical Journal, 2016, 111, 775-784.	0.2	7
4749	Discovery of functional monoclonal antibodies targeting C-protein-coupled receptors and ion channels. Biochemical Society Transactions, 2016, 44, 831-837.	1.6	14
4750	Modulating Transmembrane α-Helix Interactions through pH-Sensitive Boundary Residues. Biochemistry, 2016, 55, 4306-4315.	1.2	4
4751	Conformational heterogeneity in closed and open states of the KcsA potassium channel in lipid bicelles. Journal of General Physiology, 2016, 148, 119-132.	0.9	20
4752	Combining <i>in Vitro</i> Folding with Cell Free Protein Synthesis for Membrane Protein Expression. Biochemistry, 2016, 55, 4212-4219.	1.2	36
4753	Solution-Based Single-Molecule FRET Studies of K + Channel Gating in a Lipid Bilayer. Biophysical Journal, 2016, 110, 2663-2670.	0.2	20
4754	An improved method for the cost-effective expression and purification of large quantities of KcsA. Protein Expression and Purification, 2016, 127, 53-60.	0.6	13
4755	Distinct regions that control ion selectivity and calcium-dependent activation in the bestrophin ion channel. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, E7399-E7408.	3.3	60
4756	Advances in solid-state NMR of membrane proteins. Molecular Physics, 2016, 114, 3598-3609.	0.8	12
4757	Easy access to 3-indolyl 1,1,2,2-ethanetetracarboxylates from malonates and indoles catalyzed by Pd(OAc)2. Tetrahedron, 2016, 72, 8061-8065.	1.0	2
4758	Structural and functional characterization of a calcium-activated cation channel from Tsukamurella paurometabola. Nature Communications, 2016, 7, 12753.	5.8	11
4759	Engineering differential charge selectivity from a single structural template. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 12610-12612.	3.3	0
4760	Three in a row—how sodium ions cross the channel. EMBO Journal, 2016, 35, 793-795.	3.5	5
4761	Acoustic neuromodulation from a basic science prospective. Journal of Therapeutic Ultrasound, 2016, 4, 17.	2.2	56
4762	Independent activation of ion conduction pores in the double-barreled calcium-activated chloride channel TMEM16A. Journal of General Physiology, 2016, 148, 375-392.	0.9	75
4763	The Structure of the Polycystic Kidney Disease Channel PKD2 in Lipid Nanodiscs. Cell, 2016, 167, 763-773.e11.	13.5	214
4764	Identifying the elusive link between amino acid sequence and charge selectivity in pentameric ligand-gated ion channels. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, E7106-E7115.	3.3	24
4765	Late Eocene clay boron-derived paleosalinity in the Qaidam Basin and its implications for regional tectonics and climate. Sedimentary Geology, 2016, 346, 49-59.	1.0	63

		CITATION REPORT		
#	Article	50	IF	CITATIONS
4766	Functional Mechanism of Channelrhodopsins. Nippon Laser Igakkaishi, 2016, 36, 451-4	-59.	0.0	0
4767	Understanding Sodium Channel Function and Modulation Using Atomistic Simulations Channel Structures. Current Topics in Membranes, 2016, 78, 145-182.	of Bacterial	0.5	9
4768	Mapping the Interaction Anatomy of BmP02 on Kv1.3 Channel. Scientific Reports, 201	5, 6, 29431.	1.6	15
4769	Modeling and Experiments on Liquid-Infused, Mechanically Activated Porous Materials.	,2016,,.		0
4770	Simulation Studies of Ion Permeation and Selectivity in Voltage-Gated Sodium Channel Topics in Membranes, 2016, 78, 215-260.	s. Current	0.5	13
4771	A functional NMR for membrane proteins: dynamics, ligand binding, and allosteric mod Protein Science, 2016, 25, 959-973.	ulation.	3.1	14
4772	Thermal Responsive Ion Selectivity of Uranyl Peroxide Nanocages: An Inorganic Mimic c K ⁺ Ion Channels. Angewandte Chemie, 2016, 128, 7001-7005.	ıf	1.6	16
4773	Thermal Responsive Ion Selectivity of Uranyl Peroxide Nanocages: An Inorganic Mimic o K ⁺ Ion Channels. Angewandte Chemie - International Edition, 2016, 55, 68		7.2	32
4774	Dynamics of the Ligand Binding Domain Layer during AMPA Receptor Activation. Bioph 2016, 110, 896-911.	ysical Journal,	0.2	19
4775	Developing the explanatory dimensions of part–whole realization. Philosophical Stud 3347-3368.	ies, 2016, 173,	0.5	12
4776	Membrane Transport. , 2016, , 335-378.			5
4777	Structural mechanisms of activation and desensitization in neurotransmitter-gated ion Nature Structural and Molecular Biology, 2016, 23, 494-502.	channels.	3.6	58
4778	Atomic-level analysis of membrane-protein structure. Nature Structural and Molecular 8 23, 464-467.	3iology, 2016,	3.6	50
4779	Phylogenetic relationships and protein modelling revealed two distinct subfamilies of g genes between crop and model grasses. Genome, 2016, 59, 509-517.	roup II HKT	0.9	7
4780	Allosterism and Structure in Thermally Activated Transient Receptor Potential Channels Review of Biophysics, 2016, 45, 371-398.	. Annual	4.5	51
4781	An organelle K+ channel is required for osmoregulation in Chlamydomonas reinhardtii. Cell Science, 2016, 129, 3008-14.	lournal of	1.2	8
4782	Cryo-electron microscopy for structure analyses of membrane proteins in the lipid bilay Opinion in Structural Biology, 2016, 39, 71-78.	er. Current	2.6	12
4783	Closed state-coupled C-type inactivation in BK channels. Proceedings of the National A Sciences of the United States of America, 2016, 113, 6991-6996.	cademy of	3.3	11

#	Article	IF	CITATIONS
4784	Ion Channels Made from a Single Membrane-Spanning DNA Duplex. Nano Letters, 2016, 16, 4665-4669.	4.5	124
4785	Voltage-Gated Na ⁺ Channels: Not Just for Conduction. Cold Spring Harbor Perspectives in Biology, 2016, 8, a029264.	2.3	43
4786	Shaker-IR K Channel Gating in Heavy Water: Role of Structural Water Molecules in Inactivation. Biophysical Journal, 2016, 110, 343a-344a.	0.2	3
4787	Analysis of the structure and function of EMRE in a yeast expression system. Biochimica Et Biophysica Acta - Bioenergetics, 2016, 1857, 831-839.	0.5	51
4788	A theoretical study of nanostructure membranes for separating Li+ and Mg2+ from Clâ^'. Computational Materials Science, 2016, 113, 66-74.	1.4	10
4789	Free Energies of Ion Binding in the Bacterial CLC-ec1 Chloride Transporter with Implications for the Transport Mechanism and Selectivity. Journal of Physical Chemistry B, 2016, 120, 3129-3139.	1.2	12
4790	Electrophysiological behavior of neonatal astrocytes in hippocampal stratum radiatum. Molecular Brain, 2016, 9, 34.	1.3	37
4791	Charged Residues at the First Transmembrane Region Contribute to the Voltage Dependence of the Slow Gate of Connexins. Journal of Biological Chemistry, 2016, 291, 15740-15752.	1.6	13
4792	Pharmacological rescue of <scp>hERG</scp> currents carried out by G604S and wide type <scp>hERG</scp> coâ€expression. Clinical and Experimental Pharmacology and Physiology, 2016, 43, 851-861.	0.9	2
4793	Current strategies for protein production and purification enabling membrane protein structural biology. Biochemistry and Cell Biology, 2016, 94, 507-527.	0.9	96
4794	Advances in the molecular dynamics flexible fitting method for cryo-EM modeling. Methods, 2016, 100, 50-60.	1.9	82
4795	Liposome chaperon in cell-free membrane protein synthesis: one-step preparation of KcsA-integrated liposomes and electrophysiological analysis by the planar bilayer method. Biomaterials Science, 2016, 4, 258-264.	2.6	21
4796	Analysis of inter-residue contacts reveals folding stabilizers in P-loops of potassium, sodium, and TRPV channels. European Biophysics Journal, 2016, 45, 321-329.	1.2	8
4797	K _{ATP} Channels in the Cardiovascular System. Physiological Reviews, 2016, 96, 177-252.	13.1	183
4798	Na + /H + antiporter (NHE1) and lactate/H + symporters (MCTs) in pH homeostasis and cancer metabolism. Biochimica Et Biophysica Acta - Molecular Cell Research, 2016, 1863, 2465-2480.	1.9	96
4799	Voltage-Gated Sodium Channels. Current Topics in Membranes, 2016, 78, 183-214.	0.5	7
4800	Functionalism, superduperfunctionalism, and physicalism: lessons from supervenience. SynthÃ^se, 2016, 193, 2205-2235.	0.6	3
4801	KCa3.1 in Epithelia. , 2016, , 659-705.		3

ARTICLE IF CITATIONS Membrane Potential: Concepts., 2016, , 218-236. 4802 5 Computational studies of transport in ion channels using metadynamics. Biochimica Et Biophysica 4803 1.4 Acta - Biomembranes, 2016, 1858, 1733-1740. Potassium Versus Sodium Selectivity in Monovalent Ion Channel Selectivity Filters. Metal Ions in Life 4804 2.8 6 Sciences, 2016, 16, 325-347. What Makes Oxidized <i>N</i>-Acylanthranilamides Stable?. Journal of Physical Chemistry Letters, 2016, 7,758-764. Biomarkers in traumatic brain injury: a review. Journal of the Royal Army Medical Corps, 2016, 162, 4806 0.8 33 103-108. 4807 Roles and Transport of Sodium and Potassium in Plants. Metal lons in Life Sciences, 2016, 16, 291-324. 2.8 86 Stochastic Modeling and Simulation of Ion Transport through Channels. Multiscale Modeling and 4808 0.6 1 Simulation, 2016, 14, 113-137. Elucidating the Link Between Structure and Function of Ion Channels and Transporters with 4809 0.2 Voltage-Clamp and Patch-Clamp Fluorometry. Neuromethods, 2016, , 67-95. A Non-canonical Voltage-Sensing Mechanism Controls Gating in K2P K+ Channels. Cell, 2016, 164, 4810 13.5 169 937-949. Imaging cellular distribution of fluorescent supramolecular nanofibers. Science China Chemistry, 4.2 2016, 59, 719-723. Poissonâ€"Fermi Modeling of the Ion Exchange Mechanism of the Sodium/Calcium Exchanger. Journal of 4812 1.2 13 Physical Chemistry B, 2016, 120, 2658-2669. ZxSKOR is important for salinity and drought tolerance of Zygophyllum xanthoxylum by maintaining K+ homeostasis. Plant Growth Regulation, 2016, 80, 195-205. 1.8 Multi-ion free energy landscapes underscore the microscopic mechanism of ion selectivity in the KcsA 4814 1.4 34 channel. Biochimica Et Biophysica Acta - Biomembranes, 2016, 1858, 1722-1732. How high do ion fluxes go? A re-evaluation of the two-mechanism model of K + transport in plant 4815 1.7 roots. Plant Science, 2016, 243, 96-104. Highly Selective Artificial K⁺ Channels: An Example of Selectivity-Induced Transmembrane 4816 112 6.6 Potential. Journal of the American Chemical Society, 2016, 138, 426-432. Voltage-Dependent Gating: Novel Insights from KCNQ1 Channels. Biophysical Journal, 2016, 110, 14-25. 4817 The hitchhiker's guide to the voltage-gated sodium channel galaxy. Journal of General Physiology, 4818 0.9 299 2016, 147, 1-24. Experimental investigation of anion \hat{e}^{eff} interactions \hat{e}^{eff} applications and biochemical relevance. 4819 2.2 Chemical Communications, 2016, 52, 1778-1795.

#	Article	IF	CITATIONS
4820	Fundamental studies and practical applications of bio-inspired smart solid-state nanopores and nanochannels. Nano Today, 2016, 11, 61-81.	6.2	261
4821	KCNE1 and KCNE3: The yin and yang of voltage-gated K+ channel regulation. Gene, 2016, 576, 1-13.	1.0	67
4822	Mechanisms contributing to myocardial potassium channel diversity, regulation and remodeling. Trends in Cardiovascular Medicine, 2016, 26, 209-218.	2.3	42
4823	Analytical applications for pore-forming proteins. Biochimica Et Biophysica Acta - Biomembranes, 2016, 1858, 593-606.	1.4	56
4824	Mechanisms in psychology: ripping nature at its seams. SynthÃ^se, 2016, 193, 1585-1614.	0.6	28
4825	Local response in nanopores. Molecular Simulation, 2016, 42, 463-473.	0.9	4
4826	Molecular dynamics simulation of water permeation through the alpha-hemolysin channel. Journal of Biological Physics, 2016, 42, 133-146.	0.7	16
4827	Application of advanced X-ray methods in life sciences. Biochimica Et Biophysica Acta - General Subjects, 2017, 1861, 3671-3685.	1.1	14
4828	Development of therapeutic antibodies to G protein-coupled receptors and ion channels: Opportunities, challenges and their therapeutic potential in respiratory diseases. , 2017, 169, 113-123.		18
4829	ATP sensitive potassium channel openers: A new class of ocular hypotensive agents. Experimental Eye Research, 2017, 158, 85-93.	1.2	31
4830	Structure of a eukaryotic cyclic-nucleotide-gated channel. Nature, 2017, 542, 60-65.	13.7	121
4831	Structural Titration of Slo2.2, a Na + -Dependent K + Channel. Cell, 2017, 168, 390-399.e11.	13.5	115
4832	Watching Proteins Wiggle: Mapping Structures with Two-Dimensional Infrared Spectroscopy. Chemical Reviews, 2017, 117, 10726-10759.	23.0	195
4834	Whole-genome resequencing of Bacillus cereus and expression of genes functioning in sodium chloride stress. Microbial Pathogenesis, 2017, 104, 248-253.	1.3	29
4835	Probing Conformational Changes during the Gating Cycle of a Potassium Channel in Lipid Bilayers. Biophysical Journal, 2017, 112, 99-108.	0.2	27
4836	Species-Independent Attraction to Biofilms through Electrical Signaling. Cell, 2017, 168, 200-209.e12.	13.5	232
4837	Structures of the Human HCN1 Hyperpolarization-Activated Channel. Cell, 2017, 168, 111-120.e11.	13.5	294
4838	Differential binding of monovalent cations to KcsA: Deciphering the mechanisms of potassium channel selectivity. Biochimica Et Biophysica Acta - Biomembranes, 2017, 1859, 779-788.	1.4	16

#	Article	IF	CITATIONS
4839	Signatures of Mechanosensitive Gating. Biophysical Journal, 2017, 112, 3-9.	0.2	8
4840	High-Yield Synthesis and Optical Properties of Carbon Nanotube Porins. Journal of Physical Chemistry C, 2017, 121, 3117-3125.	1.5	11
4841	Columnar Self-Assemblies of Triarylamines as Scaffolds for Artificial Biomimetic Channels for Ion and for Water Transport. Journal of the American Chemical Society, 2017, 139, 3721-3727.	6.6	65
4842	Gating energetics of a voltageâ€dependent K ⁺ channel pore domain. Journal of Computational Chemistry, 2017, 38, 1472-1478.	1.5	4
4843	Fluorinated aminoanthranilamides: non-native amino acids for bringing proteomic approaches to charge-transfer systems. Physical Chemistry Chemical Physics, 2017, 19, 7871-7876.	1.3	20
4844	A slick, slack pathway through the pore. Journal of Physiology, 2017, 595, 2337-2338.	1.3	1
4845	Structural Insights into the Atomistic Mechanisms of Action of Small Molecule Inhibitors Targeting the KCa3.1 Channel Pore. Molecular Pharmacology, 2017, 91, 392-402.	1.0	39
4846	Biobetters From an Integrated Computational/Experimental Approach. Computational and Structural Biotechnology Journal, 2017, 15, 138-145.	1.9	9
4847	Structure of a eukaryotic voltage-gated sodium channel at near-atomic resolution. Science, 2017, 355, .	6.0	351
4848	Detection of K+Efflux from Stimulated Cortical Neurons by an Aptamer-Modified Silicon Nanowire Field-Effect Transistor. ACS Sensors, 2017, 2, 69-79.	4.0	38
4849	Generation of Synthetic Antibody Fragments to Detergent Solubilized Membrane Proteins. Springer Protocols, 2017, , 231-243.	0.1	0
4850	Hysteresis of KcsA potassium channel's activation– deactivation gating is caused by structural changes at the channel's selectivity filter. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 3234-3239.	3.3	43
4851	Synapses in the spotlight with syntheticÂoptogenetics. EMBO Reports, 2017, 18, 677-692.	2.0	41
4852	Independent movement of the voltage sensors in KV2.1/KV6.4 heterotetramers. Scientific Reports, 2017, 7, 41646.	1.6	7
4853	CryoEM structure of a prokaryotic cyclic nucleotide-gated ion channel. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 4430-4435.	3.3	51
4854	The chemical basis for electrical signaling. Nature Chemical Biology, 2017, 13, 455-463.	3.9	147
4855	A novel pore-region mutation, c.887G > A (p.G296D) in KCNQ4, causing hearing loss in a Chinese family with autosomal dominant non-syndromic deafness 2. BMC Medical Genetics, 2017, 18, 36.	2.1	10
4856	β-Carboxysome bioinformatics: identification and evolution of new bacterial microcompartment protein gene classes and core locus constraints. Journal of Experimental Botany, 2017, 68, 3841-3855.	2.4	36

#	Article	IF	CITATIONS
4857	Web3DMol: interactive protein structure visualization based on WebGL. Nucleic Acids Research, 2017, 45, W523-W527.	6.5	21
4858	Joint-based description of protein structure: its application to the geometric characterization of membrane proteins. Scientific Reports, 2017, 7, 1056.	1.6	3
4859	Facile fabrication of highly controllable gating systems based on the combination of inverse opal structure and dynamic covalent chemistry. Nanoscale, 2017, 9, 7268-7275.	2.8	8
4860	The Roles of Water in the Protein Matrix: A Largely Untapped Resource for Drug Discovery. Journal of Medicinal Chemistry, 2017, 60, 6781-6827.	2.9	111
4861	Probing the Effects of Gating on the Ion Occupancy of the K ⁺ Channel Selectivity Filter Using Two-Dimensional Infrared Spectroscopy. Journal of the American Chemical Society, 2017, 139, 8837-8845.	6.6	30
4862	Golgi anti-apoptotic protein: a tale of camels, calcium, channels and cancer. Open Biology, 2017, 7, 170045.	1.5	34
4863	Mapping Ryanodine Binding Sites in the Pore Cavity of Ryanodine Receptors. Biophysical Journal, 2017, 112, 1645-1653.	0.2	7
4864	Subtype-specific block of voltage-gated K+ channels by μ-conopeptides. Biochemical and Biophysical Research Communications, 2017, 482, 1135-1140.	1.0	18
4865	Tetrameric Assembly of K+ Channels Requires ER-Located Chaperone Proteins. Molecular Cell, 2017, 65, 52-65.	4.5	64
4866	Aqueous micro-solvation of Li + ions: Thermodynamics and energetic studies of Li + -(H 2 O) n (n = 1–6) structures. Journal of Molecular Liquids, 2017, 241, 595-602.	2.3	28
4867	Maximizing the right stuff: The trade-off between membrane permeability and selectivity. Science, 2017, 356, .	6.0	1,864
4868	A Continuum Poisson–Boltzmann Model for Membrane Channel Proteins. Journal of Chemical Theory and Computation, 2017, 13, 3398-3412.	2.3	19
4869	Bacterial intelligence: imitation games, time-sharing, and long-range quantum coherence. Journal of Cell Communication and Signaling, 2017, 11, 281-284.	1.8	32
4870	Structural and Functional Architecture of AMPA-Type Glutamate Receptors and Their Auxiliary Proteins. Neuron, 2017, 94, 713-730.	3.8	279
4871	Structural and electrostatic effects at the surfaces of size- and charge-selected aqueous nanodrops. Chemical Science, 2017, 8, 5201-5213.	3.7	16
4872	A Tunable Ionic Diode Based on a Biomimetic Structureâ€₹ailorable Nanochannel. Angewandte Chemie - International Edition, 2017, 56, 8168-8172.	7.2	72
4873	An energy-preserving discretization for the Poisson–Nernst–Planck equations. Journal of Computational Electronics, 2017, 16, 431-441.	1.3	15
4874	Absence of KCNQ4 mutation in Bengali families with ADNSHL originated from West Bengal, India. International Journal of Pediatric Otorhinolaryngology, 2017, 100, 35-38.	0.4	1

#	Article	IF	CITATIONS
4875	A minimalistic tetrapeptide amphiphile scaffold for transmembrane pores with a preference for sodium. Bioorganic and Medicinal Chemistry Letters, 2017, 27, 2886-2889.	1.0	4
4876	A Tunable Ionic Diode Based on a Biomimetic Structureâ€Tailorable Nanochannel. Angewandte Chemie, 2017, 129, 8280-8284.	1.6	7
4877	Origin of Ion Specificity of Telomeric DNA G-Quadruplexes Investigated by Free-Energy Simulations. Biophysical Journal, 2017, 112, 2280-2290.	0.2	18
4879	Porous Peptide Complexes by a Foldingâ€andâ€Assembly Strategy. Chemistry - an Asian Journal, 2017, 12, 1715-1718.	1.7	30
4880	Recent Progress in the Discovery and Development of TRPA1 Modulators. Progress in Medicinal Chemistry, 2017, 56, 81-115.	4.1	27
4881	Molecular Structure of the Human CFTR Ion Channel. Cell, 2017, 169, 85-95.e8.	13.5	421
4882	Unravelling the complexities of vascular smooth muscle ion channels: Fine tuning of activity by ancillary subunits. , 2017, 178, 57-66.		5
4883	Ion and inhibitor binding of the double-ring ion selectivity filter of the mitochondrial calcium uniporter. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, E2846-E2851.	3.3	54
4885	Selective ion binding and transport by membrane proteins – A computational perspective. Coordination Chemistry Reviews, 2017, 345, 108-136.	9.5	31
4886	Fourier Analysis of Conservation Patterns in Protein Secondary Structure. Computational and Structural Biotechnology Journal, 2017, 15, 265-270.	1.9	3
4887	Amino Acid Properties of Trafficking Determinants in the Outer Pore-Forming Region of Kv1 Potassium Channels in Cell Lines. Cell Biochemistry and Biophysics, 2017, 75, 25-33.	0.9	0
4888	Reentrant Variation of Single-Chain Elasticity of Polyelectrolyte Induced by Monovalent Salt. Journal of Physical Chemistry B, 2017, 121, 4257-4264.	1.2	14
4889	Reconstructing Ancient Proteins to Understand the Causes of Structure and Function. Annual Review of Biophysics, 2017, 46, 247-269.	4.5	129
4890	The velamen of epiphytic orchids: Variation in structure and correlations with nutrient absorption. Flora: Morphology, Distribution, Functional Ecology of Plants, 2017, 230, 66-74.	0.6	33
4891	Comparative study of the structure and interaction of the pore helices of the hERG and Kv1.5 potassium channels in model membranes. European Biophysics Journal, 2017, 46, 549-559.	1.2	2
4892	Modeling the light-induced electric potential difference ΔÎ ⁻ across the thylakoid membrane based on the transition state rate theory. Biochimica Et Biophysica Acta - Bioenergetics, 2017, 1858, 239-248.	0.5	14
4893	Modulation of Molecular Flux Using a Graphene Nanopore Capacitor. Journal of Physical Chemistry B, 2017, 121, 3724-3733.	1.2	14
4894	Characteristics and trends in global tea research: a Science Citation Index Expandedâ€based analysis. International Journal of Food Science and Technology, 2017, 52, 644-651.	1.3	20

#	Article	IF	CITATIONS
4895	Voltage-gated sodium channels viewed through a structural biology lens. Current Opinion in Structural Biology, 2017, 45, 74-84.	2.6	22
4896	Threading the biophysics of mammalian Slo1 channels onto structures of an invertebrate Slo1 channel. Journal of General Physiology, 2017, 149, 985-1007.	0.9	30
4897	Chemical substitutions in the selectivity filter of potassium channels do not rule out constricted-like conformations for C-type inactivation. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 11145-11150.	3.3	29
4898	Chasing the open-state structure of pentameric ligand-gated ion channels. Journal of General Physiology, 2017, 149, 1119-1138.	0.9	33
4899	Channelopathies: Application of Natural Products Using Nanotechnology. , 2017, , 73-86.		0
4900	The hydration structure of the heavy-alkalines Rb ⁺ and Cs ⁺ through molecular dynamics and X-ray absorption spectroscopy: surface clusters and eccentricity. Physical Chemistry Chemical Physics, 2017, 19, 28993-29004.	1.3	43
4901	Role of Bioinformatics in the Study of Ionic Channels. Advances in Anatomy, Embryology and Cell Biology, 2017, 227, 17-37.	1.0	2
4902	Mean force potential of interaction between Na+ and Clâ^' ions in planar nanopores in contact with water under pressure. Russian Journal of Physical Chemistry A, 2017, 91, 2124-2130.	0.1	1
4903	Transport Across Natural and Modified Biological Membranes and its Implications in Physiology and Therapy. Advances in Anatomy, Embryology and Cell Biology, 2017, , .	1.0	5
4904	Predicting the Functional Impact of KCNQ1 Variants of Unknown Significance. Circulation: Cardiovascular Genetics, 2017, 10, .	5.1	40
4905	Calcium Signaling: From Physiology to Diseases. , 2017, , .		14
4906	A Model of the Block of Voltage-Gated Potassium Kv4.2 Ionic Currents by 4-Aminopyridine. Journal of Pharmacology and Experimental Therapeutics, 2017, 363, 184-195.	1.3	7
4907	Combinatorial Evolution of Fast-Conducting Highly Selective K ⁺ -Channels via Modularly Tunable Directional Assembly of Crown Ethers. Journal of the American Chemical Society, 2017, 139, 12338-12341.	6.6	98
4908	Pressing Carbon Nanotubes Triggers Better Ion Selectivity. Journal of Physical Chemistry C, 2017, 121, 19512-19518.	1.5	3
4909	Molecular Dynamics Simulations of Selective Metabolite Transport across the Propanediol Bacterial Microcompartment Shell. Journal of Physical Chemistry B, 2017, 121, 8149-8154.	1.2	35
4910	Crystal structure of an inactivated mutant mammalian voltage-gated K+ channel. Nature Structural and Molecular Biology, 2017, 24, 857-865.	3.6	56
4911	Functionalization of single solid state nanopores to mimic biological ion channels: A review. Advances in Colloid and Interface Science, 2017, 250, 195-213.	7.0	125
4912	lon Transport in Confined Geometries below the Nanoscale: Access Resistance Dominates Protein Channel Conductance in Diluted Solutions. ACS Nano, 2017, 11, 10392-10400.	7.3	30

#	Article	IF	CITATIONS
4913	Detergent-resistant oligomeric Leptosphaeria rhodopsin is a promising bio-nanomaterial and an alternative to bacteriorhodopsin. Biochemical and Biophysical Research Communications, 2017, 493, 352-357.	1.0	4
4914	Swapping of transmembrane domains in the epithelial calcium channel TRPV6. Scientific Reports, 2017, 7, 10669.	1.6	51
4915	The K ⁺ channel <scp>KZM</scp> 2 is involved in stomatal movement by modulating inward K ⁺ currents in maize guard cells. Plant Journal, 2017, 92, 662-675.	2.8	21
4916	The Impact of Heterozygous <i>KCNK3</i> Mutations Associated With Pulmonary Arterial Hypertension on Channel Function and Pharmacological Recovery. Journal of the American Heart Association, 2017, 6, .	1.6	34
4917	The enduring legacy of the "constant-field equation―in membrane ion transport. Journal of General Physiology, 2017, 149, 911-920.	0.9	18
4918	The lysosomal potassium channel TMEM175 adopts a novel tetrameric architecture. Nature, 2017, 547, 472-475.	13.7	57
4919	Venom-derived peptides inhibiting Kir channels: Past, present, and future. Neuropharmacology, 2017, 127, 161-172.	2.0	22
4920	Channel opening and gating mechanism in AMPA-subtype glutamate receptors. Nature, 2017, 549, 60-65.	13.7	183
4921	Relation between selectivity and conductivity in narrow ion channels. , 2017, , .		5
4922	TRPP2 ion channels: Critical regulators of organ morphogenesis in health and disease. Cell Calcium, 2017, 66, 25-32.	1.1	26
4923	Giant liposome formation toward the synthesis of well-defined artificial cells. Journal of Materials Chemistry B, 2017, 5, 5911-5923.	2.9	65
4924	TRPV1 temperature activation is specifically sensitive to strong decreases in amino acid hydrophobicity. Scientific Reports, 2017, 7, 549.	1.6	21
4925	A Glimpse of Membrane Transport through Structures—Advances in the Structural Biology of the GLUT Glucose Transporters. Journal of Molecular Biology, 2017, 429, 2710-2725.	2.0	61
4926	Genomic insights into the virulence and salt tolerance of Staphylococcus equorum. Scientific Reports, 2017, 7, 5383.	1.6	34
4927	Transmembrane allosteric energetics characterization for strong coupling between proton and potassium ion binding in the KcsA channel. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 8788-8793.	3.3	46
4928	Modelling the interactions between animal venom peptides and membrane proteins. Neuropharmacology, 2017, 127, 20-31.	2.0	14
4930	Bioinspired Energy Conversion in Nanofluidics: A Paradigm of Material Evolution. Advanced Materials, 2017, 29, 1702773.	11.1	103
4931	SMIT1 Modifies KCNQ Channel Function and Pharmacology by Physical Interaction with the Pore. Biophysical Journal, 2017, 113, 613-626.	0.2	20

#	Article	IF	Citations
4932	IP3 receptor signaling and endothelial barrier function. Cellular and Molecular Life Sciences, 2017, 74, 4189-4207.	2.4	12
4933	Development of hydroxylated cucurbit[n]urils, their derivatives and potential applications. Coordination Chemistry Reviews, 2017, 348, 1-24.	9.5	82
4934	Mg ²⁺ -Channel-Inspired Nanopores for Mg ²⁺ /Li ⁺ Separation: The Effect of Coordination on the Ionic Hydration Microstructures. Langmuir, 2017, 33, 9201-9210.	1.6	38
4935	Ring-like N-fold Models of Aβ42 fibrils. Scientific Reports, 2017, 7, 6588.	1.6	26
4936	Selective exclusion and selective binding both contribute to ion selectivity in KcsA, a model potassium channel. Journal of Biological Chemistry, 2017, 292, 15552-15560.	1.6	9
4937	Dynamics of Membrane Proteins. Springer Series in Biophysics, 2017, , 219-241.	0.4	2
4938	Negligible cation effect on the vibrational relaxation dynamics of water molecules in NaClO ₄ and LiClO ₄ aqueous electrolyte solutions. RSC Advances, 2017, 7, 52111-52117.	1.7	12
4939	Charge transport in graphene oxide. Nano Today, 2017, 17, 38-53.	6.2	31
4940	Ion Transport across Biological Membranes by Carborane-Capped Gold Nanoparticles. ACS Nano, 2017, 11, 12492-12499.	7.3	43
4941	Validating a Coarse-Grained Voltage Activation Model by Comparing Its Performance to the Results of Monte Carlo Simulations. Journal of Physical Chemistry B, 2017, 121, 11284-11291.	1.2	12
4942	Mechanisms of Drug Binding to Voltage-Gated Sodium Channels. Handbook of Experimental Pharmacology, 2017, 246, 209-231.	0.9	13
4943	Conservation and variability of the pore-lining helices in P-loop channels. Channels, 2017, 11, 660-672.	1.5	11
4944	Transmembrane Interactions of Full-length Mammalian Bitopic Cytochrome-P450-Cytochrome-b5 Complex in Lipid Bilayers Revealed by Sensitivity-Enhanced Dynamic Nuclear Polarization Solid-state NMR Spectroscopy. Scientific Reports, 2017, 7, 4116.	1.6	32
4945	Occurrence of rubidium and cesium in Iqe coal, Qinghai-Tibet Plateau: Evidence from sequential chemical extraction experiment. Energy Exploration and Exploitation, 2017, 35, 376-387.	1.1	8
4946	Dehydration as a Universal Mechanism for Ion Selectivity in Graphene and Other Atomically Thin Pores. Nano Letters, 2017, 17, 4719-4724.	4.5	161
4947	Building membrane nanopores. Nature Nanotechnology, 2017, 12, 619-630.	15.6	235
4948	Mibefradil inhibition of the Cole-Moore shift and K+-conductance of the tumor-related Kv10.1 channel. Channels, 2017, 11, 373-376.	1.5	8
4949	Linoleic acid: Is this the key that unlocks the quantum brain? Insights linking broken symmetries in molecular biology, mood disorders and personalistic emergentism. BMC Neuroscience, 2017, 18, 38.	0.8	15

#	Article	IF	CITATIONS
4950	Palladium-Mediated Synthesis of a Near-Infrared Fluorescent K ⁺ Sensor. Journal of Organic Chemistry, 2017, 82, 8199-8205.	1.7	14
4951	Bubble gating in biological ion channels: A density functional theory study. Physical Review E, 2017, 95, 062407.	0.8	11
4952	Graphene Oxide Nanoribbon Assembly toward Moistureâ€Powered Information Storage. Advanced Materials, 2017, 29, 1604972.	11.1	118
4953	A monodisperse transmembrane α-helical peptide barrel. Nature Chemistry, 2017, 9, 411-419.	6.6	97
4954	The opposite effects of sodium and potassium cations on water dynamics. Chemical Science, 2017, 8, 1429-1435.	3.7	39
4955	Nonconventional cation-coupled flagellar motors derived from the alkaliphilic Bacillus and Paenibacillus species. Extremophiles, 2017, 21, 3-14.	0.9	17
4956	Molecular Pathophysiology of Congenital Long QT Syndrome. Physiological Reviews, 2017, 97, 89-134.	13.1	130
4957	Molecular Determinants of BK Channel Functional Diversity and Functioning. Physiological Reviews, 2017, 97, 39-87.	13.1	213
4958	Toxicological perspective on the osmoregulation and ionoregulation physiology of major ions by freshwater animals: Teleost fish, crustacea, aquatic insects, and Mollusca. Environmental Toxicology and Chemistry, 2017, 36, 576-600.	2.2	122
4959	Elucidation of pyrethroid and DDT receptor sites in the voltage-gated sodium channel. NeuroToxicology, 2017, 60, 171-177.	1.4	36
4960	Molecular mechanisms of Slo2 K ⁺ channel closure. Journal of Physiology, 2017, 595, 2321-2336.	1.3	9
4961	Hysteresis in voltage-gated channels. Channels, 2017, 11, 140-155.	1.5	36
4962	Intracellular distribution and stability of a luminescent rhenium(<scp>i</scp>) tricarbonyl tetrazolato complex using epifluorescence microscopy in conjunction with X-ray fluorescence imaging. Metallomics, 2017, 9, 382-390.	1.0	31
4963	Self-assembling Venturi-like peptide nanotubes. Nanoscale, 2017, 9, 748-753.	2.8	27
4964	Incorporating Born solvation energy into the three-dimensional Poisson-Nernst-Planck model to study ion selectivity in KcsA K+ channels. Physical Review E, 2017, 96, 062416.	0.8	25
4965	Membrane Organization and Dynamics. Springer Series in Biophysics, 2017, , .	0.4	5
4966	Ion channels and ion selectivity. Essays in Biochemistry, 2017, 61, 201-209.	2.1	85
4968	Flexible Proteins at the Origin of Life. Life, 2017, 7, 23.	1.1	16

	CHATION K		
#	ARTICLE	IF	CITATIONS
4969	Sterol Regulation of Voltage-Gated K+ Channels. Current Topics in Membranes, 2017, 80, 255-292.	0.5	14
4970	The Synergetic Effects of Combining Structural Biology and EPR Spectroscopy on Membrane Proteins. Crystals, 2017, 7, 117.	1.0	5
4971	Nonequilibrium Thermodynamics of Ion Flux through Membrane Channels. Entropy, 2017, 19, 40.	1.1	2
4972	The Ih Channel Gene Promotes Synaptic Transmission and Coordinated Movement in Drosophila melanogaster. Frontiers in Molecular Neuroscience, 2017, 10, 41.	1.4	4
4973	Regulation of Proliferation by a Mitochondrial Potassium Channel in Pancreatic Ductal Adenocarcinoma Cells. Frontiers in Oncology, 2017, 7, 239.	1.3	13
4974	Ion Transport Mechanism of the Microbial Rhodopsins Revealed by Electrophysiological Studies. Seibutsu Butsuri, 2017, 57, 179-185.	0.0	0
4975	In Touch With the Mechanosensitive Piezo Channels. Current Topics in Membranes, 2017, 79, 159-195.	0.5	48
4976	Solution Nuclear Magnetic Resonance Spectroscopy of Integral Membrane Proteins \hat{a} †. , 2017, , .		1
4977	Modeling and Design for Membrane Protein Targets. , 2017, , 145-188.		3
4978	A novel fluctuational approach to analysis of the permeation in ion channels. , 2017, , .		0
4979	The Structural Basis for Sensing byÂthe Piezo1 Protein. Current Topics in Membranes, 2017, 79, 135-158.	0.5	8
4980	Relative dielectric constants and selectivity ratios in open ionic channels. Computational and Mathematical Biophysics, 2017, 5, 125-137.	0.6	7
4981	SUMOylation and calcium signalling: potential roles in the brain and beyond. Neuronal Signaling, 2017, 1, NS20160010.	1.7	6
4982	The Supramolecular Alkali Metal Cation–π Interaction. , 2017, , 103-120.		2
4983	Extraction and Transport. , 2017, , 369-379.		1
4984	Information transmission in microbial and fungal communication: from classical to quantum. Journal of Cell Communication and Signaling, 2018, 12, 491-502.	1.8	15
4985	Perturbations of Native Membrane Protein Structure in Alkyl Phosphocholine Detergents: A Critical Assessment of NMR and Biophysical Studies. Chemical Reviews, 2018, 118, 3559-3607.	23.0	132
4986	Elastic strain and twist analysis of protein structural data and allostery of the transmembrane channel KcsA. Physical Biology, 2018, 15, 036004.	0.8	5

#	Article	IF	CITATIONS
4987	Efficient structural elucidation of microhydrated biomolecules through the interrogation of hydrogen bond networks. Physical Chemistry Chemical Physics, 2018, 20, 8185-8191.	1.3	2
4988	Structure and Dynamics of Membrane Proteins from Solid-State NMR. Annual Review of Biophysics, 2018, 47, 201-222.	4.5	105
4989	Reconstitution and functional characterization of ion channels from nanodiscs in lipid bilayers. Journal of General Physiology, 2018, 150, 637-646.	0.9	34
4990	Insight into tetrodotoxin blockade and resistance mechanisms of Na _v 1.2 sodium channel by theoretical approaches. Chemical Biology and Drug Design, 2018, 92, 1445-1457.	1.5	4
4991	Characterization of the σ-Pore in Mutant hKv1.3 Potassium Channels. Cellular Physiology and Biochemistry, 2018, 46, 1112-1121.	1.1	2
4992	Beyond voltage-gated ion channels: Voltage-operated membrane proteins and cellular processes. Journal of Cellular Physiology, 2018, 233, 6377-6385.	2.0	7
4993	Water and hydrophobic gates in ion channels and nanopores. Faraday Discussions, 2018, 209, 231-247.	1.6	48
4994	Lipid Bilayers Manipulated through Monolayer Technologies for Studies of Channel-Membrane Interplay. Biological and Pharmaceutical Bulletin, 2018, 41, 303-311.	0.6	13
4995	Kinetic contribution to extracellular Na + /K + selectivity in the Na + /K + pump. FEBS Open Bio, 2018, 8, 854-859.	1.0	1
4996	Quantum Mechanics of the Cell: An Emerging Field. , 2018, , 355-376.		0
4997	Ion Permeation Mechanism in Epithelial Calcium Channel TRVP6. Scientific Reports, 2018, 8, 5715.	1.6	30
4998	Plant potassium nutrition in ectomycorrhizal symbiosis: properties and roles of the three fungal TOK potassium channels in <i>Hebeloma cylindrosporum</i> . Environmental Microbiology, 2018, 20, 1873-1887.	1.8	26
4999	Voltage and pH sensing by the voltage-gated proton channel, H _V 1. Journal of the Royal Society Interface, 2018, 15, 20180108.	1.5	57
5000	Microbial expression systems for membrane proteins. Methods, 2018, 147, 3-39.	1.9	57
5001	Ion‣elective Electrodes Based on Hydrophilic Ionophoreâ€Modified Nanopores. Angewandte Chemie, 2018, 130, 4842-4845.	1.6	16
5002	A Switchable Helical Capsule for Encapsulation and Release of Potassium Ion. Journal of Organic Chemistry, 2018, 83, 1898-1902.	1.7	18
5003	Chronic Alcohol, Intrinsic Excitability, and Potassium Channels: Neuroadaptations and Drinking Behavior. Handbook of Experimental Pharmacology, 2018, 248, 311-343.	0.9	28
5004	The founding of <i>Journal of General Physiology</i> : Membrane permeation and ion selectivity. Journal of General Physiology, 2018, 150, 389-400.	0.9	9

#	Article	IF	CITATIONS
5005	Never at rest: insights into the conformational dynamics of ion channels from cryoâ€electron microscopy. Journal of Physiology, 2018, 596, 1107-1119.	1.3	22
5006	Ultrafast selective transport of alkali metal ions in metal organic frameworks with subnanometer pores. Science Advances, 2018, 4, eaaq0066.	4.7	368
5007	Belowâ€ground resource partitioning alone cannot explain the biodiversity–ecosystem function relationship: A field test using multiple tracers. Journal of Ecology, 2018, 106, 2002-2018.	1.9	53
5008	Ionâ€Selective Electrodes Based on Hydrophilic Ionophoreâ€Modified Nanopores. Angewandte Chemie - International Edition, 2018, 57, 4752-4755.	7.2	41
5009	Two-Dimensional Spectroscopy Is Being Used to Address Core Scientific Questions in Biology and Materials Science. Journal of Physical Chemistry B, 2018, 122, 1771-1780.	1.2	65
5010	Structural insights into the mechanisms of CNBD channel function. Journal of General Physiology, 2018, 150, 225-244.	0.9	84
5012	Permeating disciplines: Overcoming barriers between molecular simulations and classical structure-function approaches in biological ion transport. Biochimica Et Biophysica Acta - Biomembranes, 2018, 1860, 927-942.	1.4	8
5013	Insight into the Role of the Hv1 C-Terminal Domain in Dimer Stabilization. Journal of Physical Chemistry B, 2018, 122, 1037-1048.	1.2	4
5014	Opening of the human epithelial calcium channel TRPV6. Nature, 2018, 553, 233-237.	13.7	186
5015	A Coupled Ionization-Conformational Equilibrium Is Required To Understand the Properties of Ionizable Residues in the Hydrophobic Interior of Staphylococcal Nuclease. Journal of the American Chemical Society, 2018, 140, 1639-1648.	6.6	22
5016	Electrostatic Interactions in Protein Structure, Folding, Binding, and Condensation. Chemical Reviews, 2018, 118, 1691-1741.	23.0	577
5017	The gating mechanism in cyclic nucleotide-gated ion channels. Scientific Reports, 2018, 8, 45.	1.6	19
5018	Bioinspired smart asymmetric nanochannel membranes. Chemical Society Reviews, 2018, 47, 322-356.	18.7	372
5019	Large Conductance Potassium Channels in the Nervous System. , 0, , 486-544.		2
5020	Quantum-confined superfluid: From nature to artificial. Science China Materials, 2018, 61, 1027-1032.	3.5	73
5021	Entrance of Channel Determines Ion Permeation Rate through the Kv1.2 Channel. Seibutsu Butsuri, 2018, 58, 012-016.	0.0	1
5022	Dimerization of the voltage-sensing phosphatase controls its voltage-sensing and catalytic activity. Journal of General Physiology, 2018, 150, 683-696.	0.9	15
5024	Impact of PEG additives and pore rim functionalization on water transport through sub-1Ânm carbon nanotube porins. Faraday Discussions, 2018, 209, 359-369.	1.6	5

#	Article	IF	CITATIONS
5025	Scorpion toxins to unravel the conundrum of ion channel structure and functioning. Toxicon, 2018, 150, 17-27.	0.8	23
5026	X-ray crystallography of TRP channels. Channels, 2018, 12, 137-152.	1.5	5
5027	Structural mechanisms of CFTR function and dysfunction. Journal of General Physiology, 2018, 150, 539-570.	0.9	90
5028	Succinate-acetate permease from Citrobacter koseri is an anion channel that unidirectionally translocates acetate. Cell Research, 2018, 28, 644-654.	5.7	15
5029	Concurrent <i>In Vitro</i> Synthesis and Functional Detection of Nascent Activity of the KcsA Channel under a Membrane Potential. ACS Synthetic Biology, 2018, 7, 1004-1011.	1.9	3
5030	A single NaK channel conformation is not enough for non-selective ion conduction. Nature Communications, 2018, 9, 717.	5.8	52
5031	Two-dimensional infrared (2D IR) spectroscopy for elucidating ion occupancies in the selectivity filter of ion channels1. Biomedical Spectroscopy and Imaging, 2018, 7, 3-15.	1.2	0
5032	Genome-wide analysis indicates diverse physiological roles of the turnip (Brassica rapa var. rapa) oligopeptide transporters gene family. Plant Diversity, 2018, 40, 57-67.	1.8	9
5033	Solution structure of extracellular loop of human β4 subunit of BK channel and its biological implication on ChTX sensitivity. Scientific Reports, 2018, 8, 4571.	1.6	5
5034	A bio-inspired dumbbell-shaped nanochannel with a controllable structure and ionic rectification. Nanoscale, 2018, 10, 6850-6854.	2.8	25
5035	Structural properties determining low K+ affinity of the selectivity filter in the TWIK1 K+ channel. Journal of Biological Chemistry, 2018, 293, 6969-6984.	1.6	11
5036	Selective Ligands and Drug Discovery Targeting the Voltage-Gated Sodium Channel Nav1.7. Handbook of Experimental Pharmacology, 2018, 246, 271-306.	0.9	27
5037	On the structure and mechanism of twoâ€pore channels. FEBS Journal, 2018, 285, 233-243.	2.2	38
5038	Mitochondrial potassium channels in cell death. Biochemical and Biophysical Research Communications, 2018, 500, 51-58.	1.0	25
5039	Insights into channel dysfunction from modelling and molecular dynamics simulations. Neuropharmacology, 2018, 132, 20-30.	2.0	11
5040	Selective lithium ion recognition in self-assembled columnar liquid crystals based on a lithium receptor. Chemical Science, 2018, 9, 608-616.	3.7	28
5041	Potassium Channels. Methods in Molecular Biology, 2018, , .	0.4	0
5042	Studying Kv Channels Function using Computational Methods. Methods in Molecular Biology, 2018, 1684, 321-341.	0.4	4

#	Article	IF	CITATIONS
5043	The secret life of ion channels: Kv1.3 potassium channels and proliferation. American Journal of Physiology - Cell Physiology, 2018, 314, C27-C42.	2.1	63
5044	Molecular Regulation of Cardiac Inward Rectifier Potassium Channels by Pharmacological Agents. , 2018, , 122-127.		1
5045	Natural product modulators of human sensations and mood: molecular mechanisms and therapeutic potential. Chemical Society Reviews, 2018, 47, 1592-1637.	18.7	28
5046	Potassium Channels: A Potential Therapeutic Target for Parkinson's Disease. Neuroscience Bulletin, 2018, 34, 341-348.	1.5	39
5047	lon–protein interactions of a potassium ion channel studied by attenuated total reflection Fourier transform infrared spectroscopy. Biophysical Reviews, 2018, 10, 235-239.	1.5	8
5048	Inhibition of the K+ conductance and Cole-Moore shift of the oncogenic Kv10.1 channel by amiodarone. Pflugers Archiv European Journal of Physiology, 2018, 470, 491-503.	1.3	4
5049	A perspective on Na and K channel inactivation. Journal of General Physiology, 2018, 150, 7-18.	0.9	26
5050	Bacterial Mechanosensors. Annual Review of Physiology, 2018, 80, 71-93.	5.6	140
5051	Clinical and molecular characterization of <i>KCNT1</i> -related severe early-onset epilepsy. Neurology, 2018, 90, e55-e66.	1.5	89
5052	Selective ion-permeation through strained and charged graphene membranes. Nanotechnology, 2018, 29, 035402.	1.3	14
5053	Experimental and Theoretical Study of Water and Solute Transport in Organic-Rich Carbonate Mudrocks. SPE Journal, 2018, 23, 704-718.	1.7	10
5054	Voltage-Gated Potassium Channels. , 2018, , 25-37.		2
5055	Structural and Molecular Bases of Cardiac Inward Rectifier Potassium Channel Function. , 2018, , 38-48.		0
5056	Mesenchymal stem cell differentiation: Control by calciumâ€activated potassium channels. Journal of Cellular Physiology, 2018, 233, 3755-3768.	2.0	45
5057	The Role of Noise in Determining Selective Ionic Conduction Through Nano-Pores. , 2018, , .		4
5058	Secreted Cysteine-Rich Repeat Proteins "SCREPs†A Novel Multi-Domain Architecture. Frontiers in Pharmacology, 2018, 9, 1333.	1.6	15
5060	Implication of Quorum Sensing System in Biofilm Formation and Virulence. , 2018, , .		1
5061	Mathematical Model of Quorum Sensing and Biofilm. , 2018, , 351-368.		2

#	Article	IF	Citations
5063	Effect of L, T and N-Type Calcium Channels on Retinal Ganglion Cells. Materials Today: Proceedings, 2018, 5, 1929-1935.	0.9	1
5064	Quantum Calculations on a Voltage Sensing Domain of KV1.2: H+ Transfer and Gating Current. Biophysical Journal, 2018, 114, 475a.	0.2	1
5065	Thermodynamics of voltage-gated ion channels. Biophysics Reports, 2018, 4, 300-319.	0.2	22
5066	Eukaryotic Voltage-Gated Sodium Channels: On Their Origins, Asymmetries, Losses, Diversification and Adaptations. Frontiers in Physiology, 2018, 9, 1406.	1.3	28
5068	Crystal structure of the C-terminal four-helix bundle of the potassium channel KCa3.1. PLoS ONE, 2018, 13, e0199942.	1.1	6
5069	Structure and activity of lipid bilayer within a membrane-protein transporter. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, 12985-12990.	3.3	119
5070	Experimental Determination of Particle Size-Dependent Surface Charge Density for Silica Nanospheres. Journal of Physical Chemistry C, 2018, 122, 23764-23771.	1.5	33
5071	A Rationale for Mesoscopic Domain Formation in Biomembranes. Biomolecules, 2018, 8, 104.	1.8	12
5072	The lipid bilayer membrane and its protein constituents. Journal of General Physiology, 2018, 150, 1472-1483.	0.9	44
5073	The Role of Proton Transport in Gating Current in a Voltage Gated Ion Channel, as Shown by Quantum Calculations. Sensors, 2018, 18, 3143.	2.1	6
5074	ATP‧ensitive Potassium Channels and Their Physiological and Pathophysiological Roles. , 2018, 8, 1463-1511.		99
5075	Vibrational and Molecular Properties of Mg ²⁺ Binding and Ion Selectivity in the Magnesium Channel MgtE. Journal of Physical Chemistry B, 2018, 122, 9681-9696.	1.2	5
5076	How Do Amides Affect the Electronic Properties of Pyrene?. ACS Omega, 2018, 3, 12857-12867.	1.6	22
5077	Simulation Studies and Dynamic Interaction of Venom Peptides with Ion Channels. Protein and Peptide Letters, 2018, 25, 652-662.	0.4	1
5078	Evolution and Structural Characteristics of Plant Voltage-Gated K ⁺ Channels. Plant Cell, 2018, 30, 2898-2909.	3.1	51
5079	Brownian Motions. Graduate Texts in Physics, 2018, , 241-268.	0.1	1
5080	Carriers, exchangers, and cotransporters in the first 100 years of the Journal of General Physiology. Journal of General Physiology, 2018, 150, 1063-1080.	0.9	6
5081	Ion Channels in Pulmonary Hypertension: A Therapeutic Interest?. International Journal of Molecular Sciences, 2018, 19, 3162.	1.8	61

#	Article	IF	CITATIONS
5082	Polyamines and potassium channels: A 25-year romance. Journal of Biological Chemistry, 2018, 293, 18779-18788.	1.6	67
5083	Anomalous X-ray diffraction studies of ion transport in K+ channels. Nature Communications, 2018, 9, 4540.	5.8	42
5084	Distinct functional elements for outer-surface anti-interference and inner-wall ion gating of nanochannels. Nature Communications, 2018, 9, 4557.	5.8	112
5085	3D Structures and Molecular Evolution of Ion Channels. , 2018, , .		2
5086	Molecular Dynamics of Ion Conduction through the Selectivity Filter of the Na _V Ab Sodium Channel. Journal of Physical Chemistry B, 2018, 122, 10126-10142.	1.2	26
5087	Polyamine-mediated channel block of ionotropic glutamate receptors and its regulation by auxiliary proteins. Journal of Biological Chemistry, 2018, 293, 18789-18802.	1.6	50
5088	Artificial water channels: inspiration, progress, and challenges. Faraday Discussions, 2018, 209, 415-427.	1.6	15
5089	Misfolding of a DNAzyme for ultrahigh sodium selectivity over potassium. Nucleic Acids Research, 2018, 46, 10262-10271.	6.5	21
5090	Elucidation of the Origin of Thixotropic-Inducing Properties of Additive Amphiphiles and the Creation of a High-Performance Triamide Amphiphile. Langmuir, 2018, 34, 11913-11924.	1.6	12
5091	Assigning crystallographic electron densities with free energy calculations—The case of the fluoride channel Fluc. PLoS ONE, 2018, 13, e0196751.	1.1	5
5092	A universal tunable nanofluidic diode via photoresponsive host–guest interactions. NPG Asia Materials, 2018, 10, 849-857.	3.8	30
5093	Quantum Dynamics and Non-Local Effects Behind Ion Transition States during Permeation in Membrane Channel Proteins. Entropy, 2018, 20, 558.	1.1	15
5094	Genes for Membrane Transport Proteins: Not So Rare in Viruses. Viruses, 2018, 10, 456.	1.5	17
5095	Coulomb interaction rules timescales in potassium ion channel tunneling. Journal of Physics Condensed Matter, 2018, 30, 255101.	0.7	3
5096	Synthesis and characterization structural of alkali cations (Li + , Na + , K + , Rb + , Cs +) carboxylate-dithiocarbamate complexes of L-Proline. Journal of Molecular Structure, 2018, 1169, 68-74.	1.8	4
5097	A review of Handbook of Ion Channels, by Jie Zheng and Matthew C. Trudeau. Contemporary Physics, 2018, 59, 305-307.	0.8	0
5098	Bioinspired Ionic Diodes: From Unipolar to Bipolar. Advanced Functional Materials, 2018, 28, 1801079.	7.8	82
5099	Directional K+ channel insertion in a single phospholipid bilayer: Neutron reflectometry and electrophysiology in the joint exploration of a model membrane functional platform. Biochimica Et Biophysica Acta - General Subjects, 2018, 1862, 1742-1750.	1.1	13

		CITATION REPORT		
#	Article		IF	CITATIONS
5100	Golden aspect ratio for ion transport simulation in nanopores. Physical Review E, 2018,	98, 012404.	0.8	11
5101	The diversity of venom components of the scorpion species Paravaejovis schwenkmeyer	i (Scorpiones:) Tj ETQq1 I	1 0.78431 0.8	4 rgBT /Ove
5102	A forward genetic screen identifies chaperone CNX-1 as a conserved biogenesis regulate channels. Journal of General Physiology, 2018, 150, 1189-1201.	or of ERG K+	0.9	9
5103	Cryo-EM structure of a mitochondrial calcium uniporter. Science, 2018, 361, 506-511.		6.0	116
5104	Reconstitution and Electrophysiological Characterization of Ion Channels in Lipid Bilayer Protocols in Pharmacology, 2018, 81, e37.	rs. Current	4.0	6
5105	Known structures and unknown mechanisms of TMEM16 scramblases and channels. Jou General Physiology, 2018, 150, 933-947.	irnal of	0.9	92
5106	LRRC8 N termini influence pore properties and gating of volume-regulated anion channe Journal of Biological Chemistry, 2018, 293, 13440-13451.	els (VRACs).	1.6	30
5107	The Rationale Behind This Workbook. Learning Materials in Biosciences, 2018, , 1-6.		0.2	0
5108	Probing Backbone Hydrogen Bonds in Proteins by Amideâ€ŧoâ€Ester Mutations. ChemE 2136-2145.	SioChem, 2018, 19,	1.3	11
5109	Advances in Membrane Proteins. , 2018, , .			0
5110	The conformational wave in capsaicin activation of transient receptor potential vanilloid channel. Nature Communications, 2018, 9, 2879.	1 ion	5.8	54
5111	CLC Chloride Channels and Transporters: Structure, Function, Physiology, and Disease. Reviews, 2018, 98, 1493-1590.	Physiological	13.1	308
5112	Voltage-Sensing Phosphatases: Biophysics, Physiology, and Molecular Engineering. Phys Reviews, 2018, 98, 2097-2131.	iological	13.1	34
5113	Exploring Protein Structure: Principles and Practice. Learning Materials in Biosciences, 2	018, , .	0.2	3
5114	Tuning Insect Odorant Receptors. Frontiers in Cellular Neuroscience, 2018, 12, 94.		1.8	50
5115	An Archive and a Tool: PDB and PyMOL. Learning Materials in Biosciences, 2018, , 7-28.		0.2	2
5116	Ion Channels. , 2018, , 17-45.			0
5117	Site-specific ion occupation in the selectivity filter causes voltage-dependent gating in a channel. Scientific Reports, 2018, 8, 10406.	viral K+	1.6	17

#	Article	IF	CITATIONS
5118	Single-file transport of water through membrane channels. Faraday Discussions, 2018, 209, 9-33.	1.6	65
5119	X-ray and cryo-EM structures of the mitochondrial calcium uniporter. Nature, 2018, 559, 575-579.	13.7	117
5120	Cryo-EM structures of fungal and metazoanÂmitochondrialÂcalcium uniporters. Nature, 2018, 559, 580-584.	13.7	129
5121	Cryo-EM structure of a fungal mitochondrial calcium uniporter. Nature, 2018, 559, 570-574.	13.7	125
5122	Unraveling Mechanisms of Chiral Induction in Double-Helical Metallopolymers. Journal of the American Chemical Society, 2018, 140, 10344-10353.	6.6	59
5123	Direct knock-on of desolvated ions governs strict ion selectivity in K+ channels. Nature Chemistry, 2018, 10, 813-820.	6.6	170
5124	The naked truth about K+ selectivity. Nature Chemistry, 2018, 10, 799-800.	6.6	6
5125	Scissoring genes with light. Nature Chemistry, 2018, 10, 800-801.	6.6	0
5126	Computational Models. , 2018, , 105-131.		2
5127	Cryo-EM structure of the cytoplasmic domain of murine transient receptor potential cation channel subfamily C member 6 (TRPC6). Journal of Biological Chemistry, 2018, 293, 10381-10391.	1.6	43
5128	Movement of Potassium lons inside KcsA in the High Concentration Regime using a Molecular Dynamics Simulation. Journal of the Korean Physical Society, 2018, 72, 1013-1019.	0.3	0
5129	Ion-triggered selectivity in bacterial sodium channels. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, 5450-5455.	3.3	24
5130	Inverted allosteric coupling between activation and inactivation gates in K ⁺ channels. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, 5426-5431.	3.3	44
5131	Conformational Effects in the Transport of Glucose through a Cyclic Peptide Nanotube: A Molecular Dynamics Simulation Study. Journal of Physical Chemistry B, 2018, 122, 8174-8184.	1.2	6
5132	The N terminus and transmembrane segment S1 of Kv1.5 can coassemble with the rest of the channel independently of the S1–S2 linkage. Journal of Biological Chemistry, 2018, 293, 15347-15358.	1.6	4
5133	Predicting Structural Details of the Sodium Channel Pore Basing on Animal Toxin Studies. Frontiers in Pharmacology, 2018, 9, 880.	1.6	20
5136	The permeation mechanism of organic cations through a CNG mimic channel. PLoS Computational Biology, 2018, 14, e1006295.	1.5	1
5137	Computational Study of the Loss-of-Function Mutations in the Kv1.5 Channel Associated with Atrial Fibrillation. ACS Omega, 2018, 3, 8882-8890.	1.6	6

#	Article	IF	Citations
5138	Dipole-induced effects on charge transfer and charge transport. Why do molecular electrets matter?. Canadian Journal of Chemistry, 2018, 96, 843-858.	0.6	20
5139	Restoring Vision to the Blind with Chemical Photoswitches. Chemical Reviews, 2018, 118, 10748-10773.	23.0	120
5140	Roles of different amino-acid residues towards binding and selective transport of K ⁺ through KcsA K ⁺ -ion channel. Physical Chemistry Chemical Physics, 2018, 20, 17517-17529.	1.3	10
5141	Episodic ataxias. Handbook of Clinical Neurology / Edited By P J Vinken and G W Bruyn, 2018, 148, 521-529.	1.0	9
5142	Cryo-EM in drug discovery: achievements, limitations and prospects. Nature Reviews Drug Discovery, 2018, 17, 471-492.	21.5	304
5143	Membrane Proteins and Their Natural Environment. Biological and Medical Physics Series, 2018, , 1-57.	0.3	0
5144	Molecular Mechanism of Conductance Enhancement in Narrow Cation-Selective Membrane Channels. Journal of Physical Chemistry Letters, 2018, 9, 3497-3502.	2.1	12
5145	Effects of protein-protein interactions and ligand binding on the ion permeation in KCNQ1 potassium channel. PLoS ONE, 2018, 13, e0191905.	1.1	17
5146	Potassium and Calcium Isotopic Fractionation by Plants (Soybean [<i>Clycine max</i>], Rice [<i>Oryza) Tj ETQqQ</i>	0 0 0 rgBT 1.2 rgBT	/Overlock 10
5147	Lipid roles in hERG function and interactions with drugs. Neuroscience Letters, 2019, 700, 70-77.	1.0	12
5148	Electrostatic state of the cytoplasmic domain influences inactivation at the selectivity filter of the KcsA potassium channel. Biochimica Et Biophysica Acta - Biomembranes, 2019, 1861, 220-227.	1.4	3
5149	Anionic Phospholipids Bind to and Modulate the Activity of Human TRESK Background K+ Channel. Molecular Neurobiology, 2019, 56, 2524-2541.	1.9	9
5150	Sodium and Potassium. , 2019, , 261-288.		0
5151	Voltage Sensing Comes to Rest. Cell, 2019, 178, 776-778.	13.5	2
5152	Atomic Mechanisms of Timothy Syndrome-Associated Mutations in Calcium Channel Cav1.2. Frontiers in Physiology, 2019, 10, 335.	1.3	11
5153	The conduction pathway of potassium channels is water free under physiological conditions. Science Advances, 2019, 5, eaaw6756.	4.7	48
5154	Selectivity of the KcsA potassium channel: Analysis and computation. Physical Review E, 2019, 100, 022406.	0.8	10
5155	Highâ€Precision Size Recognition and Separation in Synthetic 1D Nanochannels. Angewandte Chemie - International Edition, 2019, 58, 15922-15927.	7.2	50

#	Article	IF	CITATIONS
5156	Highâ€Precision Size Recognition and Separation in Synthetic 1D Nanochannels. Angewandte Chemie, 2019, 131, 16069-16074.	1.6	13
5157	Inactivation in the potassium channel KcsA. Journal of Structural Biology: X, 2019, 3, 100009.	0.7	14
5158	The role of ï€-helices in TRP channel gating. Current Opinion in Structural Biology, 2019, 58, 314-323.	2.6	47
5159	Mechanisms of Ion Transport in Halophytes: From Roots to Leaves. Tasks for Vegetation Science, 2019, , 125-150.	0.6	5
5160	A Structural Model of the Inactivation Gate of Voltage-Activated Potassium Channels. Biophysical Journal, 2019, 117, 377-387.	0.2	5
5161	Optimal transport and colossal ionic mechano-conductance in graphene crown ethers. Science Advances, 2019, 5, eaaw5478.	4.7	37
5162	Ion Channels and Action Potential Generation. , 2019, , 35-63.		1
5163	Modulation of the potassium channel KcsA by anionic phospholipids: Role of arginines at the non-annular lipid binding sites. Biochimica Et Biophysica Acta - Biomembranes, 2019, 1861, 183029.	1.4	22
5164	Venoms of Iranian Scorpions (Arachnida, Scorpiones) and Their Potential for Drug Discovery. Molecules, 2019, 24, 2670.	1.7	12
5165	<i>Colloquium</i> : Ionic phenomena in nanoscale pores through 2D materials. Reviews of Modern Physics, 2019, 91, .	16.4	48
5166	pH-Dependent Conformational Changes of KcsA Tetramer and Monomer Probed by Raman Spectroscopy. International Journal of Molecular Sciences, 2019, 20, 2736.	1.8	6
5167	High-speed AFM reveals accelerated binding of agitoxin-2 to a K ⁺ channel by induced fit. Science Advances, 2019, 5, eaax0495.	4.7	19
5168	Modeling of the Mechanism of the Electrical Transmembrane Potential Influence on the Hurst Exponents in the Sequence of Lifetimes of a Single Ion Channel. Biochemistry (Moscow) Supplement Series A: Membrane and Cell Biology, 2019, 13, 138-146.	0.3	0
5169	Devices for promising applications. , 2019, , 247-314.		0
5170	Biological and Bio-inspired Nanomaterials. Advances in Experimental Medicine and Biology, 2019, , .	0.8	8
5172	The influence of membrane bilayer thickness on KcsA channel activity. Channels, 2019, 13, 424-439.	1.5	12
5173	A channel profile report of the unusual K+ channel KtrB. Journal of General Physiology, 2019, 151, 1357-1368.	0.9	13
5174	Ion channels: the concept emerges. Journal of Physiology, 2019, 597, 5725-5729.	1.3	0

		CITATION REPORT		
#	Article		IF	CITATIONS
5175	Protein three-dimensional structures at the origin of life. Interface Focus, 2019, 9, 2019	0057.	1.5	19
5176	Influence of Chain Architecture on Nanopore Accessibility in Polyelectrolyte Blockâ€Coa Functionalized Mesopores. Small, 2019, 15, e1902710.	â€Oligomer	5.2	18
5177	Designing an All-Carbon Membrane for Water Desalination. Physical Review Applied, 20	19, 12, .	1.5	16
5178	Queueing arrival and release mechanism for K+ permeation through a potassium chann Physiological Sciences, 2019, 69, 919-930.	el. Journal of	0.9	12
5179	Molecular Determinants of Brevetoxin Binding to Voltage-Gated Sodium Channels. Toxi	ns, 2019, 11, 513.	1.5	13
5180	Multi-Asymmetric Ion-Diode Membranes with Superior Selectivity and Zero Concentrati Polarization Effect. ACS Nano, 2019, 13, 10761-10767.	on	7.3	23
5182	Mobility of hydrated alkali metal ions in metallosupramolecular ionic crystals. Chemical 2019, 10, 587-593.	Science,	3.7	30
5183	Permeation of greywater constituents in an aquaporin based biomimetic forward osmoprocess: experimental performance and modeling. Journal of Chemical Technology and 2019, 94, 1567-1575.	sis membrane Biotechnology,	1.6	7
5184	Supramolecular nanochannels self-assembled by helical pyridine–pyridazine oligomer: Communications, 2019, 55, 2509-2512.	s. Chemical	2.2	12
5185	Selective Ion Exchange in Supramolecular Channels in the Crystalline State. Angewandt International Edition, 2019, 58, 4169-4172.	e Chemie -	7.2	12
5186	Selective Ion Exchange in Supramolecular Channels in the Crystalline State. Angewandt 131, 4213-4216.	e Chemie, 2019,	1.6	3
5187	Novel approaches for designing drugs that interfere with pH regulation. Expert Opinion Discovery, 2019, 14, 231-248.	on Drug	2.5	35
5188	High-Affinity K+ Transporters from a Halophyte, <i>Sporobolus virginicus</i> , Mediate B Transport in Transgenic Arabidopsis, <i>X. laevis</i> Oocytes and Yeast. Plant and Cell Pl 60, 176-187.		1.5	12
5189	Artificial K ⁺ Channels Formed by Pillarareneâ€Cyclodextrin Hybrid Molecul Cation Selectivity and Generating Membrane Potential. Angewandte Chemie, 2019, 13		1.6	19
5190	lon–peptide interactions between alkali metal ions and a termini-protected dipeptide portion of the selectivity filter in K ⁺ channels. Physical Chemistry Chemica 21, 561-571.		1.3	21
5191	Voltage-gated sodium channels: structures, functions, and molecular modeling. Drug D Today, 2019, 24, 1389-1397.	iscovery	3.2	36
5192	Structural analysis of proteins using X-ray diffraction technique. , 2019, , 69-84.			3
5193	Microbially induced potassium enrichment in Paleoproterozoic shales and implications f weathering on early Earth. Nature Communications, 2019, 10, 2670.	for reverse	5.8	17

#	Article	IF	CITATIONS
5194	Crystallization of a potassium ion channel and X-ray and neutron data collection. Acta Crystallographica Section F, Structural Biology Communications, 2019, 75, 435-438.	0.4	3
5195	Permeation Mechanism of Potassium Ions through the Large Conductance Ca ²⁺ -Activated Potassium Channel. ACS Chemical Neuroscience, 2019, 10, 3601-3610.	1.7	1
5196	Atomistic Simulations of Membrane Ion Channel Conduction, Gating, and Modulation. Chemical Reviews, 2019, 119, 7737-7832.	23.0	87
5197	The interaction of an amphiphile crown ether with divalent metal ions. An electrochemical, Langmuir film, and molecular modeling study. Thin Solid Films, 2019, 683, 49-56.	0.8	4
5198	Solid-state nanopores for ion and small molecule analysis. Chinese Chemical Letters, 2019, 30, 1607-1617.	4.8	16
5199	Mesoscopic simulations at the physics-chemistry-biology interface. Reviews of Modern Physics, 2019, 91, .	16.4	36
5200	Recent advances in our understanding of the structure and function of more unusual cation channels. F1000Research, 2019, 8, 123.	0.8	6
5201	Kalium 2.0, a comprehensive database of polypeptide ligands of potassium channels. Scientific Data, 2019, 6, 73.	2.4	28
5202	Diverse Structural Features of Potassium Channels Characterized by Scorpion Toxins as Molecular Probes. Molecules, 2019, 24, 2045.	1.7	22
5203	Autoimmune Channelopathies at Neuromuscular Junction. Frontiers in Neurology, 2019, 10, 516.	1.1	26
5204	Evaluation of Radiation-Induced Damage in Membrane Ion Channels and Synaptic Receptors. Physics of Particles and Nuclei Letters, 2019, 16, 54-62.	0.1	6
5205	TRP ion channels: Proteins with conformational flexibility. Channels, 2019, 13, 207-226.	1.5	16
5206	Critical Knowledge Gaps in Mass Transport through Single-Digit Nanopores: A Review and Perspective. Journal of Physical Chemistry C, 2019, 123, 21309-21326.	1.5	234
5207	PACKMOL-Memgen: A Simple-To-Use, Generalized Workflow for Membrane-Protein–Lipid-Bilayer System Building. Journal of Chemical Information and Modeling, 2019, 59, 2522-2528.	2.5	121
5208	Preferred Formation of Heteromeric Channels between Coexpressed SK1 and IKCa Channel Subunits Provides a Unique Pharmacological Profile of Ca ²⁺ -Activated Potassium Channels. Molecular Pharmacology, 2019, 96, 115-126.	1.0	14
5209	cAMP-modulated biomimetic ionic nanochannels based on a smart polymer. Journal of Materials Chemistry B, 2019, 7, 3710-3715.	2.9	14
5210	A small viral potassium ion channel with an inherent inward rectification. Channels, 2019, 13, 124-135.	1.5	5
5211	Quantum-confined superfluid. Nanoscale Horizons, 2019, 4, 1029-1036.	4.1	27

ARTICLE IF CITATIONS # Biochemical and physiological properties of K+ channel-associated AKR6A (Kvl^2) proteins. 5212 1.7 5 Chemico-Biological Interactions, 2019, 305, 21-27. Conformational plasticity in the KcsA potassium channel pore helix revealed by homo-FRET studies. 1.6 19 Scientific Reports, 2019, 9, 6215. Structure-based insights into the mechanism of nucleotide import by HIV-1 capsid. Journal of 5214 7 1.3 Structural Biology, 2019, 207, 123-135. Identification of kinetic order parameters for non-equilibrium dynamics. Journal of Chemical Physics, 1.2 2019, 150, 164120. 1D Nanoconfined Orderedâ€Assembly Reaction. Advanced Materials Interfaces, 2019, 6, 1900104. 5216 1.9 25 Potassium channel selectivity filter dynamics revealed by single-molecule FRET. Nature Chemical Biology, 2019, 15, 377-383. Analysis of Single-Nucleotide Polymorphisms in Human Voltage-Gated Ion Channels. Journal of 5218 1.8 3 Protéome Research, 2019, 18, 2310-2320. From the Potential of the Mean Force to a Quasiparticle's Effective Potential in Narrow Ion Channels. 1.0 Fluctuation and Noise Letters, 2019, 18, 1940006. Substituent Effects on the Patterns of Intermolecular Interactions of 3-Alkvl and 3-Cvcloalkvl 5220 Derivatives of Phenytoin: A Crystallographic and Quantum-Chemical Study. Crystal Growth and 2 1.4 Design, 2019, 19, 2163-2174. The Transmembrane Conformation of the Influenza B Virus M2 Protein in Lipid Bilayers. Scientific 1.6 Reports, 2019, 9, 3725. Multiscale Simulations of Biological Membranes: The Challenge To Understand Biological Phenomena 5222 23.0 209 in a Living Substance. Chemical Reviews, 2019, 119, 5607-5774. Essay on Biomembrane Structure. Journal of Membrane Biology, 2019, 252, 115-130. 1.0 Probing Ion Binding in the Selectivity Filter of the KcsA Potassium Channel. Journal of the American 5224 6.6 13 Chemical Society, 2019, 141, 7391-7398. X-ray structures of the high-affinity copper transporter Ctr1. Nature Communications, 2019, 10, 1386. 5.8 In Silico Analysis of the Subtype Selective Blockage of KCNA Ion Channels through the µ-Conotoxins 5226 2.2 8 PIIIA, SIIIA, and GIIIA. Marine Drugs, 2019, 17, 180. Natureâ€Inspired Strategy for Anticorrosion. Advanced Engineering Materials, 2019, 21, 1801379. 58 Engineered PES/SPES nanochannel membrane for salinity gradient power generation. Nano Energy, 5229 8.2 71 2019, 59, 354-362. Accessibility of Cations to the Selectivity Filter of KcsA in the Inactivated State: An Equilibrium 1.8 Binding Study. International Journal of Molecular Sciences, 2019, 20, 689.

#	Article	IF	CITATIONS
5231	Photopharmacology: A Brief Review Using the Control of Potassium Channels as an Example. Neuroscience and Behavioral Physiology, 2019, 49, 184-191.	0.2	14
5232	Activation behavior for ion permeation in ion-exchange membranes: Role of ion dehydration in selective transport. Journal of Membrane Science, 2019, 580, 316-326.	4.1	146
5233	Biomimetic potassium-selective nanopores. Science Advances, 2019, 5, eaav2568.	4.7	128
5234	Parametrization of MARTINI for Modeling Hinging Motions in Membrane Proteins. Journal of Physical Chemistry B, 2019, 123, 2254-2269.	1.2	6
5235	Relationships Between Ion Channels, Mitochondrial Functions and Inflammation in Human Aging. Frontiers in Physiology, 2019, 10, 158.	1.3	43
5236	Scaling of lipid membrane rigidity with domain area fraction. Soft Matter, 2019, 15, 2762-2767.	1.2	14
5237	Doctoral Dissertation. Acta Physiologica, 2019, 225, e13225.	1.8	2
5238	Atomistic basis of opening and conduction in mammalian inward rectifier potassium (Kir2.2) channels. Journal of General Physiology, 2020, 152, jgp.201912422.	0.9	28
5240	Ion Channel Permeation and Selectivity. , 0, , 33-63.		4
5241	NMR Perspectives of the KcsA Potassium Channel in the Membrane Environment. Israel Journal of Chemistry, 2019, 59, 1001-1013.	1.0	1
5242	The Confinement Effect of Angstromâ€Sized Pores in Asymmetrical Membrane Constructed by Zeolitic Imidazolate Frameworks: Partially Dehydrated Ion Transport Performance. Small, 2019, 15, e1904866.	5.2	22
5243	Microfabricated Solution Chamber for High Resolution Diffracted X-Ray Tracking Method to Observe Ion-Channel Gating Motion. , 2019, , .		0
5244	Modeling squid axon Na+ channel by a nucleation and growth kinetic mechanism. Biochimica Et Biophysica Acta - Biomembranes, 2019, 1861, 100-109.	1.4	4
5245	Investigation of a KcsA Cytoplasmic pH Gate in Lipoprotein Nanodiscs. ChemBioChem, 2019, 20, 813-821.	1.3	8
5246	Quantitative Assessment of Molecular Transport through Sub-3 nm Silica Nanochannels by Scanning Electrochemical Microscopy. Analytical Chemistry, 2019, 91, 1548-1556.	3.2	15
5247	Counterion Effect on Vibrational Relaxation and the Rotational Dynamics of Interfacial Water and an Anionic Vibrational Probe in the Confined Reverse Micelles Environment. Journal of Physical Chemistry Letters, 2019, 10, 176-182.	2.1	18
5248	Molecular charge associated with antiarrhythmic actions in a series of amino-2-cyclohexyl ester derivatives. European Journal of Pharmacology, 2019, 844, 241-252.	1.7	0
5249	Determining the target of membrane sterols on voltage-gated potassium channels. Biochimica Et Biophysica Acta - Molecular and Cell Biology of Lipids, 2019, 1864, 312-325.	1.2	13

#	Article	IF	CITATIONS
5250	Structural biology and structure–function relationships of membrane proteins. Biochemical Society Transactions, 2019, 47, 47-61.	1.6	24
5251	Division of roles of modified chains in organo-magnetic nanoparticles using Organo-modified agents having hydrophilic reactive polar groups at both ends. Colloids and Surfaces B: Biointerfaces, 2019, 173, 759-768.	2.5	6
5252	The MemProtMD database: a resource for membrane-embedded protein structures and their lipid interactions. Nucleic Acids Research, 2019, 47, D390-D397.	6.5	143
5253	Molecular basis involved in the blocking effect of antidepressant metergoline on C-type inactivation of Kv1.4 channel. Neuropharmacology, 2019, 146, 65-73.	2.0	5
5254	Challenges and advances in atomistic simulations of potassium and sodium ion channel gating and permeation. Journal of Physiology, 2019, 597, 679-698.	1.3	30
5255	A cross-talk on compositional dynamics and codon usage patterns of mitochondrial CYB gene in Echinodermata. Mitochondrial DNA Part A: DNA Mapping, Sequencing, and Analysis, 2019, 30, 351-366.	0.7	2
5256	Antiarrhythmic Drugs. , 2019, , 556-574.		1
5257	Quantum-confined ion superfluid in nerve signal transmission. Nano Research, 2019, 12, 1219-1221.	5.8	40
5258	An ATP-Regulated Ion Transport Nanosystem for Homeostatic Perturbation Therapy and Sensitizing Photodynamic Therapy by Autophagy Inhibition of Tumors. ACS Central Science, 2019, 5, 327-340.	5.3	56
5259	Artificial K ⁺ Channels Formed by Pillarareneâ€Cyclodextrin Hybrid Molecules: Tuning Cation Selectivity and Generating Membrane Potential. Angewandte Chemie - International Edition, 2019, 58, 2779-2784.	7.2	58
5260	Shifts in the selectivity filter dynamics cause modal gating in K+ channels. Nature Communications, 2019, 10, 123.	5.8	66
5261	Wettability and Applications of Nanochannels. Advanced Materials, 2019, 31, e1804508.	11.1	123
5262	Capturing the Molecular Mechanism of Anesthetic Action by Simulation Methods. Chemical Reviews, 2019, 119, 5998-6014.	23.0	14
5263	Twoâ€pore domain potassium channels: emerging targets for novel analgesic drugs: IUPHAR Review 26. British Journal of Pharmacology, 2019, 176, 256-266.	2.7	52
5264	Cadmium opens GluK2 kainate receptors with cysteine substitutions at the M3 helix bundle crossing. Journal of General Physiology, 2019, 151, 435-451.	0.9	7
5265	Molecular insights into multilayer 18-crown-6-like graphene nanopores for K+/Na+ separation: A molecular dynamics study. Carbon, 2019, 144, 32-42.	5.4	40
5266	Flux Ratios and Channel Structures. Journal of Dynamics and Differential Equations, 2019, 31, 1141-1183.	1.0	23
5267	Diffracted X-ray tracking method for recording single-molecule protein motions. Biochimica Et Biophysica Acta - General Subjects, 2020, 1864, 129361.	1.1	1

#	Article	IF	CITATIONS
5268	Unimolecular artificial transmembrane channel with terminal dihydrogen phosphate groups showing transport selectivity for ammonium. Chinese Chemical Letters, 2020, 31, 77-80.	4.8	5
5269	Pyridine/Oxadiazoleâ€Based Helical Foldamer Ion Channels with Exceptionally High K ⁺ /Na ⁺ Selectivity. Angewandte Chemie, 2020, 132, 1456-1460.	1.6	23
5270	Pyridine/Oxadiazoleâ€Based Helical Foldamer Ion Channels with Exceptionally High K ⁺ /Na ⁺ Selectivity. Angewandte Chemie - International Edition, 2020, 59, 1440-1444.	7.2	68
5271	Polycrystalline Advanced Microporous Framework Membranes for Efficient Separation of Small Molecules and Ions. Advanced Materials, 2020, 32, e1902009.	11.1	134
5273	In vivo potassium MRI of the human heart. Magnetic Resonance in Medicine, 2020, 83, 203-213.	1.9	7
5274	RCSB Protein Data Bank: Enabling biomedical research and drug discovery. Protein Science, 2020, 29, 52-65.	3.1	223
5275	Enhancing K ⁺ transport activity and selectivity of synthetic K ⁺ channels <i>via</i> electron-donating effects. Chemical Communications, 2020, 56, 1211-1214.	2.2	20
5276	BiochemAR: An Augmented Reality Educational Tool for Teaching Macromolecular Structure and Function. Journal of Chemical Education, 2020, 97, 147-153.	1.1	39
5277	IR Spectroscopy Can Reveal the Mechanism of K+ Transport in Ion Channels. Biophysical Journal, 2020, 118, 254-261.	0.2	17
5278	Ultrafast Spectroscopy: State of the Art and Open Challenges. Journal of the American Chemical Society, 2020, 142, 3-15.	6.6	183
5279	Insights into the Mechanisms of K ⁺ Permeation in K ⁺ Channels from Computer Simulations. Journal of Chemical Theory and Computation, 2020, 16, 794-799.	2.3	6
5280	Engineering Smart Nanofluidic Systems for Artificial Ion Channels and Ion Pumps: From Singleâ€Pore to Multichannel Membranes. Advanced Materials, 2020, 32, e1904351.	11.1	95
5281	Chemoenzymatic Semisynthesis of Proteins. Chemical Reviews, 2020, 120, 3051-3126.	23.0	142
5282	Cryo-EM as a powerful tool for drug discovery. Bioorganic and Medicinal Chemistry Letters, 2020, 30, 127524.	1.0	48
5283	The Selectivity Filter Is Involved in the U-Type Inactivation Process of Kv2.1 and Kv3.1 Channels. Biophysical Journal, 2020, 118, 2612-2620.	0.2	8
5284	Bubble formation in nanopores: a matter of hydrophobicity, geometry, and size. Advances in Physics: X, 2020, 5, 1817780.	1.5	15
5285	Network analysis reveals how lipids and other cofactors influence membrane protein allostery. Journal of Chemical Physics, 2020, 153, 141103.	1.2	21
5286	Critical Assessment of Common Force Fields for Molecular Dynamics Simulations of Potassium Channels. Journal of Chemical Theory and Computation, 2020, 16, 7148-7159.	2.3	24

#	Article	IF	CITATIONS
5287	Molecular electrets – Why do dipoles matter for charge transfer and excited-state dynamics?. Journal of Photochemistry and Photobiology A: Chemistry, 2020, 401, 112779.	2.0	4
5288	Mitochondrial F-ATP synthase as the permeability transition pore. Pharmacological Research, 2020, 160, 105081.	3.1	29
5289	The Lorentz force on ions in membrane channels of neurons as a mechanism for transcranial static magnetic stimulation. Electromagnetic Biology and Medicine, 2020, 39, 310-315.	0.7	2
5290	The pore domain in glutamate-gated ion channels: Structure, drug binding and similarity with potassium channels. Biochimica Et Biophysica Acta - Biomembranes, 2020, 1862, 183401.	1.4	7
5291	Ion Gating in Nanopore Electrode Arrays with Hierarchically Organized pH-Responsive Block Copolymer Membranes. ACS Applied Materials & Interfaces, 2020, 12, 55116-55124.	4.0	20
5292	Ion channels as lipid sensors: from structures to mechanisms. Nature Chemical Biology, 2020, 16, 1331-1342.	3.9	38
5293	Design and Assembly of Transmembrane Helix Barrel. Journal of Membrane Biology, 2020, 253, 491-497.	1.0	1
5294	Intrapore energy barriers govern ion transport and selectivity of desalination membranes. Science Advances, 2020, 6, .	4.7	161
5295	Transport Phenomena in Nano/Molecular Confinements. ACS Nano, 2020, 14, 16348-16391.	7.3	55
5296	Conjecture on the Design of Helical Proteins. Journal of Physical Chemistry B, 2020, 124, 11067-11071.	1.2	0
5297	Unappreciated Roles for K+ Channels in Bacterial Physiology. Trends in Microbiology, 2021, 29, 942-950.	3.5	11
5298	Buckyball-Based Spherical Display of Crown Ethers for <i>De Novo</i> Custom Design of Ion Transport Selectivity. Journal of the American Chemical Society, 2020, 142, 21082-21090.	6.6	35
5299	Diffusion Limitations and Translocation Barriers in Atomically Thin Biomimetic Pores. Entropy, 2020, 22, 1326.	1.1	3
5300	Biomimetic Approach for Highly Selective Artificial Water Channels Based on Tubular Pillar[5]arene Dimers. Angewandte Chemie, 2020, 132, 23413-23419.	1.6	6
5301	Overexpression of HvAKT1 improves drought tolerance in barley by regulating root ion homeostasis and ROS and NO signaling. Journal of Experimental Botany, 2020, 71, 6587-6600.	2.4	31
5302	Non-thermal effects of radiofrequency electromagnetic fields. Scientific Reports, 2020, 10, 13488.	1.6	46
5303	Cyclic AMP-Dependent Regulation of Kv7 Voltage-Gated Potassium Channels. Frontiers in Physiology, 2020, 11, 727.	1.3	34
5304	Can Self-Assembly Address the Permeability/Selectivity Trade-Offs in Polymer Membranes?. Macromolecules, 2020, 53, 5649-5654.	2.2	39

	CHANG	IN REPORT	
#	Article	IF	CITATIONS
5305	Multifaceted aspects of charge transfer. Physical Chemistry Chemical Physics, 2020, 22, 21583-21629.	1.3	26
5306	Voltage-gated multilayer graphene nanochannel for K+/Na+ separation: A molecular dynamics study. Journal of Molecular Liquids, 2020, 317, 114025.	2.3	10
5307	Molecular Modeling in Studies of Ion Channels and their Modulation by Ligands. Neuroscience and Behavioral Physiology, 2020, 50, 928-937.	0.2	1
5308	A Functional K+ Channel from Tetraselmis Virus 1, a Member of the Mimiviridae. Viruses, 2020, 12, 1107.	1.5	3
5309	Conformational equilibrium shift underlies altered K+ channel gating as revealed by NMR. Nature Communications, 2020, 11, 5168.	5.8	1
5310	Quantum-confined superfluid reactions. Chemical Science, 2020, 11, 10035-10046.	3.7	30
5311	Clinical Importance of the Human Umbilical Artery Potassium Channels. Cells, 2020, 9, 1956.	1.8	23
5313	Supramolecular Double Helices from Small C ₃ -Symmetrical Molecules Aggregated in Water. Journal of the American Chemical Society, 2020, 142, 17644-17652.	6.6	30
5314	Biomimetic Approach for Highly Selective Artificial Water Channels Based on Tubular Pillar[5]arene Dimers. Angewandte Chemie - International Edition, 2020, 59, 23213-23219.	7.2	32
5315	Insights into Cardiac IKs (KCNQ1/KCNE1) Channels Regulation. International Journal of Molecular Sciences, 2020, 21, 9440.	1.8	25
5316	Prospects of Observing Ionic Coulomb Blockade in Artificial Ion Confinements. Entropy, 2020, 22, 1430.	1.1	5
5317	Fuel Cell Using Squid Axon Electrolyte and Its Proton Conductivity. Journal of Functional Biomaterials, 2020, 11, 86.	1.8	5
5318	Familial neonatal seizures caused by the Kv7.3 selectivity filter mutation T313I. Epilepsia Open, 2020, 5, 562-573.	1.3	4
5319	Conduction and Gating Properties of the TRAAK Channel from Molecular Dynamics Simulations with Different Force Fields. Journal of Chemical Information and Modeling, 2020, 60, 6532-6543.	2.5	12
5321	Membrane Topology of an Ion Channel Detected by Solid-State Nuclear Magnetic Resonance and Paramagnetic Effects. Journal of Physical Chemistry Letters, 2020, 11, 9795-9801.	2.1	1
5322	Designing Solute-Tailored Selectivity in Membranes: Perspectives for Water Reuse and Resource Recovery. ACS Macro Letters, 2020, 9, 1709-1717.	2.3	62
5323	Lipid-protein interactions modulate the conformational equilibrium of a potassium channel. Nature Communications, 2020, 11, 2162.	5.8	33
5324	Endocytosis in microcystis aeruginosa accelerates the synthesis of microcystins in the presence of lanthanum(III). Harmful Algae, 2020, 93, 101791.	2.2	11

#	Article	IF	CITATIONS
5325	Light-gated cation-selective transport in metal–organic framework membranes. Journal of Materials Chemistry A, 2020, 8, 11399-11405.	5.2	54
5326	Ion Channels and Relevant Drug Screening Approaches. SLAS Discovery, 2020, 25, 413-419.	1.4	9
5327	Structures Illuminate Cardiac Ion Channel Functions in Health and in Long QT Syndrome. Frontiers in Pharmacology, 2020, 11, 550.	1.6	23
5328	Mechanism of ligand activation of a eukaryotic cyclic nucleotideâ^'gated channel. Nature Structural and Molecular Biology, 2020, 27, 625-634.	3.6	40
5329	CaV3.1 channel pore pseudo-symmetry revealed by selectivity filter mutations in its domains I/II. Cell Calcium, 2020, 89, 102214.	1.1	0
5330	The more the merrier: effects of macromolecular crowding on the structure and dynamics of biological membranes. FEBS Journal, 2020, 287, 5039-5067.	2.2	48
5331	Towards single-species selectivity of membranes with subnanometre pores. Nature Nanotechnology, 2020, 15, 426-436.	15.6	389
5332	Cav2.3 R-type calcium channels: from its discovery to pathogenic de novo CACNA1E variants: a historical perspective. Pflugers Archiv European Journal of Physiology, 2020, 472, 811-816.	1.3	13
5333	Zirconium Metal–Organic Framework Materials for Efficient Ion Adsorption and Sieving. Industrial & Engineering Chemistry Research, 2020, 59, 12907-12923.	1.8	60
5334	A selective ionic rectifier. Nature Materials, 2020, 19, 701-702.	13.3	16
5334 5335	A selective ionic rectifier. Nature Materials, 2020, 19, 701-702. Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying K+ Channel. Frontiers in Pharmacology, 2020, 11, 721.	13.3 1.6	16
	Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying		
5335	Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying K+ Channel. Frontiers in Pharmacology, 2020, 11, 721.	1.6	11
5335 5336	Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying K+ Channel. Frontiers in Pharmacology, 2020, 11, 721. Role of Potassium in Plants. SpringerBriefs in Plant Science, 2020, , . Hydrophobic Drug/Toxin Binding Sites in Voltage-Dependent K+ and Na+ Channels. Frontiers in	1.6 0.4	11 26
5335 5336 5337	Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying K+ Channel. Frontiers in Pharmacology, 2020, 11, 721. Role of Potassium in Plants. SpringerBriefs in Plant Science, 2020, , . Hydrophobic Drug/Toxin Binding Sites in Voltage-Dependent K+ and Na+ Channels. Frontiers in Pharmacology, 2020, 11, 735. Gating and Regulation of KCNQ1 and KCNQ1 + KCNE1 Channel Complexes. Frontiers in Physiology, 2020,	1.6 0.4 1.6	11 26 11
5335 5336 5337 5338	Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying K+ Channel. Frontiers in Pharmacology, 2020, 11, 721. Role of Potassium in Plants. SpringerBriefs in Plant Science, 2020, , . Hydrophobic Drug/Toxin Binding Sites in Voltage-Dependent K+ and Na+ Channels. Frontiers in Pharmacology, 2020, 11, 735. Gating and Regulation of KCNQ1 and KCNQ1 + KCNE1 Channel Complexes. Frontiers in Physiology, 2020, 11, 504. Breakdown of electroneutrality in nanopores. Journal of Colloid and Interface Science, 2020, 579,	1.6 0.4 1.6 1.3	11 26 11 23
5335 5336 5337 5338 5339	Computational Insights Into Voltage Dependence of Polyamine Block in a Strong Inwardly Rectifying K+ Channel. Frontiers in Pharmacology, 2020, 11, 721. Role of Potassium in Plants. SpringerBriefs in Plant Science, 2020, , . Hydrophobic Drug/Toxin Binding Sites in Voltage-Dependent K+ and Na+ Channels. Frontiers in Pharmacology, 2020, 11, 735. Gating and Regulation of KCNQ1 and KCNQ1 + KCNE1 Channel Complexes. Frontiers in Physiology, 2020, 11, 504. Breakdown of electroneutrality in nanopores. Journal of Colloid and Interface Science, 2020, 579, 162-176. Anticancer potential of new 3-nitroaryl-6-(N-methyl)piperazin-1,2,4-triazolo[3,4-a]phthalazines targeting voltage-gated K+ channel: Copper-catalyzed one-pot synthesis from	1.6 0.4 1.6 1.3 5.0	 11 26 11 23 44

		CITATION R	EPORT	
#	Article		IF	CITATIONS
5343	Ball-and-chain inactivation in a calcium-gated potassium channel. Nature, 2020, 580, 2	.88-293.	13.7	45
5344	Supramolecular pore formation as an antimicrobial strategy. Coordination Chemistry R 412, 213264.	leviews, 2020,	9.5	15
5345	Hydration Mimicry by Membrane Ion Channels. Annual Review of Physical Chemistry, 2	020, 71, 461-484.	4.8	27
5346	Aromatic Fluorination of Multiblock Amphiphile Enhances Its Incorporation into Lipid B Membranes. ChemistryOpen, 2020, 9, 301-303.	ilayer	0.9	8
5347	Efficient metal ion sieving in rectifying subnanochannels enabled by metal–organic f Nature Materials, 2020, 19, 767-774.	rameworks.	13.3	275
5348	Voltage-Triggered Structural Switching of Polyelectrolyte-Modified Nanochannels. Mac 2020, 53, 2616-2626.	romolecules,	2.2	16
5349	A Sandwich Azobenzene–Diamide Dimer for Photoregulated Chloride Transport. Che European Journal, 2020, 26, 8703-8708.	emistry - A	1.7	28
5350	Watching Water, Sodium, and Chloride Passing through a Graphitic Pore. Matter, 2020	0, 2, 524-525.	5.0	1
5351	KCNQs: Ligand- and Voltage-Gated Potassium Channels. Frontiers in Physiology, 2020,	11, 583.	1.3	45
5352	Cryo-electron microscopy analysis of small membrane proteins. Current Opinion in Stru Biology, 2020, 64, 26-33.	uctural	2.6	57
5353	Distinctive Viewpoint on the Rapid Dissolution Mechanism of α-Chitin in Aqueous Pota Hydroxide–Urea Solution at Low Temperatures. Macromolecules, 2020, 53, 5588-55	assium i98.	2.2	26
5354	Quantum Mechanical Coherence of K+ Ion Wave Packets Increases Conduction in the Channel. Applied Sciences (Switzerland), 2020, 10, 4250.	KcsA lon	1.3	6
5355	Crystal structure of a human plasma membrane phospholipid flippase. Journal of Biolog 2020, 295, 10180-10194.	gical Chemistry,	1.6	45
5356	Irritant-evoked activation and calcium modulation of the TRPA1 receptor. Nature, 2020), 585, 141-145.	13.7	93
5357	Trackâ€Etched Nanopore/Membrane: From Fundamental to Applications. Small Metho	ds, 2020, 4, 2000366.	4.6	123
5358	Method for Accurately Predicting Solvation Structure. Journal of Chemical Theory and 0 2020, 16, 5401-5409.	Computation,	2.3	12
5359	Effect of anionic lipids on ion permeation through the KcsA K+-channel. Biochimica Et B - Biomembranes, 2020, 1862, 183406.	3iophysica Acta	1.4	3
5360	Nonlinear pulses at the interface and its relation to state and temperature. European P E, 2020, 43, 8.	hysical Journal	0.7	5

#	Article	IF	CITATIONS
5361	A centipede toxin causes rapid desensitization of nociceptor TRPV1 ion channel. Toxicon, 2020, 178, 41-49.	0.8	15
5362	Expression, Purification, and Structural Biology of Membrane Proteins. Methods in Molecular Biology, 2020, , .	0.4	3
5363	Influence of Nanoconfinement on the pKa of Polyelectrolyte Functionalized Silica Mesopores. Advanced Materials Interfaces, 2020, 7, 1901914.	1.9	28
5364	A twin histidine motif is the core structure for high-affinity substrate selection in plant ammonium transporters. Journal of Biological Chemistry, 2020, 295, 3362-3370.	1.6	15
5365	Structure of the human cation–chloride cotransporter NKCC1 determined by single-particle electron cryo-microscopy. Nature Communications, 2020, 11, 1016.	5.8	43
5366	Alkali and Alkaline Earth Metal Ions Complexes with a Partial Peptide of the Selectivity Filter in K ⁺ Channels Studied by a Cold Ion Trap Infrared Spectroscopy. ChemPhysChem, 2020, 21, 712-724.	1.0	17
5367	A sensitive and specific nanosensor for monitoring extracellular potassium levels in the brain. Nature Nanotechnology, 2020, 15, 321-330.	15.6	83
5368	TrkA undergoes a tetramer-to-dimer conversion to open TrkH which enables changes in membrane potential. Nature Communications, 2020, 11, 547.	5.8	20
5369	Transport in nanopores and nanochannels: some fundamental challenges and nature-inspired solutions. Materials Today Advances, 2020, 5, 100047.	2.5	34
5370	Charge Inversion and Calcium Gating in Mixtures of Ions in Nanopores. Journal of the American Chemical Society, 2020, 142, 2925-2934.	6.6	73
5371	Switchable Ionic Rectifiers Based on Ferroelectric Nanopores. ACS Applied Nano Materials, 2020, 3, 1104-1110.	2.4	4
5372	Biofunctional Molecules Inspired by Protein Mimicry and Manipulation. Bulletin of the Chemical Society of Japan, 2020, 93, 138-153.	2.0	7
5373	The Microbiologist's Guide to Membrane Potential Dynamics. Trends in Microbiology, 2020, 28, 304-314.	3.5	156
5374	Permeation selectivity of alkali metal ions through crown ether based ion channels. Journal of Molecular Liquids, 2020, 302, 112577.	2.3	18
5376	HvAKT2 and HvHAK1 confer drought tolerance in barley through enhanced leaf mesophyll H ⁺ homoeostasis. Plant Biotechnology Journal, 2020, 18, 1683-1696.	4.1	54
5377	<i>Drosophila</i> as a model for studying cystic fibrosis pathophysiology of the gastrointestinal system. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 10357-10367.	3.3	22
5378	Strong Differential Monovalent Anion Selectivity in Narrow Diameter Carbon Nanotube Porins. ACS Nano, 2020, 14, 6269-6275.	7.3	35
5379	MGOS: A library for molecular geometry and its operating system. Computer Physics Communications, 2020, 251, 107101.	3.0	2

#	Article	IF	CITATIONS
5380	d-Alanine–d-alanine ligase as a model for the activation of ATP-grasp enzymes by monovalent cations. Journal of Biological Chemistry, 2020, 295, 7894-7904.	1.6	21
5381	A new brain mitochondrial sodium-sensitive potassium channel: effect of sodium ions on respiratory chain activity. Journal of Cell Science, 2020, 133, .	1.2	8
5382	Insight into bacterial biofilm-barnacle larvae interactions for environmentally benign antifouling strategies. International Biodeterioration and Biodegradation, 2020, 149, 104937.	1.9	23
5383	Screening Technologies for Inward Rectifier Potassium Channels: Discovery of New Blockers and Activators. SLAS Discovery, 2020, 25, 420-433.	1.4	14
5384	Study on oil fouling in a double pipe heat exchanger with mitigation by a surfactant. Heat Transfer, 2020, 49, 2645-2658.	1.7	5
5385	Ion transport regulation through triblock copolymer/PET asymmetric nanochannel membrane: Model system establishment and rectification mapping. Chinese Chemical Letters, 2021, 32, 822-825.	4.8	29
5386	Structure and function of the calciumâ€selective TRP channel TRPV6. Journal of Physiology, 2021, 599, 2673-2697.	1.3	29
5387	OBSOLETE: Ion Channels. , 2021, , .		0
5388	Membrane Transport The Ion Channel Protein Superfamily. , 2021, , 880-885.		0
5389	Harnessing Selectivity and Sensitivity in Ion Sensing via Supramolecular Recognition: A 3D Hybrid Gold Nanoparticle Network Chemiresistor. Advanced Functional Materials, 2021, 31, 2008554.	7.8	10
5390	A universal functionalization strategy for biomimetic nanochannel via external electric field assisted non-covalent interaction. Nano Research, 2021, 14, 1421-1428.	5.8	16
5391	How potassium came to be the dominant biological cation: of metabolism, chemiosmosis, and cation selectivity since the beginnings of life. BioEssays, 2021, 43, 2000108.	1.2	18
5392	Bioinspired artificial nanochannels: construction and application. Materials Chemistry Frontiers, 2021, 5, 1610-1631.	3.2	18
5393	Engineered Sulfonated Polyether Sulfone Nanochannel Membranes for Salinity Gradient Power Generation. ACS Applied Polymer Materials, 2021, 3, 485-493.	2.0	14
5394	Prospective applications of nanometer-scale pore size biomimetic and bioinspired membranes. Journal of Membrane Science, 2021, 620, 118968.	4.1	40
5395	Ultraselective Monovalent Metal Ion Conduction in a Three-Dimensional Sub-1 nm Nanofluidic Device Constructed by Metal–Organic Frameworks. ACS Nano, 2021, 15, 1240-1249.	7.3	52
5396	Changing perspectives on how the permeation pathway through potassium channels is regulated. Journal of Physiology, 2021, 599, 1961-1976.	1.3	7
5397	Inferring functional units in ion channel pores via relative entropy. European Biophysics Journal, 2021, 50, 37-57.	1.2	1

# 5399	ARTICLE Molecular Recognition and Self-Organization in Life Phenomena Studied by a Statistical Mechanics of Molecular Liquids, the RISM/3D-RISM Theory. Molecules, 2021, 26, 271.	IF 1.7	Citations
5400	Energy calculations for potassium vs sodium selectivity on potassium channel: an ab initio study. Theoretical Chemistry Accounts, 2021, 140, 1.	0.5	0
5401	Correlating ion channel structure and function. Methods in Enzymology, 2021, 652, 3-30.	0.4	4
5402	Measuring Ionic Transport Through Lipid Bilayers. , 2021, , 25-50.		0
5403	Unraveling of a Strongly Correlated Dynamical Network of Residues Controlling the Permeation of Potassium in KcsA Ion Channel. Entropy, 2021, 23, 72.	1.1	2
5404	Artificial channels for confined mass transport at the sub-nanometre scale. Nature Reviews Materials, 2021, 6, 294-312.	23.3	263
5405	Cardiac hERG K+ Channel as Safety and Pharmacological Target. Handbook of Experimental Pharmacology, 2021, 267, 139-166.	0.9	8
5406	High-Resolution Structures of K+ Channels. Handbook of Experimental Pharmacology, 2021, 267, 51-81.	0.9	3
5407	ANAP: A versatile, fluorescent probe of ion channel gating and regulation. Methods in Enzymology, 2021, 654, 49-84.	0.4	7
5408	Selectivity Determinant of Ancestor-like Prokaryotic Calcium Channel. Seibutsu Butsuri, 2021, 61, 223-226.	0.0	0
5409	High-throughput molecular simulations reveal the origin of ion free energy barriers in graphene oxide membranes. Nanoscale, 2021, 13, 13693-13702.	2.8	12
5410	Calcium-Activated K+ Channels (KCa) and Therapeutic Implications. Handbook of Experimental Pharmacology, 2021, 267, 379-416.	0.9	9
5411	The Pharmacology of Two-Pore Domain Potassium Channels. Handbook of Experimental Pharmacology, 2021, 267, 417-443.	0.9	7
5412	Ion Channels. , 2021, , .		0
5413	Classical targets in drug discovery. , 2021, , 111-183.		0
5414	Non-thermal membrane effects of electromagnetic fields and therapeutic applications in oncology. International Journal of Hyperthermia, 2021, 38, 715-731.	1.1	20
5415	Highlighting membrane protein structure and function: AÂcelebration of the Protein Data Bank. Journal of Biological Chemistry, 2021, 296, 100557.	1.6	42
5416	Distinct lipid bilayer compositions have general and protein-specific effects on K+ channel function. Journal of General Physiology, 2021, 153, .	0.9	7

#	Article	IF	Citations
5417	Insights into the mechanisms of transport and regulation of the arabidopsis high-affinity K+ transporter HAK51. Plant Physiology, 2021, 185, 1860-1874.	2.3	32
5418	Tetraoctylammonium, a Long Chain Quaternary Ammonium Blocker, Promotes a Noncollapsed, Resting-Like Inactivated State in KcsA. International Journal of Molecular Sciences, 2021, 22, 490.	1.8	6
5419	Nonselective cation permeation in an AMPA-type glutamate receptor. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	16
5420	The enigma of environmental pH sensing in plants. Nature Plants, 2021, 7, 106-115.	4.7	52
5421	Charge Interactions in a Highly Charge-Depleted Protein. Journal of the American Chemical Society, 2021, 143, 2500-2508.	6.6	15
5422	Molecular structures of the eukaryotic retinal importer ABCA4. ELife, 2021, 10, .	2.8	29
5423	Advances in L-Type Calcium Channel Structures, Functions and Molecular Modeling. Current Medicinal Chemistry, 2021, 28, 514-524.	1.2	10
5424	Calix[4]trap: A Bioinspired Host Equipped with Dual Selection Mechanisms. Journal of the American Chemical Society, 2021, 143, 3162-3168.	6.6	5
5425	Understanding the Ion Transport Behavior across Nanofluidic Membranes in Response to the Charge Variations. Advanced Functional Materials, 2021, 31, 2009970.	7.8	47
5426	Gating the pore of the calcium-activated chloride channel TMEM16A. Nature Communications, 2021, 12, 785.	5.8	33
5427	Designing Biomimic Two-Dimensional Ionic Transport Channels for Efficient Ion Sieving. ACS Nano, 2021, 15, 5209-5220.	7.3	98
5428	Rethinking Ion Transport by Ionophores: Experimental and Computational Investigation of Single Water Hydration in Valinomycin-K ⁺ Complexes. Journal of Physical Chemistry Letters, 2021, 12, 1754-1758.	2.1	16
5429	Physical and Chemical Interplay Between the Membrane and a Prototypical Potassium Channel Reconstituted on a Lipid Bilayer Platform. Frontiers in Molecular Neuroscience, 2021, 14, 634121.	1.4	1
5430	lonic Transport and Sieving Properties of Sub-nanoporous Polymer Membranes with Tunable Channel Size. ACS Applied Materials & Interfaces, 2021, 13, 9015-9026.	4.0	22
5431	Specific PIP2 binding promotes calcium activation of TMEM16A chloride channels. Communications Biology, 2021, 4, 259.	2.0	21
5432	Regulation of K+ Conductance by a Hydrogen Bond in Kv2.1, Kv2.2, and Kv1.2 Channels. Membranes, 2021, 11, 190.	1.4	6
5433	Conductance selectivity of Na ⁺ across the K ⁺ channel via Na ⁺ trapped in a tortuous trajectory. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	18
5434	Channel Blockers of Ionotropic Glutamate Receptors. Journal of Evolutionary Biochemistry and Physiology, 2021, 57, 325-336.	0.2	0

#	Article	IF	CITATIONS
5435	Na+ and K+ channels: history and structure. Biophysical Journal, 2021, 120, 756-763.	0.2	5
5436	Nonthermal and reversible control of neuronal signaling and behavior by midinfrared stimulation. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	64
5437	Pore-forming transmembrane domains control ion selectivity and selectivity filter conformation in the KirBac1.1 potassium channel. Journal of General Physiology, 2021, 153, .	0.9	8
5438	Computational Electrophysiology from a Single Molecular Dynamics Simulation and the Electrodiffusion Model. Journal of Physical Chemistry B, 2021, 125, 3132-3144.	1.2	5
5439	Simultaneous Nanolocal Polymer and <i>In Situ</i> Readout Unit Placement in Mesoporous Separation Layers. Analytical Chemistry, 2021, 93, 5394-5402.	3.2	4
5440	Phylogenomics of Tick Inward Rectifier Potassium Channels and Their Potential as Targets to Innovate Control Technologies. Frontiers in Cellular and Infection Microbiology, 2021, 11, 647020.	1.8	3
5441	An open pore structure of the Orai channel, finally. Cell Calcium, 2021, 94, 102366.	1.1	1
5442	Selectivity of ion transport in narrow carbon nanotubes depends on the driving force due to drag or drive nature of their active hydration shells. Journal of Chemical Physics, 2021, 154, 104707.	1.2	18
5443	Challenges in membrane-based liquid phase separations. Green Chemical Engineering, 2021, 2, 3-13.	3.3	13
5444	Hysteresis of a Tension-Sensitive K ⁺ Channel Revealed by Time-Lapse Tension Measurements. Jacs Au, 2021, 1, 467-474.	3.6	6
5445	Structure of Sodium and Calcium Channels with Ligands. Journal of Evolutionary Biochemistry and Physiology, 2021, 57, 337-353.	0.2	1
5446	Foldamer-Based Potassium Channels with High Ion Selectivity and Transport Activity. Journal of the American Chemical Society, 2021, 143, 3284-3288.	6.6	52
5447	Functional UiO-66 Series Membranes with High Perm Selectivity of Monovalent and Bivalent Anions for Electrodialysis Applications. Industrial & Engineering Chemistry Research, 2021, 60, 4086-4096.	1.8	15
5448	What's Left for a Computational Chemist To Do in the Age of Machine Learning?. Israel Journal of Chemistry, 2022, 62, .	1.0	6
5449	A moisture-enabled fully printable power source inspired by electric eels. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	30
5450	On the relationship between anion binding and chloride conductance in the CFTR anion channel. Biochimica Et Biophysica Acta - Biomembranes, 2021, 1863, 183558.	1.4	6
5451	Cation Transporters of Candida albicans—New Targets to Fight Candidiasis?. Biomolecules, 2021, 11, 584.	1.8	7
5452	A novel <i>KCNQ4</i> gene variant (c.857A>G; p.Tyr286Cys) inÂan extended family with nonâ€'syndromic deafness 2A. Molecular Medicine Reports, 2021, 23, .	1.1	7

	CITATIO	on Report	
#	Article	IF	CITATIONS
5453	Nanofluidics for osmotic energy conversion. Nature Reviews Materials, 2021, 6, 622-639.	23.3	288
5454	ERG channels contribute to the excitability of pyramidal neurons in hippocampal CA1. European Journal of Therapeutics, 0, , .	0.0	0
5455	Mixing and transport enhancement in microchannels by electrokinetic flows with charged surface heterogeneity. Physics of Fluids, 2021, 33, .	1.6	30
5456	Two Decades of Evolution of Our Understanding of the Transient Receptor Potential Melastatin 2 (TRPM2) Cation Channel. Life, 2021, 11, 397.	1.1	9
5457	Structural plasticity of the selectivity filter in a nonselective ion channel. IUCrJ, 2021, 8, 421-430.	1.0	13
5460	Advancements in macromolecular crystallography: from past to present. Emerging Topics in Life Sciences, 2021, 5, 127-149.	1.1	17
5461	Large-scale, robust mushroom-shaped nanochannel array membrane for ultrahigh osmotic energy conversion. Science Advances, 2021, 7, .	4.7	81
5463	Membrane lipids and transporter function. Biochimica Et Biophysica Acta - Molecular Basis of Disease, 2021, 1867, 166079.	1.8	31
5464	Comments on Ion Selectivity at the Crossroad between Biology and Biomimetics. Advanced Materials Technologies, 2021, 6, 2001177.	3.0	1
5465	Shaker-IR K+ channel gating in heavy water: Role of structural water molecules in inactivation. Journal of General Physiology, 2021, 153, .	0.9	5
5466	Kv7 channel trafficking by the microtubule network in vascular smooth muscle. Acta Physiologica, 2021, 232, e13692.	1.8	4
5467	Personalized Medicine Using Cutting Edge Technologies for Genetic Epilepsies. Current Neuropharmacology, 2021, 19, 813-831.	1.4	3
5468	Cannabidiol and Sodium Channel Pharmacology: General Overview, Mechanism, and Clinical Implications. Neuroscientist, 2022, 28, 318-334.	2.6	23
5469	Foldamer-based ultrapermeable and highly selective artificial water channels that exclude protons. Nature Nanotechnology, 2021, 16, 911-917.	15.6	54
5470	Representation theoretic patterns in multi-frequency class averaging for three-dimensional cryo-electron microscopy. Information and Inference, 2021, 10, 723-771.	0.9	2
5471	Concentrated brines in aqueous methanolic solutions in supercritical conditions: Effect of concentration and composition from molecular dynamics simulations. Fluid Phase Equilibria, 2021, 536, 112978.	1.4	2
5472	NBD-Based Environment-Sensitive Fluorescent Probes for the Human Ether-a-Go-Go–Related Gene Potassium Channel. Frontiers in Molecular Biosciences, 2021, 8, 666605.	1.6	0
5473	Cellular connectomes as arbiters of local circuit models in the cerebral cortex. Nature Communications, 2021, 12, 2785.	5.8	11

#	Article	IF	CITATIONS
5474	The macroscopic quantum state of ion channels: A carrier of neural information. Science China Materials, 2021, 64, 2572-2579.	3.5	11
5475	Effects of electromagnetic fields on neuronal ion channels: a systematic review. Annals of the New York Academy of Sciences, 2021, 1499, 82-103.	1.8	19
5476	Physics of Selective Conduction and Point Mutation in Biological Ion Channels. Physical Review Letters, 2021, 126, 218102.	2.9	3
5478	Bio-inspired construction of ion conductive pathway in covalent organic framework membranes for efficient lithium extraction. Matter, 2021, 4, 2027-2038.	5.0	59
5479	The bare necessities of plant K+ channel regulation. Plant Physiology, 2021, 187, 2092-2109.	2.3	11
5480	Characterizing the Probability of Collision Between Information Particles in Molecular Communications. IEEE Wireless Communications Letters, 2021, 10, 1252-1255.	3.2	2
5481	Multifaceted Regulation of Potassium-Ion Channels by Graphene Quantum Dots. ACS Applied Materials & Interfaces, 2021, 13, 27784-27795.	4.0	4
5483	Beyond Homeostasis: Potassium and Pathogenesis during Bacterial Infections. Infection and Immunity, 2021, 89, e0076620.	1.0	14
5485	Precise Sub-Angstrom Ion Separation Using Conjugated Microporous Polymer Membranes. ACS Nano, 2021, 15, 11970-11980.	7.3	46
5486	What defines biomimetic and bioinspired science and engineering?. Pure and Applied Chemistry, 2021, 93, 1275-1292.	0.9	3
5487	Fluorescent labeling in sizeâ€controlled liposomes reveals membrane curvatureâ€induced structural changes in the KcsA potassium channel. FEBS Letters, 2021, 595, 1914-1919.	1.3	2
5488	Membrane Exporters of Fluoride Ion. Annual Review of Biochemistry, 2021, 90, 559-579.	5.0	28
5489	Ion Conduction Mechanism as a Fingerprint of Potassium Channels. Journal of the American Chemical Society, 2021, 143, 12181-12193.	6.6	14
5490	Selective membranes in water and wastewater treatment: Role of advanced materials. Materials Today, 2021, 50, 516-532.	8.3	106
5491	Sodium Ions Do Not Stabilize the Selectivity Filter of a Potassium Channel. Journal of Molecular Biology, 2021, 433, 167091.	2.0	14
5492	Fast and Selective Ionic Transport: From Ion-Conducting Channels to Ion Exchange Membranes for Flow Batteries. Annual Review of Materials Research, 2021, 51, 21-46.	4.3	17
5493	Computational Analysis of the Crystal and Cryo-EM Structures of P-Loop Channels with Drugs. International Journal of Molecular Sciences, 2021, 22, 8143.	1.8	3
5494	The fluoride permeation pathway and anion recognition in Fluc family fluoride channels. ELife, 2021, 10, .	2.8	14

#	Article	IF	CITATIONS
5495	Paleosalinity and Its Association with Organic Matter: A Case Study from the Eocene Shahejie Formation, Laizhou Bay Sag, Bohai Bay Basin (China). Journal of Ocean University of China, 2021, 20, 741-754.	0.6	1
5496	Synthetic Macrocycle Nanopore for Potassium-Selective Transmembrane Transport. Journal of the American Chemical Society, 2021, 143, 15975-15983.	6.6	33
5497	Mapping Electromechanical Coupling Pathways in Voltage-Gated Ion Channels: Challenges and the Way Forward. Journal of Molecular Biology, 2021, 433, 167104.	2.0	13
5498	A Molecular Lid Mechanism of K+ Channel Blocker Action Revealed by a Cone Peptide. Journal of Molecular Biology, 2021, 433, 166957.	2.0	7
5499	Molecular Mechanisms for Bacterial Potassium Homeostasis. Journal of Molecular Biology, 2021, 433, 166968.	2.0	57
5502	lon conductive membranes for flow batteries: Design and ions transport mechanism. Journal of Membrane Science, 2021, 632, 119355.	4.1	23
5503	The Role of the Membrane in Transporter Folding and Activity. Journal of Molecular Biology, 2021, 433, 167103.	2.0	14
5504	From Bench to Biomolecular Simulation: Phospholipid Modulation of Potassium Channels. Journal of Molecular Biology, 2021, 433, 167105.	2.0	4
5505	Unimolecular Transmembrane Na ⁺ Channels Constructed by Pore-Forming Helical Polymers with a 2.3 Ã Aperture. CCS Chemistry, 2022, 4, 1850-1857.	4.6	5
5506	Lithium Extraction by Emerging Metal–Organic Frameworkâ€Based Membranes. Advanced Functional Materials, 2021, 31, 2105991.	7.8	79
5507	Chimeras of KcsA and Kv1 as a bioengineering tool to study voltage-gated potassium channels and their ligands. Biochemical Pharmacology, 2021, 190, 114646.	2.0	6
5508	Function-Related Dynamics in Multi-Spanning Helical Membrane Proteins Revealed by Solution NMR. Membranes, 2021, 11, 604.	1.4	2
5509	Formation of the Metal-Binding Core of the ZRT/IRT-like Protein (ZIP) Family Zinc Transporter. Biochemistry, 2021, 60, 2727-2738.	1.2	8
5510	The Persistent Question of Potassium Channel Permeation Mechanisms. Journal of Molecular Biology, 2021, 433, 167002.	2.0	55
5511	Discrete and Continuous One-Dimensional Channels Based on Pillar[<i>n</i>]arenes. Bulletin of the Chemical Society of Japan, 2021, 94, 2319-2328.	2.0	17
5512	Membrane Materials for Selective Ion Separations at the Water–Energy Nexus. Advanced Materials, 2021, 33, e2101312.	11.1	100
5513	Emerging porous framework material-based nanofluidic membranes toward ultimate ion separation. Matter, 2021, 4, 2810-2830.	5.0	27
5514	Can ionic effects induce α-sheet conformation of Peptides?. Chemical Physics Letters, 2021, 784, 139095.	1.2	0

#	Article	IF	CITATIONS
5515	Anomalous ion transport through angstrom-scale pores: Effect of hydration shell exchange on ion mobility. Applied Surface Science, 2021, 560, 150022.	3.1	11
5516	Interaction-based ion selectivity exhibited by self-assembled, cross-linked zwitterionic copolymer membranes. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118,	3.3	20
5517	Hydration Dynamics in Biological Membranes: Emerging Applications of Terahertz Spectroscopy. Journal of Physical Chemistry Letters, 2021, 12, 9697-9709.	2.1	13
5518	Efficient Ion Sieving in Covalent Organic Framework Membranes with Subâ€2â€Nanometer Channels. Advanced Materials, 2021, 33, e2104404.	11.1	131
5519	Preparation of monovalent cation perm-selective membranes by controlling surface hydration energy barrier. Separation and Purification Technology, 2021, 270, 118768.	3.9	25
5521	Diffusive properties of colloidal charged particles in a quasi-one-dimensional confinement. Research, Society and Development, 2021, 10, e403101220595.	0.0	0
5522	Membrane science emerging as a convergent scientific field with molecular origins and understanding, and global impact. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	10
5523	Preparation and ion separation properties of sub-nanoporous PES membrane with high chemical resistance. Journal of Membrane Science, 2021, 635, 119467.	4.1	13
5524	Direct proof of soft knock-on mechanism of ion permeation in a voltage gated sodium channel. International Journal of Biological Macromolecules, 2021, 188, 369-374.	3.6	1
5525	Learning from the brain's architecture: bioinspired strategies towards implantable neural interfaces. Current Opinion in Biotechnology, 2021, 72, 8-12.	3.3	2
5526	Non-linear Conductance, Rectification, and Mechanosensitive Channel Formation of Lipid Membranes. Frontiers in Cell and Developmental Biology, 2020, 8, 592520.	1.8	5
5527	Tethered peptide toxins for ion channels. Methods in Enzymology, 2021, 654, 203-224.	0.4	4
5528	Mathematical Modelling in Biomedicine: A Primer for the Curious and the Skeptic. International Journal of Molecular Sciences, 2021, 22, 547.	1.8	7
5529	Dynamically Modulating Gating Process of Nanoporous Membrane at Sub-2 Nm Scale. SSRN Electronic Journal, 0, , .	0.4	0
5530	Microwave Assisted Synthesis of Quinoline Fused Benzodiazepines as Anxiolytic and Antimicrobial Agents. Asian Journal of Chemistry, 2021, 33, 1107-1114.	0.1	4
5531	Quantum Biology: An Update and Perspective. Quantum Reports, 2021, 3, 80-126.	0.6	74
5532	Zinc transporters and their functional integration in mammalian cells. Journal of Biological Chemistry, 2021, 296, 100320.	1.6	125
5533	Pharmacological Approaches to Studying Potassium Channels. Handbook of Experimental Pharmacology, 2021, 267, 83-111.	0.9	12

		ATION REPORT	
#	Article	IF	CITATIONS
5534	Comparison of K+ Channel Families. Handbook of Experimental Pharmacology, 2021, 267, 1-49.	0.9	10
5535	Potassium and sodium ion complexes with a partial peptide of the selectivity filter in K ⁺ channels studied by cold ion trap infrared spectroscopy: the effect of hydration. Physical Chemistry Chemical Physics, 2021, 23, 12045-12050.	1.3	7
5536	La indispensabilidad de las leyes en ciencias cognitivas. Sophia: Colección De FilosofÃa De La EducaciÃ 2021, , 95-123.	⁽³ n, 0.2	0
5537	Mechanism of C-type inactivation in the hERG potassium channel. Science Advances, 2021, 7, .	4.7	26
5539	Molecular Basis of the Charge Selectivity of Nicotinic Acetylcholine Receptor and Related Ligandâ€Gated Ion Channels. Novartis Foundation Symposium, 1999, 225, 215-230.	1.2	18
5542	Electrochemical communication in biofilm of bacterial community. Journal of Basic Microbiology, 2020, 60, 819-827.	1.8	14
5543	Cumulative hydropathic topology of a voltageâ€gated sodium channel at atomic resolution. Proteins: Structure, Function and Bioinformatics, 2020, 88, 1319-1328.	1.5	3
5544	Selective Permeability of Voltage-Gated Calcium Channels. , 2005, , 205-218.		4
5545	TRP Channels. , 2007, , 399-423.		2
5546	Ion Channels in Epithelial Cells. Biological and Medical Physics Series, 2007, , 425-445.	0.3	2
5547	Gramicidin Channels: Versatile Tools. , 2007, , 33-80.		14
5548	Chloride Transporting CLC Proteins1. Biological and Medical Physics Series, 2007, , 301-333.	0.3	2
5549	Model Systems for Biological Processes. , 2005, , 253-265.		3
5550	Structural Determinants of Potassium Channel Blockade and Drug-Induced Arrhythmias. , 2006, , 123-157.		3
5551	Structure of IP3 Receptor., 2009,, 441-461.		3
5552	Genetics of Hearing Loss. , 2008, , 9-47.		3
5553	Reconstitution of Membrane Proteins into Platforms Suitable for Biophysical and Structural Analyses. Methods in Molecular Biology, 2020, 2127, 191-205.	0.4	2
5554	Potassium Ion Channels in Articular Chondrocytes. , 2008, , 157-178.		1

		CITATION REP	ORT	
#	Article		IF	Citations
5555	Pharmacology of Cav1 (L-Type) Channels. , 2004, , 21-72.			6
5556	Peptide Toxin Inhibition of Voltage Gated Calcium Channels. , 2004, , 95-142.			3
5557	2P Domain K+ Channels: Novel Pharmacological Targets for Volatile General Anesthetics. Advance Experimental Medicine and Biology, 2003, 536, 9-23.	es in	0.8	14
5558	Bacterial Calcium Binding Proteins. , 2013, , 205-209.			1
5559	Bacterial Ion Channels. , 2003, 25, 91-111.			12
5560	Regulation of the Rod Photoreceptor Cyclic Nucleotide-Gated Channel. Advances in Experimental Medicine and Biology, 2002, 514, 205-223.		0.8	19
5561	Molecular Pharmacology of ATP-Sensitive K+Channels: How and Why?. , 2001, , 257-277.			8
5562	Three-Dimensional Structure of the K+Channel Pore: Basis for Ion Selectivity and Permeability. , 2 17-34.	001,,		3
5563	The Molecular Basis of the Long QT Syndrome. , 2001, , 753-772.			1
5564	Concepts for Patch-Clamp Recording of Whole-Cell and Single-Channel K+Currents in Cardiac and Vascular Myocytes. , 2001, , 119-142.	1		1
5565	Tryptophans in Membrane Proteins. Advances in Experimental Medicine and Biology, 1999, 467,	789-799.	0.8	36
5566	Bioreactive Tethers. Advances in Experimental Medicine and Biology, 2015, 869, 77-100.		0.8	2
5567	Enhancing Channelrhodopsins: An Overview. Methods in Molecular Biology, 2016, 1408, 141-16	5.	0.4	32
5568	Antiarrhythmic Drugs and Future Direction. Contemporary Cardiology, 2003, , 387-404.		0.0	1
5569	Three-Dimensional Crystallization of Membrane Proteins. Methods in Molecular Biology, 2007, 36 191-223.	53,	0.4	3
5570	Single-Molecule Methods for Monitoring Changes in Bilayer Elastic Properties. Methods in Molecu Biology, 2007, 400, 543-570.	ular	0.4	35
5571	Using Bioluminescence Resonance Energy Transfer to Measure Ion Channel Assembly. Methods in Molecular Biology, 2008, 491, 189-197.	1	0.4	2
5572	The Use of FRET Microscopy to Elucidate Steady State Channel Conformational Rearrangements Protein Interaction with the GIRK Channels. Methods in Molecular Biology, 2008, 491, 199-212.	and G	0.4	4

		TION REPORT	
#	Article	IF	CITATIONS
5573	Engineering K+ Channels Using Semisynthesis. Methods in Molecular Biology, 2013, 995, 3-17.	0.4	6
5574	Photochromic Potassium Channel Blockers: Design and Electrophysiological Characterization. Methods in Molecular Biology, 2013, 995, 89-105.	0.4	7
5575	The role of protein 3D-structures in the drug discovery process. , 2003, , 157-181.		8
5576	High-Resolution Views of TRPV1 and Their Implications for the TRP Channel Superfamily. Handbook of Experimental Pharmacology, 2014, 223, 991-1004.	0.9	15
5577	The Classical Hodgkin-Huxley ODEs. Texts in Applied Mathematics, 2017, , 15-21.	0.4	2
5578	Microbial Senses and Ion Channels. Springer Series in Biophysics, 2008, , 1-23.	0.4	2
5579	The Role of Cyclic Nucleotide-Gated Channels in Cation Nutrition and Abiotic Stress. Signaling and Communication in Plants, 2010, , 137-157.	0.5	9
5580	Biology of Plant Potassium Channels. Plant Cell Monographs, 2011, , 253-274.	0.4	4
5581	Advanced Molecular Modeling Techniques Applied to Ion Channels Blockers. , 2011, , 53-78.		1
5582	Altered Sodium Channel Gating as Molecular Basis for Pain: Contribution of Activation, Inactivation, and Resurgent Currents. Handbook of Experimental Pharmacology, 2014, 221, 91-110.	0.9	45
5583	Stereoselective Drug-Channel Interactions. Handbook of Experimental Pharmacology, 2003, , 199-228.	0.9	2
5584	Staphylococcal Pore-Forming Toxins. Current Topics in Microbiology and Immunology, 2001, 257, 53-83	. 0.7	109
5585	Structure of the Voltage-Dependent L-Type Calcium Channel. Handbook of Experimental Pharmacology, 2000, , 87-117.	0.9	2
5586	Overview of Potassium Channel Families: Molecular Bases of the Functional Diversity. Handbook of Experimental Pharmacology, 2000, , 157-176.	0.9	1
5587	The Na+/Ca2+ Exchanger: Structural Aspects, Function and Regulation. , 2000, , 173-188.		2
5588	Band 3 Mediated Transport. , 2003, , 253-301.		12
5589	The Ion-Conducting Pore of Glutamate Receptor Channels. Handbook of Experimental Pharmacology, 1999, , 219-249.	0.9	5
5590	Physiology and Pathology of Voltage-Gated T-Type Calcium Channels. , 2015, , 3-17.		2

#	Article	IF	CITATIONS
5591	Supramolecular Chemistry and the Life Sciences. , 2010, , 49-89.		1
5592	ATP-Sensitive Potassium Channels in Health and Disease. Advances in Experimental Medicine and Biology, 2010, 654, 165-192.	0.8	24
5593	Structural Biology of TRP Channels. Advances in Experimental Medicine and Biology, 2011, 704, 1-23.	0.8	57
5594	Ca2+ Signalling by IP3 Receptors. Sub-Cellular Biochemistry, 2012, 59, 1-34.	1.0	13
5595	Searching for Needles in Haystacks: Automation and the Task of Crystal Structure Determination. NATO Science for Peace and Security Series A: Chemistry and Biology, 2013, , 47-57.	0.5	2
5596	Protein Interaction Partners of Cav2.3 R-Type Voltage-Gated Calcium Channels. , 2013, , 151-174.		1
5597	Chloride Channels and Transporters in \hat{l}^2 -Cell Physiology. , 2015, , 401-451.		2
5598	Biology. Advances in Experimental Medicine and Biology, 2014, 794, 7-40.	0.8	2
5599	Membrane permeabilisation by Bacillus thuringiensis toxins: protein insertion and pore formation. , 2000, , 199-217.		18
5600	G protein-coupled receptor expression in Halobacterium salinarum. Focus on Structural Biology, 2001, , 141-159.	0.1	3
5601	From Topology to High Resolution Membrane Protein Structures. Focus on Structural Biology, 2001, , 55-69.	0.1	1
5602	Molecular mechanisms of potassium and sodium uptake in plants. , 2002, , 43-54.		31
5603	DNA Nanotechnology for Building Sensors, Nanopores and Ion-Channels. Advances in Experimental Medicine and Biology, 2019, 1174, 331-370.	0.8	6
5604	Macrocycle-Based Synthetic Ion Channels. , 2020, , 1519-1554.		2
5605	Calcium signaling: breast cancer's approach to manipulation of cellular circuitry. Biophysical Reviews, 2020, 12, 1343-1359.	1.5	16
5606	Ion Channels – Voltage Gated. , 2007, , 827-875.		2
5607	Sodium Channels. , 2004, , 1-9.		3
5608	Voltage-regulated Potassium Channels. , 2004, , 19-32.		5

#	Article	IF	CITATIONS
5609	Intracellular Signaling and Regulation of Cardiac Ion Channels. , 2004, , 33-41.		7
5610	Biophysics of Normal and Abnormal Cardiac Sodium Channel Function. , 2004, , 77-87.		1
5611	Gating of Cardiac Delayed Rectifier K+ Channels. , 2004, , 88-95.		1
5612	Biophysic Properties of Inward Rectifier Potassium Channels. , 2004, , 112-119.		4
5613	Dynamics and Molecular Mechanisms of Ventricular Fibrillation in Normal Hearts. , 2004, , 390-398.		3
5614	Ion Channels, Overview. , 2014, , 747-751.		2
5615	Protein structural dynamics by single-molecule fluorescence polarization. , 2001, , 1-35.		2
5616	The Effects of Electrolyte Disorders on Excitable Membranes. , 2008, , 1407-1427.		1
5617	VLG K Kv3-Shaw. , 1999, , 559-616.		1
5618	VLG K Kv4-Shal. , 1999, , 617-646.		5
5619	Voltage-Dependent K+ Channels. , 2001, , 259-280.		5
5620	Voltage and Calcium-Activated K+ Channels of Coronary Smooth Muscle. , 2001, , 309-325.		10
5621	Cardiac Pacemaker Currents. , 2001, , 357-372.		1
5622	Structure and Mechanism of Voltage-Gated Ion Channels. , 2001, , 455-477.		3
5623	Structure and function of the cardiac sodium channels. Cardiovascular Research, 1999, 42, 327-338.	1.8	66
5624	8 G protein gated potassium channels. Advances in Second Messenger and Phosphoprotein Research, 1999, 33, 179-201.	4.5	25
5625	10 Cyclic nucleotide gated channels. Advances in Second Messenger and Phosphoprotein Research, 1999, 33, 231-250.	4.5	19
5626	Supramolecular assemblies in natural and artificial ion channels. Advances in Supramolecular Chemistry, 2000, , 1-47.	1.8	17

#	Article	IF	CITATIONS
5627	Ion recognition and transportby poly-(R)-3-hydroxybutyrates and inorganic polyphosphates. Advances in Supramolecular Chemistry, 2000, , 49-98.	1.8	6
5630	Dual-Site Binding of Quaternary Ammonium Ions as Internal K+-Ion Channel Blockers: Nonclassical (C–H··A·O) H Bonding vs Dispersive (C–H··Ĥ–C) Interaction. Journal of Physical Chemistry B, 2021, 86-100.	1252	4
5631	Metal Toxicity $\hat{a} \in$ " An Introduction. 2-Oxoglutarate-Dependent Oxygenases, 2016, , 1-23.	0.8	17
5632	Chapter 3. Free Energy Calculations for Understanding Membrane Receptors. RSC Theoretical and Computational Chemistry Series, 2016, , 59-106.	0.7	1
5633	Complexes of Nucleic Acids with Group I and II Cations. RSC Biomolecular Sciences, 2008, , 1-38.	0.4	16
5634	Apoptosis-inducing activity of a fluorescent barrel-rosette M ⁺ /Cl ^{â^'} channel. Chemical Science, 2020, 11, 2420-2428.	3.7	31
5635	Self-association and precursor protein binding of Saccharomyces cerevisiae Tom40p, the core component of the protein translocation channel of the mitochondrial outer membrane. Biochemical Journal, 2001, 356, 207.	1.7	21
5636	Uterocalin, a lipocalin provisioning the preattachment equine conceptus: fatty acid and retinol binding properties, and structural characterization. Biochemical Journal, 2001, 356, 369.	1.7	36
5637	Models for oscillations in plants. Functional Plant Biology, 2001, 28, 577.	1.1	19
5638	Visualization of a water-selective pore by electron crystallography in vitreous ice. Proceedings of the National Academy of Sciences of the United States of America, 2001, 98, 1398-1403.	3.3	79
5639	An artificial tetramerization domain restores efficient assembly of functional Shaker channels lacking T1. Proceedings of the National Academy of Sciences of the United States of America, 2000, 97, 3591-3595.	3.3	56
5640	Selectivity filter ion binding affinity determines inactivation in a potassium channel. Proceedings of the United States of America, 2020, 117, 29968-29978.	3.3	29
5641	Structural Influence of Hanatoxin Binding on the Carboxyl Terminus of S3 Segment in Voltage-Gated K + -Channel Kv2.1. Receptors and Channels, 2002, 8, 79-85.	1.1	4
5642	S4 Charges Move Close to Residues in the Pore Domain during Activation in a K Channel. Journal of General Physiology, 2001, 118, 1-10.	0.9	69
5643	S4 Charges Move Close to Residues in the Pore Domain during Activation in a K Channel. Journal of General Physiology, 2001, 118, 1-10.	0.9	39
5644	Structural mechanisms of transient receptor potential ion channels. Journal of General Physiology, 2020, 152, .	0.9	59
5645	K+-Channel Transgenes Reduce K+ Currents in Paramecium, Probably by a Post-translational Mechanism. Genetics, 2001, 159, 987-995.	1.2	7
5646	Identification and characterization of plant transporters using heterologous expression systems. Journal of Experimental Botany, 1999, 50, 1073-1087.	2.4	66

Image: Control Product of the standard and stands and brain. Current Opinion in Neurology, 1998, 11, 461 468. Product of the standard and stands and stands. Current Opinion in Neurology, 1998, 11, 461 468. Product of the standard and stands and stands. Current Opinion in Neurology, 1998, 11, 461 468. Product of the standard and stands and stands. Current Opinion in Neurology, 1998, 11, 461 468. Product of the standard and standa			CITATION REPORT		
Genomic survey of CAMP and CGMP signalling CODO (1146) contents in the cyanabacterium Synachacystis PCC 0.7 53 Genomic survey of CAMP and CGMP signalling CODO (1146) and Synaphic	#	Article		IF	CITATIONS
Bank 6803. Microbiology (United Kingdom), 2000; 146, 3183-3194. 0.0 33 B6449 Identification of the ABC protein SapD as the subunit that confers AIP dependence to the K+uptake systems Thilt and ThiC from Escherichia coll K-12. Microbiology (United Kingdom), 2001, 147, 2991-3003. 0.7 55 B665 Ion Channels: History, Diversity, and Impact. Cold Spring Harbor Protocols, 2017, 2017, pdb-top092288. 0.2 3 B667 Colledal hydrodynamics of biological cells: A frontier spanning two fields. Physical Review Fluids, 2019, 4, . 1.0 14 B668 Ine structure of a potassium-selective ion channel reveals a hydrophobic gate regulating ion 76, 326-331. 1.0 8 B669 Ion germeation. IUCI, 2020, 7, 835-843. 1.3 9 B669 Tight coupling of rubidum conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 B669 Tight coupling of rubidum conductance and inactivation in human KCNQ1 potassium channels. 1.4 1 B669 Tight coupling of rubidum conductance and inactivation in human KCNQ1 potassium channels. 1.4 1 B669 Deciphering cip Structure to Conventional Immunosuppression: Small-Molecule Inhibitors of Kv1.3 Channels. 1.4 1 B660 Deciphering cip Structural Features of the Clutamate Transporter Family. Microbiology and Molecular Biology </td <td>5647</td> <td>Ion channel mutations affecting muscle and brain. Current Opinion in Neurology, 1998</td> <td>3, 11, 461-468.</td> <td>1.8</td> <td>20</td>	5647	Ion channel mutations affecting muscle and brain. Current Opinion in Neurology, 1998	3, 11, 461-468.	1.8	20
B449 systems TrkH and TrkG from Escherichia coli K-12. Microbiology (United Kingdom), 2001, 147, 2991-3003. 0.7 B3 6666 Ion Channels: History, Diversity, and Impact. Cold Spring Harbor Protocols, 2017, 2017, pdb. top092288. 0.2 8 6667 Colloidal hydrodynamics of biological cells: A frontier spanning two fields. Physical Review Fluids, 1.0 14 6668 The structure of a potassium selective ion channel reveals a hydrophobic gate regulating ion 1.0 8 6669 Formeration. IU Cri, 2020, 7, 235 843. 1.0 1.0 8 6669 Formeration in potassium ion channels. Acta Crystallographica Section D: Structural Biology, 2020, 1.1 9 6660 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 6661 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 55 6662 Molecular Interventions: Pharmacological Perspectives From Biology, Chemistry and Genomics, 2004. 3.4 14 6666 Deciphering ci>Structural features of the Glutamate Transporter Family. Microbiology and Molecular Biology 2.9 127 6669 Reviews, 1999, 63, 293-307. 0.9 16 305 6669 Countr	5648	Genomic survey of cAMP and cGMP signalling components in the cyanobacterium Syn 6803. Microbiology (United Kingdom), 2000, 146, 3183-3194.	echocystis PCC	0.7	33
3667 Colloidal hydrodynamics of biological cells: A frontier spanning two fields. Physical Review Fluids, 1.0 14 5687 The structure of a potassium-selective ion channel reveals a hydrophobic gate regulating ion 1.0 8 5669 Ion permeation in potassium ion channels. Acta Crystallographica Section D: Structural Biology, 2020, 11 9 9 5660 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 5661 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 56 5662 An Aternative to Convertional Immunosuppression: Small-Molecule Inhibitors of Kv1.3 Channels. 3.4 14 5666 Deciphering () Streptomyces lividans (I) KcsA as a K Channel Model., 0, , 41-67. 1 1 5668 Structurel Features of the Clutamate Transporter Family. Microbiology and Molecular Biology 2.9 127 5669 CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401. 5.6 36 5671 ACenetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational 0.4 20 5668 Structurel features of the Clutamate Transporter Family. Microbiology and Molecular Biology 2.9 127	5649	Identification of the ABC protein SapD as the subunit that confers ATP dependence to systems TrkH and TrkG from Escherichia coli K-12. Microbiology (United Kingdom), 200	the K+-uptake)1, 147, 2991-3003.	0.7	55
3687 2019, 4, . L0 14 3668 The structure of a potassium-selective ion channel reveals a hydrophobic gate regulating ion 10 8 3669 Ion permeation in potassium ion channels. Acta Crystallographica Section D: Structural Biology, 2020, 1.1 9 3660 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 3660 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 3660 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 3660 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 3661 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. 1.3 3 3662 Molecular Interventions Pharmacological Perspectives From Biology, Chemistry and Genomics, 2004, 4, 250-254. 3.4 14 3666 Deciphering (-) Streptomyces lividans (-): KcsA as a K Channel Model., 0, , 41-67. 1 3 3666 Structural Features of the Glutamate Transporter Family. Microbiology and Molecular Biology 2.9 127 3667 Cowards an Understanding of Membrane Channels. , 0, , 153-19	5656	Ion Channels: History, Diversity, and Impact. Cold Spring Harbor Protocols, 2017, 2017	7, pdb.top092288.	0.2	3
1009 permeation. IUC J, 2020, 7, 835-843. 100 s 100 11 9 100 76, 326-331. 1.1 9 100 11 9 1.1 9 100 11 1.1 9 1.1 9 100 11 1.1 9 1.1 9 100 11 1.1 9 1.1 9 100 11 1.3 3 3 100 11 1.3 3 3 100 11 1.3 55 3 100 11 1.3 55 3 100 1.3 55 3 56 111 1.3 55 3 56 111 1.3 55 3 56 111 1.3 56 3 56 111 1.3 56 3 3 111 1.3 56 3 3 3 111 1.3 3 3 3 3 3	5657		iew Fluids,	1.0	14
365976, 326-331.11976, 326-331.1111976, 60Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels.1.335661Journal of Physiology, 2003, 552, 369-378.1.3555662An Alternative to Conventional Immunosuppression: Small-Molecule Inhibitors of Kv1.3 Channels.1.3555662An Alternative to Conventional Immunosuppression: Small-Molecule Inhibitors of Kv1.3 Channels. Molecular Interventions: Pharmacological Perspectives From Biology, Chemistry and Genomics, 2004, 4, 250-254.3.4145666Deciphering Perspectives Ividans (l> KcsA as a K Channel Model., 0, , 41-67.15667Towards an Understanding of Membrane Channels., 0, , 153-190.35668Structural Features of the Clutamate Transporter Family. Microbiology and Molecular Biology Reviews, 1999, 63, 293-307.0.9165670CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401.5.63655671ACenetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505.0.4205672Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399.3.9199	5658	The structure of a potassium-selective ion channel reveals a hydrophobic gate regulatin permeation. IUCrJ, 2020, 7, 835-843.	ng ion	1.0	8
Journal of Physiology, 2003, 552, 369-378. Lis S 5661 Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium channels. Lis 55 5662 An Alternative to Conventional Immunosuppression: Small-Molecule Inhibitors of Kv1.3 Channels. 3.4 14 5666 Deciphering (I) Streptomyces lividans (I) KcsA as a K Channel Model., 0, , 41-67. 1 5666 Deciphering (I) Streptomyces lividans (I) KcsA as a K Channel Model., 0, , 41-67. 1 5667 Towards an Understanding of Membrane Channels., 0, , 153-190. 3 5668 Structural Features of the Clutamate Transporter Family. Microbiology and Molecular Biology Reviews, 1999, 63, 293-307. 2.9 127 5669 Anion exchangers in the red cell and beyond. Biochemistry and Cell Biology, 1998, 76, 709-713. 0.9 16 5670 CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401. 5.6 365 5671 A Genetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505. 0.4 20 5672 Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399. 3.9 199	5659		l Biology, 2020,	1.1	9
3611Journal of Physiology, 2003, 552, 369-378.1.3535662An Alternative to Conventional Immunosuppression: Small-Molecule Inhibitors of Kv1.3 Channels. Molecular Interventions: Pharmacological Perspectives From Biology, Chemistry and Genomics, 2004, 4, 250-254.3.4145666Deciphering <i>> Streptomyces lividans </i> > KcsA as a K Channel Model. , 0, , 41-67.15667Towards an Understanding of Membrane Channels. , 0, , 153-190.35668Structural Features of the Glutamate Transporter Family. Microbiology and Molecular Biology Reviews, 1999, 63, 293-307.2.91275669Anion exchangers in the red cell and beyond. Biochemistry and Cell Biology, 1998, 76, 709-713.0.9165670CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401.5.63655671A Cenetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505.0.4205672Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399.3.9199	5660		channels.	1.3	3
5662Molecular Interventions: Pharmacological Perspectives From Biology, Chemistry and Genomics, 2004, 4, 250-254.3.4145666Deciphering < > Streptomyces lividans < />(> Streptomyces lividans 15667Towards an Understanding of Membrane Channels., 0, , 153-190.35668Structural Features of the Clutamate Transporter Family. Microbiology and Molecular Biology Reviews, 1999, 63, 293-307.2.91275669Anion exchangers in the red cell and beyond. Biochemistry and Cell Biology, 1998, 76, 709-713.0.9165670CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401.5.63655671A Genetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505.0.4205672Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399.3.9199	5661	Tight coupling of rubidium conductance and inactivation in human KCNQ1 potassium Journal of Physiology, 2003, 552, 369-378.	channels.	1.3	55
5667Towards an Understanding of Membrane Channels. , 0, , 153-190.35668Structural Features of the Glutamate Transporter Family. Microbiology and Molecular Biology Reviews, 1999, 63, 293-307.2.91275669Anion exchangers in the red cell and beyond. Biochemistry and Cell Biology, 1998, 76, 709-713.0.9165670CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401.5.63655671A Genetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505.0.4205672Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399.3.9199	5662	Molecular Interventions: Pharmacological Perspectives From Biology, Chemistry and G	Channels. enomics, 2004,	3.4	14
5668Structural Features of the Clutamate Transporter Family. Microbiology and Molecular Biology Reviews, 1999, 63, 293-307.2.91275669Anion exchangers in the red cell and beyond. Biochemistry and Cell Biology, 1998, 76, 709-713.0.9165670CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401.5.63655671A Cenetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505.0.4205672Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399.3.9199	5666	Deciphering <i>Streptomyces lividans</i> KcsA as a K Channel Model. , 0, , 41-67.			1
5668Reviews, 1999, 63, 293-307.1.1.1.1.1.1.1.1.1.1.1.1.1.1.1.1.1.1.1.	5667	Towards an Understanding of Membrane Channels. , 0, , 153-190.			3
5670CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68, 375-401.5.63655671A Genetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505.0.4205672Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399.3.9199	5668	Structural Features of the Glutamate Transporter Family. Microbiology and Molecular E Reviews, 1999, 63, 293-307.	Biology	2.9	127
5671 A Genetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of Computational and Theoretical Nanoscience, 2005, 2, 499-505. 0.4 20 5672 Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of Clinical Investigation, 2002, 109, 1395-1399. 3.9 199	5669	Anion exchangers in the red cell and beyond. Biochemistry and Cell Biology, 1998, 76,	709-713.	0.9	16
3071 and Theoretical Nanoscience, 2005, 2, 499-505. 0.4 20 5672 Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of 3.9 199 5672 Aquaporin water channels: atomic structure molecular dynamics meet clinical medicine. Journal of 3.9 199	5670	CNG AND HCN CHANNELS: Two Peas, One Pod. Annual Review of Physiology, 2006, 68	3, 375-401.	5.6	365
Clinical Investigation, 2002, 109, 1395-1399.	5671	A Genetic Algorithm Approach to Solving DNA Fragment Assembly Problem. Journal of and Theoretical Nanoscience, 2005, 2, 499-505.	Computational	0.4	20
	5672		2. Journal of	3.9	199
	5673		e. Journal of	3.9	96

# 5674	ARTICLE The channelopathies: novel insights into molecular and genetic mechanisms of human disease. Journal of Clinical Investigation, 2005, 115, 1986-1989.	IF 3.9	Citations
5675	Endocytic control of ion channel density as a target for cardiovascular disease. Journal of Clinical Investigation, 2009, 119, 2531-2534.	3.9	13
5676	Protein Sequence Analysis and Prediction of Secondary Structural Features. , 2004, , 99-185.		1
5677	Structural Insights into the Function of TRP Channels. Frontiers in Neuroscience, 2006, , 349-360.	0.0	3
5678	Molecular Mechanisms of TRPV4 Gating. Frontiers in Neuroscience, 2006, , 113-124.	0.0	5
5679	Computer Models of Ion Channels. , 2002, , 1-60.		6
5680	Evolutionary Link Between Prokaryotic and Eukaryotic K+ Channels. Journal of Experimental Biology, 1998, 201, 2791-2799.	0.8	37
5681	Permeation Through the Cftr Chloride Channel. Journal of Experimental Biology, 2000, 203, 1947-1962.	0.8	92
5682	Architecture and Selectivity in Aquaporins: 2.5 Ã X-Ray Structure of Aquaporin Z. PLoS Biology, 2003, 1, e72.	2.6	248
5683	Two Separate Interfaces between the Voltage Sensor and Pore Are Required for the Function of Voltage-Dependent K+ Channels. PLoS Biology, 2009, 7, e1000047.	2.6	138
5684	A single Markov-type kinetic model accounting for the macroscopic currents of all human voltage-gated sodium channel isoforms. PLoS Computational Biology, 2017, 13, e1005737.	1.5	23
5685	Selection of Inhibitor-Resistant Viral Potassium Channels Identifies a Selectivity Filter Site that Affects Barium and Amantadine Block. PLoS ONE, 2009, 4, e7496.	1.1	42
5686	P-Loop Residues Critical for Selectivity in K+ Channels Fail to Confer Selectivity to Rabbit HCN4 Channels. PLoS ONE, 2009, 4, e7712.	1.1	8
5687	Domain-Based Identification and Analysis of Glutamate Receptor Ion Channels and Their Relatives in Prokaryotes. PLoS ONE, 2010, 5, e12827.	1.1	20
5688	Gating of a pH-Sensitive K2P Potassium Channel by an Electrostatic Effect of Basic Sensor Residues on the Selectivity Filter. PLoS ONE, 2011, 6, e16141.	1.1	32
5689	Theory of Electric Resonance in the Neocortical Apical Dendrite. PLoS ONE, 2011, 6, e23412.	1.1	17
5690	Promiscuous Binding in a Selective Protein: The Bacterial Na+/H+ Antiporter. PLoS ONE, 2011, 6, e25182.	1.1	8
5691	Preparation and Characterization of the Extracellular Domain of Human Sid-1. PLoS ONE, 2012, 7, e33607.	1.1	15

#	Article	IF	CITATIONS
5692	Identification and Analysis of Cation Channel Homologues in Human Pathogenic Fungi. PLoS ONE, 2012, 7, e42404.	1.1	27
5693	Vitamin A Transport and the Transmembrane Pore in the Cell-Surface Receptor for Plasma Retinol Binding Protein. PLoS ONE, 2013, 8, e73838.	1.1	17
5694	Non-Equilibrium Dynamics Contribute to Ion Selectivity in the KcsA Channel. PLoS ONE, 2014, 9, e86079.	1.1	13
5695	Targeted High-Throughput Sequencing Identifies Pathogenic Mutations in KCNQ4 in Two Large Chinese Families with Autosomal Dominant Hearing Loss. PLoS ONE, 2014, 9, e103133.	1.1	25
5696	Lack of Negatively Charged Residues at the External Mouth of Kir2.2 Channels Enable the Voltage-Dependent Block by External Mg2+. PLoS ONE, 2014, 9, e111372.	1.1	8
5697	Mapping Hydrophobicity on the Protein Molecular Surface at Atom-Level Resolution. PLoS ONE, 2014, 9, e114042.	1.1	21
5698	K+-Dependent Selectivity and External Ca2+ Block of Shab K+ Channels. PLoS ONE, 2015, 10, e0120431.	1.1	4
5699	Ion Concentration- and Voltage-Dependent Push and Pull Mechanisms of Potassium Channel Ion Conduction. PLoS ONE, 2016, 11, e0150716.	1.1	5
5700	Peptidomimetic Star Polymers for Targeting Biological Ion Channels. PLoS ONE, 2016, 11, e0152169.	1.1	5
5701	The Outer Pore and Selectivity Filter of TRPA1. PLoS ONE, 2016, 11, e0166167.	1.1	20
5702	Observation of σ-pore currents in mutant hKv1.2_V370C potassium channels. PLoS ONE, 2017, 12, e0176078.	1.1	2
5703	Mutagenesis to Study Channel Structure. , 2001, 154, 251-268.		13
5704	BK Channels in Cardiovascular Diseases and Aging. , 0, , 38-49.		16
5705	Synapses, Quantum Theory and Panpsychism. NeuroQuantology, 2008, 6, .	0.1	1
5706	Mathematical models of ion transport through cell membrane channels. Mathematica Applicanda, 2014, 42, .	0.2	8
5707	Investigating Potassium Channels in Budding Yeast: A Genetic Sandbox. Genetics, 2018, 209, 637-650.	1.2	9
5708	Functional Analyses, Mechanistic Explanations, and Explanatory Tradeoffs. Journal of Cognitive Science, 2013, 14, 229-251.	0.2	6
5710	Mitochondrial potassium channels – an overview. Postepy Biochemii, 2018, 64, 196-212.	0.5	18

# 5711	ARTICLE Potassium channels in C. elegans. WormBook, 2006, , 1-15.	IF 5.3	Citations
5712	Specific interactions between alkali metal cations and the KcsA channel studied using ATR-FTIR spectroscopy. Biophysics and Physicobiology, 2015, 12, 37-45.	0.5	11
5713	Identical Unitary Current Amplitude and Ca2+ Block of Cardiac Na Channel before and during .BETAAdrenergic Stimulation The Japanese Journal of Physiology, 2001, 51, 679-685.	0.9	4
5714	Progress in protein crystallography. Protein and Peptide Letters, 2016, 23, 201-210.	0.4	23
5715	Recent Developments in Computational Prediction of hERG Blockage. Current Topics in Medicinal Chemistry, 2013, 13, 1317-1326.	1.0	67
5716	Organic Toxins as Tools to Understand Ion Channel Mechanisms and Structure. Current Topics in Medicinal Chemistry, 2015, 15, 581-603.	1.0	15
5717	Revisit of the Cardiac Inward Rectifier Potassium Current IK1. The Open Circulation & Vascular Journal, 2012, 3, 95-102.	0.4	2
5718	Molecular Dynamics Simulations of Membrane Proteins: Building Starting Structures and Example Applications. Current Physical Chemistry, 2012, 2, 363-378.	0.1	3
5719	Regulation of Ion Channel and Transporter Function Through RNA Editing. Current Issues in Molecular Biology, 2015, , .	1.0	10
5720	Visualization and functional analysis of a maxi-K channel (mSlo) fused to green fluorescent protein (GFP). Electronic Journal of Biotechnology, 1999, 2, .	1.2	4
5721	Voltage-dependent calcium channels in mammalian spermatozoa revisited. Frontiers in Bioscience - Landmark, 2007, 12, 1420.	3.0	19
5722	Three-dimensional reconstruction of ryanodine receptors. Frontiers in Bioscience - Landmark, 2002, 7, d1464-1474.	3.0	33
5723	Structural Influence of Hanatoxin Binding on the Carboxyl Terminus of S3 Segment in Voltage-Gated K + -Channel Kv2.1. Receptors and Channels, 2002, 8, 79-85.	1.1	1
5724	Mechanisms of Activation of Voltage-Gated Potassium Channels. Acta Naturae, 2014, 6, 10-26.	1.7	45
5725	Modeling of the Binding of Peptide Blockers to Voltage-Gated Potassium Channels: Approaches and Evidence. Acta Naturae, 2016, 8, 35-46.	1.7	11
5726	Fake It †Till You Make It—The Pursuit of Suitable Membrane Mimetics for Membrane Protein Biophysics. International Journal of Molecular Sciences, 2021, 22, 50.	1.8	19
5727	Electrochemical Biosensors - Sensor Principles and Architectures. Sensors, 2008, 8, 1400-1458.	2.1	1,607
5728	Effect of intracellular diffusion on currentvoltage curves in potassium channels. Discrete and Continuous Dynamical Systems - Series B, 2014, 19, 1837-1853.	0.5	4

	Сітатіс	on Report	
#	Article	IF	CITATIONS
5729	Dynamics of ionic flows via Poisson-Nernst-Planck systems with local hard-sphere potentials: Competition between cations. Mathematical Biosciences and Engineering, 2020, 17, 3736-3766.	1.0	16
5730	Solid-State NMR Spectroscopic Approaches to Investigate Dynamics, Secondary Structure and Topology of Membrane Proteins. Open Journal of Biophysics, 2012, 02, 109-116.	0.7	3
5731	Design and Synthesis of Ladder-Shaped Polyethers and Evaluation of the Interaction with Transmembrane Proteins. Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 2009, 67, 1250-1260.	0.0	2
5732	Impact of the Protein Data Bank Across Scientific Disciplines. Data Science Journal, 2020, 19, 25.	0.6	17
5733	Bioinformatic approaches for the structure and function of membrane proteins. BMB Reports, 2009, 42, 697-704.	1.1	32
5734	Abiotic Stress Response in Plants - Physiological, Biochemical and Genetic Perspectives. , 2011, , .		23
5735	Distinct gating mechanisms revealed by the structures of a multi-ligand gated K+ channel. ELife, 2012, 1, e00184.	2.8	23
5736	Structure of a pore-blocking toxin in complex with a eukaryotic voltage-dependent K+ channel. ELife, 2013, 2, e00594.	2.8	178
5737	Hydrogen bonds as molecular timers for slow inactivation in voltage-gated potassium channels. ELife, 2013, 2, e01289.	2.8	60
5738	lonic selectivity and thermal adaptations within the voltage-gated sodium channel family of alkaliphilic Bacillus. ELife, 2014, 3, .	2.8	34
5739	Mechanism of activation at the selectivity filter of the KcsA K+ channel. ELife, 2017, 6, .	2.8	43
5740	Structure-based analysis of CysZ-mediated cellular uptake of sulfate. ELife, 2018, 7, .	2.8	10
5741	A single K+-binding site in the crystal structure of the gastric proton pump. ELife, 2019, 8, .	2.8	22
5742	Gating and selectivity mechanisms for the lysosomal K+ channel TMEM175. ELife, 2020, 9, .	2.8	24
5743	Structural basis for ion selectivity in TMEM175 K+ channels. ELife, 2020, 9, .	2.8	27
5744	Global alignment and assessment of TRP channel transmembrane domain structures to explore functional mechanisms. ELife, 2020, 9, .	2.8	42
5745	Activation of the archaeal ion channel MthK is exquisitely regulated by temperature. ELife, 2020, 9, .	2.8	13
5746	Cryo-EM analysis of PIP2 regulation in mammalian GIRK channels. ELife, 2020, 9, .	2.8	52

#	Article	IF	CITATIONS
5747	Molecular Dynamics Approach of Ion Channeling through Peptide Nanotubes. Japanese Journal of Applied Physics, 2011, 50, 037002.	0.8	3
5748	Pacemaking Activity in the Peripheral Nervous System: Physiology and Roles of Hyperpolarization Activated and Cyclic Nucleotide-Gated Channels in Neuropathic Pain. Cureus, 2020, 12, e11111.	0.2	3
5750	Conductance stability and Na+ interaction with Shab K+ channels under low K+ conditions. Channels, 2021, 15, 648-665.	1.5	0
5751	The Integrative Approach to Study of the Structure and Functions of Cardiac Voltage-Dependent Ion Channels. Crystallography Reports, 2021, 66, 711-725.	0.1	1
5752	A Facile Strategy for the Ion Current and Fluorescence Dual-Lock in Detection: Naphthalic Anhydride Azide (NAA)-Modified Biomimetic Nanochannel Sensor towards H2S. Chemosensors, 2021, 9, 298.	1.8	4
5753	Double Ion Trap Laser Spectroscopy of Alkali Metal Ion Complexes with a Partial Peptide of the Selectivity Filter in K ⁺ Channels─Temperature Effect and Barrier for Conformational Conversions. Journal of Physical Chemistry A, 2021, 125, 9609-9618.	1.1	12
5755	Getting to the bottom of lncRNA mechanism: structure–function relationships. Mammalian Genome, 2022, 33, 343-353.	1.0	15
5756	Transport threshold in a quantum model for the KscA ion channel. Journal of Physics Condensed Matter, 2022, 34, 025101.	0.7	1
5757	Experimental challenges in ion channel research: uncovering basic principles of permeation and gating in potassium channels. Advances in Physics: X, 2022, 7, .	1.5	2
5758	Membrane Nanopores Induced by Nanotoroids via an Insertion and Pore-Forming Pathway. Nano Letters, 2021, 21, 8545-8553.	4.5	4
5759	Structures of Gating Intermediates in a K+ channel. Journal of Molecular Biology, 2021, 433, 167296.	2.0	2
5760	Introductory Review: K Currents and Modulation. , 2000, , 52-58.		0
5762	Gating of Ion Channels by Transmitters: The Range of Structures of the Transmitter-Gated Channels. Handbook of Experimental Pharmacology, 2000, , 365-392.	0.9	0
5763	Cardiac K+ Channels and Inherited Long QT Syndrome. Handbook of Experimental Pharmacology, 2000, , 347-362.	0.9	0
5764	Structure and Functions of Voltage-Dependent Na+ Channels. Handbook of Experimental Pharmacology, 2000, , 3-26.	0.9	0
5765	Roles of Water in a Gating of Voltage-gated Ion Channels Seibutsu Butsuri, 2000, 40, 185-190.	0.0	2
5766	Pharmacology of Voltage-Gated Potassium Channels. Handbook of Experimental Pharmacology, 2000, , 177-196.	0.9	0
5767	Classical Inward Rectifying Potassium Channels: Mechanisms of Inward Rectification. Handbook of Experimental Pharmacology, 2000, , 225-242.	0.9	0

		CITATION REPOR	RT	
#	Article	IF		Citations
5768	Basic Pharmacology of Volatile Anesthetics. Handbooks of Pharmacology and Toxicology, 2000, , 1-	35. 0.	1	0
5769	Pharmacology of Small-Conductance, Calcium-Activated K+Channels. , 2001, , 235-256.			0
5770	Ion Channels Permeable to Monovalent and Divalent Cations: A Single-File Two-Site Channel Model. The Japanese Journal of Physiology, 2001, 51, 569-576.	. 0.	9	0
5771	Calmodulin and Plant Responses to the Environment. , 2001, , 113-123.			0
5772	Mode of Action of Antiarrhythmic Drugs. , 2001, , 837-849.			0
5773	Biologische Membranen und Transport. Springer-Lehrbuch, 2001, , 411-464.	0.	1	0
5774	Molecular Biology of Inward Rectifier and ATP-Sensitive Potassium Channels. , 2001, , 71-88.			0
5775	Molecular Biology of Voltage-Gated K+Channels. , 2001, , 35-48.			1
5776	Ca2+ Release from Sarcoplasmic Reticulum in Muscle. , 2001, , 927-940.			1
5777	Molekulare Pathophysiologie der angeborenen Salzverlusttubulopathien mit HypokaliĤnie. , 2001, , 259-277.			Ο
5778	Evolution of Potassium Channel Proteins. , 2001, , 3-16.			1
5779	Ion Channels as Targets for Toxins. , 2001, , 625-642.			ο
5780	Lipids, Membranes, and Cell Coats. , 2001, , 379-453.			0
5781	Mineral Nutrient Transport in Plants. , 2001, , .			1
5782	Structure of ionotropic glutamate receptors. , 2001, , 53-67.			1
5783	Structure of ionotropic glutamate receptors. Pharmaceutical Science Series, 2001, , 41-55.	0.	0	0
5786	Ionic Energetics in Narrow Channels. The IMA Volumes in Mathematics and Its Applications, 2002, ,	1-25. 0.4	5	2
5789	Nerve and Muscle Anatomy and Physiology. , 2002, , 3-26.			3

#	Article	IF	CITATIONS
5790	Perspectives of future researches about cardiac ion channels. Japanese Journal of Electrocardiology, 2002, 22, 551-558.	0.0	0
5791	The Use of Streaming Potential Measurements to Characterize Biological Ion Channels. The IMA Volumes in Mathematics and Its Applications, 2002, , 53-63.	0.5	1

5792 èー¬ç‰©è³~発性QT延長症候ç¾ﷺå†åæ§‹é€æ©Ÿåº{2.东•´è,,^ã@éŸä¼ãƒ»å^†å機æ§‹)(<特集>第6ðå≵žæ—¥æœ¬å¾³ç³′

5793	Alteration of Membrane Potential. , 2003, , 235-259.		0
5794	Block of Recombinant KCNQ1/KCNE1 K+ Channels (IKs) by Intracellular Na+ and Its Implications on Action Potential Repolarization. The Japanese Journal of Physiology, 2003, 53, 417-425.	0.9	0
5795	Overview: Function and Three-Dimensional Structures of Ion Channels. , 2003, , 203-208.		0
5796	Small Conductance Ca2+-Activated K+ Channels: Mechanism of Ca2+ Gating. , 2003, , 227-232.		0
5797	Signal Transduction and Integral Membrane Proteins. , 2003, , 115-118.		1
5798	Ion Permeation: Mechanisms of Ion Selectivity and Block. , 2003, , 215-217.		0
5799	2P domain K+ channels: novel targets for volatile general anaesthetics. , 2003, , 843-855.		0
5800	Ryanodine Receptors. , 2003, , 45-49.		0
5801	Calcium Dynamics and cell model The Brain & Neural Networks, 2003, 10, 164-170.	0.1	0
5802	Ion Channels, Overview. , 2003, , 701-706.		0
5803	How Do Voltage-Gated Channels Sense the Membrane Potential?. , 2003, , 209-214.		1
5804	Channel champions win chemistry Nobel. Nature, 0, , .	13.7	0
5805	Application of Molecular Biology Techniques to Astrobiology. Cellular Origin and Life in Extreme Habitats, 2004, , 269-273.	0.3	1
5806	Membrane Transport, General Concepts. , 2004, , 627-630.		0
5809	Ion Transport in Biological Membranes. , 2005, , 1-9.		1

#	Article	IF	CITATIONS
5810	Progress in a Study of Ion Channels for 50 Years. Seibutsu Butsuri, 2005, 45, 10-15.	0.0	1
5811	Structure and Function of a Viral Encoded K+ Channel. , 2005, , 21-32.		Ο
5812	A numerical solver of 3D Poisson Nernst Planck equations for functional studies of ion channels. , 2005, , .		1
5813	Dynamique moléculaire et canaux ioniques. European Physical Journal Special Topics, 2005, 130, 179-191.	0.2	Ο
5814	Polyamine Block of Kir Channels. , 2006, , 383-396.		0
5815	Molecular physiology. , 2006, , 79-89.		0
5816	2 Genetics of Hearing Loss. , 2006, , .		0
5817	Structural and functional relationship between cation transporters and channels. , 2006, , 177-184.		0
5818	Dysrhythmias and Sudden Death. , 2007, , 513-552.		0
5819	Atomic Resolution Structures of Integral Membrane Proteins Using Cubic Lipid Phase Crystallization. RSC Biomolecular Sciences, 2007, , 173-192.	0.4	0
5820	Intraprotein Proton Transfer - Concepts and Realities from the Bacterial Photosynthetic Reaction Center. RSC Biomolecular Sciences, 2007, , 273-313.	0.4	2
5821	Folding Patterns of Membrane Proteins: Diversity and the Limitations of their Prediction. Novartis Foundation Symposium, 1999, 225, 207-214.	1.2	0
5823	Ionic Interactions in Multiply Occupied Channels. Novartis Foundation Symposium, 1999, 225, 153-169.	1.2	2
5825	The Mechanism of Channel Formation by Alamethicin as Viewed by Molecular Dynamics Simulations. Novartis Foundation Symposium, 1999, 225, 128-152.	1.2	3
5826	Peptide Influences on Lipids. Novartis Foundation Symposium, 1999, 225, 170-187.	1.2	0
5827	Cyclic GMPâ€Gated Channel and Peripherin/rdsâ€româ€l Complex of Rod Cells. Novartis Foundation Symposium, 1999, 224, 249-264.	1.2	9
5828	Biophysics of CNG Ion Channels. Springer Series in Biophysics, 2008, , 175-200.	0.4	0
5830	Crystallization Methods of Membrane Proteins: Practical Aspects of Crystallizing Plant Light-Harvesting Complexes. Advances in Photosynthesis and Respiration, 2008, , 77-96.	1.0	Ο

#	Article	IF	CITATIONS
5832	Neurons, Cooperativity and the Role of Noise in Brain. NeuroQuantology, 2008, 6, .	0.1	1
5841	Physics and biology: Applications of synchrotron radiation in biology. , 2008, , .		0
5847	Biologische Membranen. Springer-Lehrbuch, 2009, , 349-433.	0.1	0
5848	Semi-quantitative model of the gating of KcsA ion channel. 1. Geometry and energetics of the gating. Biopolymers and Cell, 2009, 25, 390-397.	0.1	1
5849	Molecular Docking Simulation of Short-Chain Four Disulphide Bridged Scorpion Toxins with Structural Model of Human Voltage-Gated Potassium Ion Channel Kv1 The Open Structural Biology Journal, 2009, 3, 75-83.	0.1	0
5850	Semi-quantitative model of the gating of KcsA ion channel. 2. Dynamic self-organization model of the gating. Biopolymers and Cell, 2009, 25, 476-483.	0.1	1
5851	Modulation mechanism of PKC upon inwardly rectifying potassium channels. Academic Journal of Second Military Medical University, 2009, 29, 956-960.	0.0	0
5852	Structural Biology of Neural Systems. Seibutsu Butsuri, 2010, 50, 276-281.	0.0	0
5853	Kardiale Elektrophysiologie. , 2010, , 25-56.		0
5855	Ion Channels Regulated by Direct Binding of Cyclic Nucleotides. , 2010, , 225-231.		0
5856	Computational design of soluble variants of transmembrane proteins. , 2010, , .		0
5857	Continuum Electrostatics and Modeling of K+ Channels. RSC Biomolecular Sciences, 2010, , 177-202.	0.4	0
5859	Signal function of potassium channels – clinical aspects. Fiziolohichnyi Zhurnal (Kiev, Ukraine: 1994), 2010, 56, 19-24.	0.1	0
5861	Single-Channel Structure-Function Dynamics: The Gating of Potassium Channels. , 2011, , 79-105.		0
5862	Water and Membranes. , 2010, , 139-164.		0
5863	Development and Application of Rapid Fabrication of Teflon Micropores as a Platform of Stable Lipid Bilayer Formation. Hyomen Kagaku, 2011, 32, 445-450.	0.0	0
5864	Biologische Membranen und Transport. Springer-Lehrbuch, 2011, , 493-552.	0.1	0
5865	Photoswitchable Voltage-Gated Ion Channels. Neuromethods, 2011, , 185-212.	0.2	0

#	Article	IF	CITATIONS
5866	Advances in Structure–Activity Relationship Studies on Potassium Channel Modulators. , 2011, , 241-264.		0
5867	In silico Analysis on hERG Channel Blocking Effect of a Series of T-type Calcium Channel Blockers. Bulletin of the Korean Chemical Society, 2011, 32, 251-262.	1.0	1
5868	Ion-Selective Biomimetic Membranes. Biological and Medical Physics Series, 2011, , 63-86.	0.3	0
5869	How Will Research in Neuroscience Influence the Practice of Psychiatry in the Next Ten Years?. Opticon1826, 2011, 6, .	0.0	0
5872	Prologue: The Ion Channel. Springer Protocols, 2012, , 1-19.	0.1	0
5873	Mechanically Manipulating a Single Channel Gate. Seibutsu Butsuri, 2012, 52, 289-290.	0.0	0
5874	Crystal Structure of Channelrhodopsin, A Light-Gated Cation Channel. Nihon Kessho Gakkaishi, 2012, 54, 220-225.	0.0	0
5876	Membrane Protein Crystallography is Going to Be an Owa-Con!?. Seibutsu Butsuri, 2012, 52, 114-115.	0.0	0
5877	Phenotypic Correlation of Genetic Mutations with Ventricular Arrhythmias. , 0, , .		0
5879	ATP-Sensitive Potassium Channels in Health and Disease. , 2013, , 1-31.		0
5880	Electrophysiology of Islet Cells. , 2013, , 1-52.		0
5881	Membrane Transport Membrane Transport, General Concepts. , 2013, , 876-879.		0
5882	Chloride Channels and Transporters in Beta-Cell Physiology. , 2013, , 1-45.		0
5883	Solution NMR Study on Functional Mechanism of Membrane Proteins. Seibutsu Butsuri, 2013, 53, 236-241.	0.0	0
5884	Structural Understanding of Ion Channels in Atomic Detail. RSC Drug Discovery Series, 2014, , 56-82.	0.2	0
5885	Potassium Channels Implicated in the Short QT Syndrome. Springer Theses, 2014, , 33-49.	0.0	0
5886	Molecular Mechanisms of Membrane Proteins Studied by Infrared Spectroscopy. Molecular Science, 2014, 8, A0067.	0.2	0
5888	Electrophysiology of Islet Cells. , 2014, , 1-51.		1

#	Article	IF	CITATIONS
5889	ATP-Sensitive Potassium Channels in Health and Disease. , 2014, , 1-29.		0
5890	The Molecular Basis of K+ Channel Gating. , 0, , 69-81.		0
5891	VLG K Kv1-Shak. , 1999, , 374-523.		0
5892	VLG K Kv2-Shab. , 1999, , 524-558.		0
5893	VLG K eag/elk/erg. , 1999, , 275-326.		0
5894	Inward Rectifier K+ Channels. , 0, , 123-132.		0
5895	Bacterial Na Channels: Progenitors, Progeny, or Parallel Evolution?. , 0, , 191-207.		1
5896	The Ktn Domain and Its Role as a Channel and Transporter Regulator. , 0, , 21-40.		0
5897	Glutamate-Activated Channels. , 0, , 83-95.		0
5898	Voltage-Gated K+ Channels. , 0, , 97-121.		0
5899	From Prokaryotes to Eukaryotes: Molecular Modeling and Simulation Studies of Ion Channels. , 0, , 133-152.		0
5900	K+ Channels: a Survey and a Case Study of Kch of Escherichia coli. , 0, , 1-20.		2
5901	The Mechanism of Action of Microalgal Toxins Interacting with NaV and KV Channels. , 2014, , 3-34.		0
5902	The Structure of NMDA Receptor Revealed. MOJ Cell Science & Report, 2014, 1, .	0.1	0
5903	Regulation of N-Methyl-d-Aspartate Receptors by Spermine and Ifenprodil. , 2015, , 243-253.		0
5904	Chapter 11. Biomedical Applications of Pillararenes. Monographs in Supramolecular Chemistry, 2015, , 263-277.	0.2	1
5907	Chapter 2. Molecular Dynamics Simulations: Principles and Applications for the Study of Membrane Proteins. RSC Theoretical and Computational Chemistry Series, 2016, , 19-58.	0.7	0
5908	Electrokinetic Fluid Flow in Nanostructures. , 2016, , 1024-1033.		0

#	Article	IF	CITATIONS
5909	Chapter 4. Non-atomistic Simulations of Ion Channels. RSC Theoretical and Computational Chemistry Series, 2016, , 107-136.	0.7	0
5910	Regional Variation in Arterial Myogenic Responsiveness: Links to Potassium Channel Diversity/Function. , 2016, , 131-152.		0
5911	Kv1.1., 2016,, 1-10.		0
5912	Computer Simulation of Ion Channels. RSC Theoretical and Computational Chemistry Series, 2016, , 161-196.	0.7	2
5913	Introduction to the Structural Biology of Membrane Proteins. RSC Theoretical and Computational Chemistry Series, 2016, , 1-18.	0.7	0
5914	GIRK2., 2016,, 1-5.		0
5915	From Bio 101 to Pillars of Biology: A Pedagogical Experiment. The Einstein Journal of Biology and Medicine: EJBM, 2016, 27, 86.	0.2	0
5916	Neurone und IonenkanÃte., 2017,, 369-399.		0
5917	Gating Dynamics of the Potassium Channel Pore \hat{a} , 2017, .		1
5918	Generalized Shockley–Ramo theorem in electrolytes. Communications in Mathematical Sciences, 2017, 15, 555-564.	0.5	0
5921	Quantum Thermodynamics and Coherence in Ion Channels. Lecture Notes in Electrical Engineering, 2018, , 3-11.	0.3	1
5923	In silicoÂStudies of Putative Inward Rectifier Potassium Channel AKT1 from Rice (Oryza Sativa L.). MOJ Drug Design Development & Therapy, 2017, 1, .	0.1	0
5924	Building Atomic Models of the Ion Channels Based on Low Resolution Electron Microscopy Maps and Homology Modeling. Methods in Molecular Biology, 2018, 1684, 305-319.	0.4	0
5927	Kv1.1., 2018,, 2786-2794.		0
5928	GIRK2. , 2018, , 2072-2077.		0
5930	AQP4 and HIVAN. Experimental and Molecular Pathology, 2018, 105, 71-75.	0.9	0
5933	A thermodynamic description for physiological transmembrane transport. F1000Research, 0, 7, 1468.	0.8	4
5936	Membrane Protein Structure. , 2019, , 1-12.		0

ARTICLE IF CITATIONS # Water and mass transport in low-dimensional confined structures. Wuli Xuebao/Acta Physica Sinica, 5937 0.2 3 2019, 68, 018801. Macrocycle-Based Synthetic Ion Channels., 2019, , 1-36. 5938 Patch-Clamp Fluorometry and Its Applications to the Study of Ion Channels. Neuromethods, 2020, , 5944 0.2 1 155-183. Polyamine block of MthK potassium channels. Journal of General Physiology, 2020, 152, . 5946 0.9 lon-dependent structure, dynamics, and allosteric coupling in a non-selective cation channel. Nature 5950 13 5.8 Communications, 2021, 12, 6225. Structural basis for high selectivity of a rice silicon channel Lsi1. Nature Communications, 2021, 12, 5.8 6236. Electroneutrality breakdown in nanopore arrays. Physical Review E, 2021, 104, 044803. 5952 0.8 13 KCNE Regulation of KCNQ Channels. Physiology in Health and Disease, 2020, , 1011-1049. 0.2 Sequence, Structure and Domain Analysis of Potassium Channels and Transporters. SpringerBriefs in 5954 0.4 0 Plant Science, 2020, , 29-36. KCa3.1 in Epithelia. Physiology in Health and Disease, 2020, , 893-948. 0.2 Electrical Communication Systems in Bacterial Biofilms and Ion-Channels., 2020, , 127-135. 5956 0 Ionic Crosslinkingâ€Induced Nanochannels: Nanophase Separation for Ion Transport Promotion. 11.1 Advanced Materials, 2022, 34, e2108410. Photopharmacology of Ion Channels through the Light of the Computational Microscope. 5960 1.8 6 International Journal of Molecular Sciences, 2021, 22, 12072. Probing the Structural Dynamics of the Activation Gate of KcsA Using Homo-FRET Measurements. International Journal of Molecular Sciences, 2021, 22, 11954. 5961 1.8 The ligand-sensitive gate of a potassium channel lies close to the selectivity filter. EMBO Reports, 5964 2.0 4 2003, 4, 70-75. Molecular Recognition in the Membrane: Role in the Folding of Membrane Proteins., 2002, , 273-294. 5965 Peptide Toxins as Conformational Probes for K-Channels., 2005, 103-113. 5966 0 5967 The Molecular Basis of Ca2+ Antagonist Drug Action-Recent Developments., 2005, 262-280.

#	Article	IF	CITATIONS
5968	lon Channels, from Fantasy to Fact in Fifty Years1. , 2007, , 3-29.		0
5969	A Mesoscopic–Microscopic Perspective on Ion Channel Permeation Energetics: The Semi-Microscopic Approach1. , 2007, , 485-505.		Ο
5970	Brownian Dynamics: Simulation for Ion Channel Permeation1. Biological and Medical Physics Series, 2007, , 507-543.	0.3	1
5971	Molecular Dynamics Simulation Approaches to K Channels. , 2007, , 545-567.		Ο
5972	Voltage-Gated Potassium Channels. , 2007, , 119-170.		1
5973	Calcium Channels. , 2007, , 241-299.		1
5976	Electricity and Magnetism at the Cellular Level. , 2007, , 227-254.		0
5977	Structure and Mechanism of Action of AMPA and Kainate Receptors. , 2008, , 251-269.		0
5978	Diversity And Structures Of Ion Channels. , 2009, , 271-300.		0
5979	Microscopic Models Of Channel Function. , 2009, , 301-328.		0
5980	Branching Out. , 2009, , 483-508.		0
5984	Basic Physiology of Ion Channel Function. , 2008, , 11-23.		0
5985	Venom-derived modulators of epilepsy-related ion channels. Biochemical Pharmacology, 2020, 181, 114043.	2.0	11
5987	Shaker Family Kv1 Voltage-Gated Potassium Channels in Mammalian Brain Neurons. , 0, , 127-154.		0
5989	Novel method for evaluation of the oligomeric structure of membrane proteins. Biochemical Journal, 1999, 342 (Pt 1), 119-23.	1.7	67
5990	Structure-function studies of tryptophan mutants of equinatoxin II, a sea anemone pore-forming protein. Biochemical Journal, 2000, 346 Pt 1, 223-32.	1.7	18
5991	Conserved Ca2+-antagonist-binding properties and putative folding structure of a recombinant high-affinity dihydropyridine-binding domain. Biochemical Journal, 2000, 347 Pt 3, 829-36.	1.7	28
5996	Studying of Membrane Localization of Recombinant Potassium Channels in E.coli. Acta Naturae, 2009, 1, 91-5.	1.7	3

#	Article	IF	CITATIONS
5997	BK Channels in Cardiovascular Diseases and Aging. , 2013, 4, 38-49.		18
5999	Mechanisms of activation of voltage-gated potassium channels. Acta Naturae, 2014, 6, 10-26.	1.7	25
6000	Ca(2+) and ion channels in hypoxia-mediated pulmonary hypertension. International Journal of Clinical and Experimental Pathology, 2015, 8, 1081-92.	0.5	18
6001	Modeling of the Binding of Peptide Blockers to Voltage-Gated Potassium Channels: Approaches and Evidence. Acta Naturae, 2016, 8, 35-46.	1.7	5
6002	Regulation of Ion Channel and Transporter Function Through RNA Editing. Current Issues in Molecular Biology, 2015, 17, 23-36.	1.0	13
6004	Bis(Tryptophan) Amphiphiles Form Ion Conducting Pores and Enhance Antimicrobial Activity against Resistant Bacteria. Antibiotics, 2021, 10, 1391.	1.5	0
6005	THz trapped ion model and THz spectroscopy detection of potassium channels. Nano Research, 2022, 15, 3825-3833.	5.8	4
6007	Dynamical Behavior of Water; Fluctuation, Reactions and Phase Transitions. Bulletin of the Chemical Society of Japan, 2021, 94, 2575-2601.	2.0	2
6008	Oriented UiOâ€67 Metal–Organic Framework Membrane with Fast and Selective Lithiumâ€lon Transport. Angewandte Chemie - International Edition, 2022, 61, .	7.2	49
6009	The active site region plays a critical role in Na+ binding to thrombin. Journal of Biological Chemistry, 2022, 298, 101458.	1.6	4
6011	Ionic channels in nerve membranes, 50 years on. Progress in Biophysics and Molecular Biology, 2022, 169-170, 12-20.	1.4	9
6012	Flexible Plasmonic Biosensors for Healthcare Monitoring: Progress and Prospects. ACS Nano, 2021, 15, 18822-18847.	7.3	78
6013	Oriented UiOâ€67 Metal–Organic Framework Membrane with Fast and Selective Lithiumâ€lon Transport. Angewandte Chemie, 0, , .	1.6	6
6014	Artificial Biomolecular Channels: Enantioselective Transmembrane Transport of Amino Acids Mediated by Homochiral Zirconium Metal–Organic Cages. Journal of the American Chemical Society, 2021, 143, 20939-20951.	6.6	43
6015	The insights into calcium ion selectivity provided by ancestral prokaryotic ion channels. Biophysics and Physicobiology, 2021, 18, 274-283.	0.5	3
6016	Preparation of Giant Escherichia coli spheroplasts for Electrophysiological Recordings. Bio-protocol, 2021, 11, e4261.	0.2	0
6018	Fragment antigen binding domains (Fabs) as tools to study assembly-line polyketide synthases. Synthetic and Systems Biotechnology, 2022, 7, 506-512.	1.8	3
6019	Lysosomal potassium channels. Cell Calcium, 2022, 102, 102536.	1.1	9

#	Article	IF	CITATIONS
6022	Potential-induced wetting and dewetting in pH-responsive block copolymer membranes for mass transport control. Faraday Discussions, 2021, 233, 283-294.	1.6	2
6023	Rearrangement of a unique Kv1.3 selectivity filter conformation upon binding of a drug. Proceedings of the National Academy of Sciences of the United States of America, 2022, 119, .	3.3	20
6024	Polydopamine-Induced Modification on the Highly Charged Surface of Asymmetric Nanofluidics: A Strategy for Adjustable Ion Current Rectification Properties. Analytical Chemistry, 2022, 94, 2493-2501.	3.2	9
6025	<scp>Softâ€wall</scp> ion transfer channel accurately predicts sterically hindered ion channel permeability. Bulletin of the Korean Chemical Society, 2022, 43, 514-522.	1.0	0
6026	Machine learning reveals key ion selectivity mechanisms in polymeric membranes with subnanometer pores. Science Advances, 2022, 8, eabl5771.	4.7	45
6027	Current trends in membrane protein crystallography. , 2022, , 277-290.		1
6029	A revised mechanism of action of hyperaldosteronismâ€linked mutations in cytosolic domains of GIRK4 (KCNJ5). Journal of Physiology, 2022, 600, 1419-1437.	1.3	4
6030	Structural biology of cation channels important for lysosomal calcium release. Cell Calcium, 2022, 101, 102519.	1.1	5
6031	Celebrities in the heart, strangers in the pancreatic beta cell: Voltageâ€gated potassium channels K _v 7.1 and K _v 11.1 bridge long QT syndrome with hyperinsulinaemia as well as type 2 diabetes. Acta Physiologica, 2022, 234, e13781.	1.8	6
6032	Homology modeling and molecular docking simulation of martentoxin as a specific inhibitor of the BK channel. Annals of Translational Medicine, 2022, 10, 71-71.	0.7	7
6033	Designing Angstrom‣cale Asymmetric MOFâ€onâ€MOF Cavities for High Monovalent Ion Selectivity. Advanced Materials, 2022, 34, e2107878.	11.1	47
6034	Spontaneous local membrane curvature induced by transmembrane proteins. Biophysical Journal, 2022, 121, 671-683.	0.2	15
6035	Permeability enhancement of the KcsA channel under radiation of a terahertz wave. Physical Review E, 2022, 105, 024104.	0.8	9
6036	Polymer-based membranes for promoting osmotic energy conversion. Giant, 2022, 10, 100094.	2.5	21
6038	Superions in the Narrow Nanopores with Multiple Occupancy. Ukrainian Journal of Physics, 2022, 56, 585.	0.1	0
6039	A novel ion conducting route besides the central pore in an inherited mutant of Gâ€proteinâ€gated inwardly rectifying K ⁺ channel. Journal of Physiology, 2022, 600, 603-622.	1.3	8
6040	Angstrom-scale ion channels towards single-ion selectivity. Chemical Society Reviews, 2022, 51, 2224-2254.	18.7	116
6041	Pushing the limits of nanopore transport performance by polymer functionalization. Chemical Communications, 2022, 58, 5188-5204.	2.2	18

#	Article	IF	CITATIONS
6042	Electrical signalling in prokaryotes and its convergence with quorum sensing in <i>Bacillus</i> . BioEssays, 2022, 44, e2100193.	1.2	4
6043	Bioâ€Inspired 3D Artificial Neuromorphic Circuits. Advanced Functional Materials, 2022, 32, .	7.8	45
6044	Direct Detection of Bound Ammonium Ions in the Selectivity Filter of Ion Channels by Solid-State NMR. Journal of the American Chemical Society, 2022, 144, 4147-4157.	6.6	7
6045	Solid-State Nanochannel-Based Sensing Systems: Development, Challenges, and Opportunities. Langmuir, 2022, 38, 2415-2422.	1.6	6
6046	P-Loop Channels: Experimental Structures, and Physics-Based and Neural Networks-Based Models. Membranes, 2022, 12, 229.	1.4	4
6047	EAST/SeSAME Syndrome and Beyond: The Spectrum of Kir4.1- and Kir5.1-Associated Channelopathies. Frontiers in Physiology, 2022, 13, 852674.	1.3	4
6048	Cation Permeability of Voltage-Gated Hair Cell Ca2+ Channels of the Vertebrate Labyrinth. International Journal of Molecular Sciences, 2022, 23, 3786.	1.8	0
6049	Designing polymeric membranes with coordination chemistry for high-precision ion separations. Science Advances, 2022, 8, eabm9436.	4.7	50
6051	Cation–Ligand Interactions Dictate Salt Partitioning and Diffusivity in Ligand-Functionalized Polymer Membranes. Macromolecules, 2022, 55, 2260-2270.	2.2	11
6053	Mining Critical Metals from Seawater by Subnanostructured Membranes: Is It Viable?. Symmetry, 2022, 14, 681.	1.1	4
6055	A distinct mechanism of C-type inactivation in the Kv-like KcsA mutant E71V. Nature Communications, 2022, 13, 1574.	5.8	11
6056	Quantum essence of particle superfluidity. Nano Research, 2022, 15, 5230-5234.	5.8	3
6057	Biomimetic KcsA channels with ultra-selective K+ transport for monovalent ion sieving. Nature Communications, 2022, 13, 1701.	5.8	46
6059	Treatment and Recovery of High-Value Elements from Produced Water. Water (Switzerland), 2022, 14, 880.	1.2	11
6060	K+ takes the crown: Selective activation of non-selective crown ether channels. Biophysical Journal, 2022, 121, 863-864.	0.2	0
6061	Hybrid Pyridine–Pyridone Foldamer Channels as M2â€Like Artificial Proton Channels. Angewandte Chemie - International Edition, 2022, 61, .	7.2	14
6062	Ionic Liquid Stabilizes Olefin Facilitated Transport Membranes Against Reduction. Angewandte Chemie - International Edition, 2022, 61, .	7.2	13
6063	Ultrafast rectifying counter-directional transport of proton and metal ions in metal-organic framework–based nanochannels. Science Advances, 2022, 8, eabl5070.	4.7	48

#	Article	IF	CITATIONS
6064	Pseudo Polyampholytes with Sensitively Ionâ€Responsive Conformational Transition Based on Positively Charged Host–Guest Complexes. Macromolecular Rapid Communications, 2022, , 2200127.	2.0	2
6065	Ionic Liquid Stabilizes Olefin Facilitated Transport Membranes Against Reduction. Angewandte Chemie, 2022, 134, .	1.6	2
6066	Hybrid Pyridineâ€Pyridone Foldamer Channels as M2‣ike Artificial Proton Channels. Angewandte Chemie, 0, , .	1.6	2
6067	Role of Ion Distribution and Energy Barriers for Concerted Motion of Subunits in Selectivity Filter Gating of a K+ Channel. Journal of Molecular Biology, 2022, 434, 167522.	2.0	1
6068	Thin and defect-free ZIF-8 layer assisted enhancement of the monovalent perm-selectivity for cation exchange membrane. Desalination, 2022, 529, 115637.	4.0	13
6069	A Life of Biophysics. Annual Review of Biophysics, 2022, 51, .	4.5	1
6070	Doubleâ€Network Ion Channels for Highâ€Performance Osmotic Power Generation. Advanced Materials Interfaces, 2022, 9, .	1.9	6
6071	The Molecular Biodiversity of Protein Targeting and Protein Transport Related to the Endoplasmic Reticulum. International Journal of Molecular Sciences, 2022, 23, 143.	1.8	12
6072	Exploring Kv1.2 Channel Inactivation Through MD Simulations and Network Analysis. Frontiers in Molecular Biosciences, 2021, 8, 784276.	1.6	5
6073	Small molecule modulation of the Drosophila Slo channel elucidated by cryo-EM. Nature Communications, 2021, 12, 7164.	5.8	9
6074	Genome-Wide Identification and Expression Profiling of Potassium Transport-Related Genes in Vigna radiata under Abiotic Stresses. Plants, 2022, 11, 2.	1.6	11
6075	Structural Plasticity of the Selectivity Filter in Cation Channels. Frontiers in Physiology, 2021, 12, 792958.	1.3	1
6076	Graphene-Based Assemblies for Moist-Electric Generation. Frontiers in Energy Research, 2021, 9, .	1.2	6
6079	Liquid–liquid phase separation as an organizing principle of intracellular space: overview of the evolution of the cell compartmentalization concept. Cellular and Molecular Life Sciences, 2022, 79, 251.	2.4	42
6080	From Dynamic Superwettability to Ionic/Molecular Superfluidity. Accounts of Chemical Research, 2022, 55, 1195-1204.	7.6	24
6081	Novel US-CpHMD Protocol to Study the Protonation-Dependent Mechanism of the ATP/ADP Carrier. Journal of Chemical Information and Modeling, 2022, , .	2.5	10
6083	Novel Insights into Membrane Transport from Computational Methodologies. Chemical Biology, 2017, , 247-280.	0.1	1
6084	What are the roles of the many different types of potassium channel expressed in cerebellar granule cells?. Cerebellum, 2003, 2, 11-25.	1.4	3

#	Article	IF	CITATIONS
6087	Ion Channels from Development to Disease. , 2009, , 2046-2051.		0
6099	Understanding specific ion effects and the Hofmeister series. Physical Chemistry Chemical Physics, 2022, 24, 12682-12718.	1.3	101
6100	Weak Cation Selectivity in HCN Channels Results From K+-Mediated Release of Na+ From Selectivity Filter Binding Sites. Function, 2022, 3, .	1.1	3
6102	Yeast Trk1 Potassium Transporter Gradually Changes Its Affinity in Response to Both External and Internal Signals. Journal of Fungi (Basel, Switzerland), 2022, 8, 432.	1.5	5
6103	Ion behavior in the selectivity filter of HCN1 channels. Biophysical Journal, 2022, , .	0.2	3
6104	Coupling of mechanical deformation and electromagnetic fields in biological cells. Reviews of Modern Physics, 2022, 94, .	16.4	36
6105	Potassium Binding Interactions with Aliphatic Amino Acids: Thermodynamic and Entropic Effects Analyzed via a Guided Ion Beam and Computational Study. Journal of the American Society for Mass Spectrometry, 2022, 33, 1427-1442.	1.2	3
6106	Host-guest interaction induced ion channels for accelerated OHâ^ transport in anion exchange membranes. Journal of Membrane Science, 2022, 655, 120580.	4.1	15
6107	Classical density functional analysis of ion selectivity in nanopores: The coupling between hard-sphere and electrostatic interactions. Chemical Engineering Journal, 2022, 444, 136673.	6.6	2
6108	Amyloid-β Oligomers: Multiple Moving Targets. Biophysica, 2022, 2, 91-110.	0.6	17
6109	Ca2+ Release from Sarcoplasmic Reticulum in Muscle. , 2001, , 927-940.		0
6110	Ion Channels as Targets for Toxins. , 2001, , 625-642.		0
6111	Ligand-Binding Sites in Vanilloid-Subtype TRP Channels. Frontiers in Pharmacology, 2022, 13, .	1.6	20
6112	Differential ion dehydration energetics explains selectivity in the non-canonical lysosomal K+ channel TMEM175. ELife, 0, 11, .	2.8	9
6113	Interindividual Variability of Anticonvulsant-Induced QT Prolongation Risk. Personalized Psychiatry and Neurology, 2022, 2, 22-45.	0.2	5
6114	The thermodynamic soliton theory of the nervous impulse and possible medical implications. Progress in Biophysics and Molecular Biology, 2022, 173, 24-35.	1.4	9
6115	Determinants of trafficking, conduction, and disease within a K+ channel revealed through multiparametric deep mutational scanning. ELife, 0, 11, .	2.8	23
6116	Structural Advances in Voltage-Gated Sodium Channels. Frontiers in Pharmacology, 0, 13, .	1.6	14

#	Article	IF	CITATIONS
6117	Quantum coherence on selectivity and transport of ion channels. Scientific Reports, 2022, 12, .	1.6	4
6118	Structure and Mechanism of Voltage-Gated Ion Channels. , 2001, , 455-477.		0
6122	Separation mechanism, selectivity enhancement strategies and advanced materials for mono-/multivalent ion-selective nanofiltration membrane. , 2022, 2, 100032.		26
6123	Gain and loss of TASK3 channel function and its regulation by novel variation cause KCNK9 imprinting syndrome. Genome Medicine, 2022, 14, .	3.6	6
6124	Development of an Efficient System for Blue Energy Production Based on Reverse Electrodialysis (RED) by Optimizing Electrolyte Composition: Experimental and Theoretical Simulations. Energy & Fuels, 2022, 36, 6353-6361.	2.5	4
6125	Mechanical waves in myelinated axons. Biomechanics and Modeling in Mechanobiology, 0, , .	1.4	2
6126	Nanoionics from Biological to Artificial Systems: An Alternative Beyond Nanoelectronics. Advanced Science, 2022, 9, .	5.6	13
6127	Computational methods and theory for ion channel research. Advances in Physics: X, 2022, 7, .	1.5	8
6129	Nanoparticle-blockage-enabled rapid and reversible nanopore gating with tunable memory. Proceedings of the National Academy of Sciences of the United States of America, 2022, 119, .	3.3	2
6130	Metal–Organic Frameworks as a Subnanometer Platform for Ion–Ion Selectivity. Accounts of Materials Research, 2022, 3, 735-747.	5.9	9
6131	Charged Nanochannels in Covalent Organic Framework Membranes Enabling Efficient Ion Exclusion. ACS Nano, 2022, 16, 11781-11791.	7.3	32
6132	Simulation and Machine Learning Methods for Ion-Channel Structure Determination, Mechanistic Studies and Drug Design. Frontiers in Pharmacology, 0, 13, .	1.6	5
6135	The Hidden Intricacies of Aquaporins: Remarkable Details in a Common Structural Scaffold. Small, 2022, 18, .	5.2	8
6136	Structures of the T cell potassium channel Kv1.3 with immunoglobulin modulators. Nature Communications, 2022, 13, .	5.8	28
6138	Intermolecular functional coupling between phosphoinositides and the potassium channel KcsA. Journal of Biological Chemistry, 2022, 298, 102257.	1.6	3
6139	Atto488-Agitoxin 2—A Fluorescent Ligand with Increased Selectivity for Kv1.3 Channel Binding Site. Bioengineering, 2022, 9, 295.	1.6	1
6140	Covalent Organic Frameworks: Chemistry of Pore Interface and Wall Surface Perturbation and Impact on Functions. Accounts of Materials Research, 2022, 3, 879-893.	5.9	29
6142	A Multi-Scale Approach to Model K+ Permeation Through the KcsA Channel. Frontiers in Molecular Biosciences, 0, 9, .	1.6	2

	CHAIL	JN REPORT	
#	Article	IF	Citations
6143	Angstrofluidics: Walking to the Limit. Annual Review of Materials Research, 2022, 52, 189-218.	4.3	16
6144	Kv Channel Ancillary Subunits: Where Do We Go from Here?. Physiology, 2022, 37, 225-241.	1.6	7
6145	Protons in Gating the Kv1.2 Channel: A Calculated Set of Protonation States in Response to Polarization/Depolarization of the Channel, with the Complete Proposed Proton Path from Voltage Sensing Domain to Gate. Membranes, 2022, 12, 718.	1.4	1
6146	The permeation of potassium ions through the lipid scrambling path of the membrane protein nhTMEM16. Frontiers in Molecular Biosciences, 0, 9, .	1.6	2
6147	Diversification of Potassium Currents in Excitable Cells via $Kv\hat{l}^2$ Proteins. Cells, 2022, 11, 2230.	1.8	5
6148	Engineering Bioâ€inspired Selfâ€assembled Nanochannels for Smart Ion Transport. Angewandte Chemie - International Edition, 2022, 61, .	7.2	17
6149	Molecular stratification of arrhythmogenic mechanisms in the Andersen Tawil syndrome. Cardiovascular Research, 2023, 119, 919-932.	1.8	4
6150	Metal-organic ion transport systems. Coordination Chemistry Reviews, 2022, 470, 214705.	9.5	7
6151	Lysosomal Potassium Channels. Handbook of Experimental Pharmacology, 2022, , .	0.9	1
6152	The Evolution of Scanning Ion Conductance Microscopy. Bioanalytical Reviews, 2022, , 1-21.	0.1	1
6153	A New Strategy for Highly Efficient Separation between Monovalent Cations by Applying Oppositeâ€Oriented Pressure and Electric Fields. Small, 2022, 18, .	5.2	4
6154	The force-from-lipid principle and its origin, a â€~ <i>what is true for E. coli is true for the elephant'</i> refrain. Journal of Neurogenetics, 2022, 36, 44-54.	0.6	11
6155	Engineering Bioâ€inspired Selfâ€assembled Nanochannels for Smart Ion Transport. Angewandte Chemie, 2022, 134, .	1.6	6
6156	Molecular Events behind the Selectivity and Inactivation Properties of Model NaK-Derived Ion Channels. International Journal of Molecular Sciences, 2022, 23, 9246.	1.8	1
6157	35 years of channelling potassium ions. Nature, 2022, 608, 670-672.	13.7	2
6158	High-Resolution Magic Angle Spinning NMR of KcsA in Liposomes: The Highly Mobile C-Terminus. Biomolecules, 2022, 12, 1122.	1.8	2
6159	Insight on the regulation mechanism of the nanochannels in hard and brittle materials induced by sparially shaped femtosecond laser. Frontiers in Chemistry, 0, 10, .	1.8	0
6160	A scenario for the origin of life: Volume regulation by bacteriorhodopsin required extremely voltage sensitive Naâ€channels and very selective Kâ€channels. BioEssays, 2022, 44, .	1.2	3

		CITATION REPORT		
#	Article		IF	CITATIONS
6161	A Review of Computational Methods in Predicting hERG Channel Blockers. ChemistrySel	ect, 2022, 7, .	0.7	1
6162	Protein Design: From the Aspect of Water Solubility and Stability. Chemical Reviews, 207 14085-14179.	22, 122,	23.0	54
6163	Comprehensive Collection and Prediction of ABC Transmembrane Protein Structures in t Structural Biology. International Journal of Molecular Sciences, 2022, 23, 8877.	he Al Era of:	1.8	10
6164	Modular nucleic acid scaffolds for synthesizing monodisperse and sequence-encoded an oligomers. CheM, 2022, 8, 3018-3030.	tibody	5.8	4
6165	Mechanistic Insights into Structural Stability of the Selectivity Filters in Typical Cation Cl Journal of Materials Science and Chemical Engineering, 2022, 10, 17-32.	hannels.	0.2	0
6166	A bottom-up approach to the ion recognition mechanism of K ⁺ channels from spectroscopy of hydrated partial peptide–alkali metal ion complexes. Physical Chemist Physics, 2022, 24, 20803-20812.		1.3	2
6167	Molecular Principles, Components, Technology, and Concepts: Membranes – Membra Concepts. , 2022, , .	ne Potential:		0
6168	Structure and Function of Plant and Mammalian TPC Channels. Handbook of Experiment Pharmacology, 2022, , 155-180.	tal	0.9	1
6169	Insights into the Conformational Dynamics of Potassium Channels Using Homo-FRET Ap Springer Series on Fluorescence, 2022, , .	proaches.	0.8	0
6170	Bioinspired Artificial Ion Pumps. ACS Nano, 2022, 16, 13323-13338.		7.3	19
6172	Extreme Ionâ€Transport Inorganic 2D Membranes for Nanofluidic Applications. Advance 2023, 35, .	d Materials,	11.1	14
6173	Thermodynamics of Charge Regulation during Ion Transport through Silica Nanochannel 2022, 16, 15249-15260.	s. ACS Nano,	7.3	9
6174	A sensitive and specific genetically-encoded potassium ion biosensor for in vivo applicati the tree of life. PLoS Biology, 2022, 20, e3001772.	ions across	2.6	10
6175	The nonconducting W434F mutant adopts upon membrane depolarization an inactivate differs from wild-type Shaker-IR potassium channels. Science Advances, 2022, 8, .	ed-like state that	4.7	4
6176	Rapid transport of water and monovalent ions through ultrathin polyamide nanofilms fo efficient mono/bivalent ions separation. Applied Surface Science, 2023, 608, 155025.	r highly	3.1	8
6177	New Insights into Ion Channels: Predicting hERG-Drug Interactions. International Journal Molecular Sciences, 2022, 23, 10732.	of	1.8	2
6178	Potassium Ion Channels in Malignant Central Nervous System Cancers. Cancers, 2022, 1	4, 4767.	1.7	5
6179	When Is a Potassium Channel Not a Potassium Channel?. Function, 2022, 3, .		1.1	1

ARTICLE IF CITATIONS # Mutations within the selectivity filter reveal that Kv1 channels have distinct propensities to slow 6180 0.9 4 inactivate. Journal of General Physiology, 2022, 154, . Determination of oligomeric states of proteins via dual-color colocalization with single molecule 2.8 localization microscopy. ELife, 0, 11, . Advances in two-dimensional materials for energy-efficient and molecular precise membranes for 6182 4.8 3 biohydrogen production. Bioresource Technology, 2022, 364, 128065. Recent updates on the physiology and evolution of plant TPK/KCO channels. Functional Plant Biology, 1.1 2023, 50, 17-28. On the Role of 40K in the Origin of Terrestrial Life. Life, 2022, 12, 1620. 6186 1.1 1 Silica/Proteoliposomal Nanocomposite as a Potential Platform for Ion Channel Studies. Molecules, 1.7 2022, 27, 6658. Africanized Bee Venom (Apis mellifera Linnaeus): Neuroprotective Effects in a Parkinson's Disease 6188 1.6 3 Mouse Model Induced by 6-hydroxydopamine. Toxics, 2022, 10, 583. Engineering Polymeric Nanofluidic Membranes for Efficient Ionic Transport: Biomimetic Design, 6189 7.3 Material Construction, and Advanced Functionalities. ACS Nano, 2022, 16, 17613-17640. 6190 Interrogating the gating motions of the NaK channel. Journal of General Physiology, 2022, 154, . 0.9 0 Full opening of helix bundle crossing does not lead to NaK channel activation. Journal of General Physiology, 2022, 154, . Polydopamine functionalized graphene oxide membrane with the sandwich structure for osmotic 6192 21 5.0energy conversion. Journal of Colloid and Interface Science, 2023, 630, 795-803. Advances in X-ray crystallography methods to study structural dynamics of macromolecules. , 2023, , 309-355. Biomimetic Knock-on of Ion Transport through Crown Ether-embedded Filter Membranes., 2022,,. 6194 0 Mixed Matrix Membrane with Penetrating Subnanochannels: A Versatile Nanofluidic Platform for 1.6 Selective Metal Ion Conduction. Angewandte Chemie, 0, , . Macroscopic control of cell electrophysiology through ion channel expression. ELife, 0, 11, . 6197 2.8 2 Intrinsic limitations of nanofiltration membranes to achieve precise selectivity in water-based 6198 separations., 0, 1, . Mixed Matrix Membrane with Penetrating Subnanochannels: A Versatile Nanofluidic Platform for 6199 7.2 10 Selective Metal Ion Conduction. Angewandte Chemie - International Edition, 2023, 62, . Selfâ€powered <scp>2D</scp> nanofluidic graphene pressure sensor with <scp>Serosaâ€Mimetic</scp> 6.8 structure. EcoMat, 2023, 5, .

# 6203	ARTICLE Tunable ion transport through ultimately small channels. , 2022, 2, 100043.	IF	CITATIONS 2
6204	Volumen berechnen – und zwar benutzerfreundlich. Nachrichten Aus Der Chemie, 2022, 70, 41-43.	0.0	0
6205	The Optimized Conformation Dynamics of the KcsA Filter as a Probe for Lateral Membrane Effects: A First Principle Based Femto-Sec Resolution MD Study. Membranes, 2022, 12, 1183.	1.4	0
6206	Machine learning-aided atomic structure identification of interfacial ionic hydrates from AFM images. National Science Review, 2023, 10, .	4.6	4
6207	Highly Selective Transmembrane Transport of Exogenous Lithium Ions through Rationally Designed Supramolecular Channels. Angewandte Chemie - International Edition, 2023, 62, .	7.2	6
6208	Natureâ€inspired K ⁺ â€sensitive imaging probes for biomedical applications. , 2023, 1, .		4
6209	Highly Selective Transmembrane Transport of Exogenous Lithium Ions through Rationally Designed Supramolecular Channels. Angewandte Chemie, 2023, 135, .	1.6	1
6210	Switchable Na+ and K+ selectivity in an amino acid functionalized 2D covalent organic framework membrane. Nature Communications, 2022, 13, .	5.8	19
6211	Mechanisms of ion selectivity and throughput in the mitochondrial calcium uniporter. Science Advances, 2022, 8, .	4.7	6
6212	Secrets of the fungus-specific potassium channel TOK family. Trends in Microbiology, 2023, 31, 511-520.	3.5	1
6213	Seeing spermine blocking of K+ ion movement through inward rectifier Kir2.2 channels. Journal of General Physiology, 2023, 155, .	0.9	2
6214	Molecular Complementarity of Proteomimetic Materials for Targetâ€Specific Recognition and Recognitionâ€Mediated Complex Functions. Advanced Materials, 2023, 35, .	11.1	1
6216	Backbone amides are determinants of Clâ^' selectivity in CLC ion channels. Nature Communications, 2022, 13, .	5.8	1
6217	WiChR, a highly potassium-selective channelrhodopsin for low-light one- and two-photon inhibition of excitable cells. Science Advances, 2022, 8, .	4.7	32
6218	Cascadeâ€Gates Guarded Asymmetrical Nanochannel Membrane: An Interferenceâ€Free Device for Straightforward Detection of Trace Biomarker in Undiluted Serum. Small, 2023, 19, .	5.2	9
6220	The cellular pathways that maintain the quality control and transport of diverse potassium channels. Biochimica Et Biophysica Acta - Gene Regulatory Mechanisms, 2023, 1866, 194908.	0.9	2
6222	Recent advances in nanotechnologies combining surface-enhanced Raman scattering and nanopore. TrAC - Trends in Analytical Chemistry, 2023, 159, 116939.	5.8	4
6223	Conformational plasticity of NaK2K and TREK2 potassium channel selectivity filters. Nature Communications, 2023, 14, .	5.8	1

#	Article	IF	CITATIONS
6224	Virtual screening of DrugBank database for hERG blockers using topological Laplacian-assisted AI models. Computers in Biology and Medicine, 2023, 153, 106491.	3.9	13
6225	Molecular mechanism of substrate recognition by folate transporter SLC19A1. Cell Discovery, 2022, 8,	3.1	7
6226	Regulation of Ion Permeation of the KcsA Channel by Applied Midinfrared Field. International Journal of Molecular Sciences, 2023, 24, 556.	1.8	2
6227	Down the membrane hole: Ion channels in protozoan parasites. PLoS Pathogens, 2022, 18, e1011004.	2.1	4
6228	Dimerisation of the Yeast K+ Translocation Protein Trk1 Depends on the K+ Concentration. International Journal of Molecular Sciences, 2023, 24, 398.	1.8	0
6229	Prospects of metal recovery from wastewater and brine. , 2023, 1, 37-46.		37
6230	Synthetic K ⁺ Channels Constructed by Rebuilding the Core Modules of Natural K ⁺ Channels in an Artificial System. Angewandte Chemie - International Edition, 2023, 62, .	7.2	9
6231	Synthetic K ⁺ Channels Constructed by Rebuilding the Core Modules of Natural K ⁺ Channels in an Artificial System. Angewandte Chemie, 2023, 135, .	1.6	0
6232	Equity analysis of an augmented realityâ€mediated group activity in a college biochemistry classroom. Journal of Research in Science Teaching, 2023, 60, 1942-1966.	2.0	1
6233	A single-molecule method for measuring fluorophore labeling yields for the study of membrane protein oligomerization in membranes. PLoS ONE, 2023, 18, e0280693.	1.1	2
6234	Reply to the Correspondence on "Crystalline Porous Organic Salt for Ultrarapid Adsorption/Desorptionâ€Based Atmospheric Water Harvesting by Dual Hydrogen Bond System― Angewandte Chemie, 2023, 135, .	1.6	1
6236	The unique structural characteristics of the Kir 7.1 inward rectifier potassium channel: a novel player in energy homeostasis control. American Journal of Physiology - Cell Physiology, 2023, 324, C694-C706.	2.1	5
6237	Reply to the Correspondence on "Crystalline Porous Organic Salt for Ultrarapid Adsorption/Desorptionâ€Based Atmospheric Water Harvesting by Dual Hydrogen Bond System― Angewandte Chemie - International Edition, 2023, 62, .	7.2	2
6238	An artificial sodium-selective subnanochannel. Science Advances, 2023, 9, .	4.7	16
6239	A K ⁺ -selective channel with a record-high K ⁺ /Na ⁺ selectivity of 20.1. Chemical Communications, 2023, 59, 3610-3613.	2.2	4
6240	Oxidation Driven Reversal of PIP2-dependent Gating in GIRK2 Channels. Function, 2023, 4, .	1.1	1
6241	Ionic Flexible Mechanical Sensors: Mechanisms, Structural Engineering, Applications, and Challenges. , 2023, 2, .		0
6243	Sweetening K-channels: what sugar taught us about permeation and gating. Frontiers in Molecular Biosciences, 0, 10, .	1.6	1

#	Article	IF	CITATIONS
6244	A Poisson-Nernst-Planck single ion channel model and its effective finite element solver. Journal of Computational Physics, 2023, 481, 112043.	1.9	0
6246	Toxinology of Marine Venomous Snails. Iranian South Medical Journal, 2021, 24, 505-581.	0.2	0
6247	Ion and Molecule Sieving through Highly Stable Graphene-Based Laminar Membranes. Journal of Physical Chemistry Letters, 2023, 14, 1702-1707.	2.1	2
6248	Accounting for Ion Pairing Effects on Sulfate Salt Sorption in Cation Exchange Membranes. Journal of Physical Chemistry B, 2023, 127, 1842-1855.	1.2	9
6249	Thermodynamics and Kinetics of a Partial Peptide of K+ Channels: DFT Transition State Calculations Coupled with Temperature-Controlled Gas Phase Laser Spectroscopy. Bulletin of the Chemical Society of Japan, 2023, 96, 310-317.	2.0	0
6251	Non-missense variants of <i>KCNH2</i> show better outcomes in type 2 long QT syndrome. Europace, 2023, 25, 1491-1499.	0.7	9
6252	K ⁺ -Selectivity Due to Coordination with a <i>D</i> _{4<i>d</i>} -Symmetric Homochiral Proline Octamer Verified by Mass Spectrometry and Infrared Photodissociation Spectroscopy. Journal of Physical Chemistry Letters, 2023, 14, 2660-2664.	2.1	2
6253	The Adverse Effect of Concentration Polarization on Ion–Ion Selectivity in Nanofiltration. Environmental Science and Technology Letters, 2023, 10, 363-371.	3.9	3
6254	Fluids and Electrolytes under Confinement in Single-Digit Nanopores. Chemical Reviews, 2023, 123, 2737-2831.	23.0	32
6255	Non-trivial dynamics in a model of glial membrane voltage driven by open potassium pores. Biophysical Journal, 2023, 122, 1470-1490.	0.2	0
6256	Potassium Channels in Parkinson's Disease: Potential Roles in Its Pathogenesis and Innovative Molecular Targets for Treatment. Pharmacological Reviews, 2023, 75, 758-788.	7.1	12
6257	Can Ag ⁺ Permeate through a Potassium Ion Channel? A Bottom-Up Approach by Infrared Spectroscopy of the Ag ⁺ Complex with the Partial Peptide of a Selectivity Filter. Journal of Physical Chemistry Letters, 2023, 14, 2886-2890.	2.1	1
6258	Hygiene standards of chemical elements of drinking water. Gigiena I Sanitariia, 2023, 102, 126-134.	0.1	0
6259	Hierarchically engineered nanochannel systems with pore-in/on-pore structures. NPG Asia Materials, 2023, 15, .	3.8	5
6260	Beyond steric selectivity of ions using ångström-scale capillaries. Nature Nanotechnology, 2023, 18, 596-601.	15.6	10
6262	Artificial Action Potential and Ionic Power Device Inspired by Ion Channels and Excitable Cell. Advanced Science, 2023, 10, .	5.6	2
6263	Efficient Solarâ€osmotic Power Generation from Bioinspired Antiâ€fouling 2D WS ₂ Composite Membranes. Angewandte Chemie - International Edition, 2023, 62, .	7.2	7
6264	Efficient Solarâ€osmotic Power Generation from Bioinspired Antiâ€fouling 2D WS2 Composite Membranes. Angewandte Chemie, 0, , .	1.6	1

\mathbf{C}	IT A T	LON	Dr	DODT
C	ПАI		IXE.	PORT

#	Article	IF	CITATIONS
6265	Ion Conduction Mechanisms in Potassium Channels Revealed by Permeation Cycles. Journal of Chemical Theory and Computation, 2023, 19, 2574-2589.	2.3	4
6266	Osmotic stress responses and the biology of the second messenger c-di-AMP in <i>Streptomyces</i> . MicroLife, 2023, 4, .	1.0	1
6267	Potassium Ion Channels in Glioma: From Basic Knowledge into Therapeutic Applications. Membranes, 2023, 13, 434.	1.4	1
6268	A governance of ion selectivity based on the occupancy of the "beacon―in one- and four-domain calcium and sodium channels. Channels, 2023, 17, .	1.5	0
6280	Increasing Pump–Probe Signal toward Asymptotic Limits. Journal of Physical Chemistry B, 2023, 127, 4694-4707.	1.2	1
6282	Getting zinc into and out of cells. Methods in Enzymology, 2023, , .	0.4	0
6286	Creation of kinetically-controlled supramolecular systems based on coordination chemistry. Journal of Inclusion Phenomena and Macrocyclic Chemistry, 2023, 103, 161-188.	0.9	1
6289	Hydrated Ions on Surfaces. , 2023, , 243-251.		0
6306	Assigning Functions to Individual Macromolecules: A Complex History That Reflects the Transformations of Biology. History, Philosophy and Theory of the Life Sciences, 2023, , 197-203.	0.4	0
6328	Non-conducting functions of potassium channels in cancer and neurological disease. Current Topics in Membranes, 2023, , .	0.5	0
6330	Ion Transport in Biological Membranes. , 2005, , 690-698.		0
6346	Mechanistic Studies of Membrane Proteins Using Integrated Solid-state NMR and Computational Approaches. , 2023, , 268-300.		0
6357	Crystalline porous organic salts. Chemical Society Reviews, 2024, 53, 1495-1513.	18.7	0
6372	Ionic nanoarchitectonics for nanochannel-based biosensing devices. , 2024, , 429-452.		0
6381	Liganden für KanÃæ, Poren und Transporter. , 2023, , 629-667.		0
6387	Ion transport in nanofluidics under external fields. Chemical Society Reviews, 2024, 53, 2972-3001.	18.7	Ο