

Thomas Knopf

List of Publications by Year in Descending Order

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

219 papers	12,002 citations	62 h-index	100 g-index
259 ext. papers	13,458 ext. citations	5.7 avg, IF	6.29 L-index

#	Paper	IF	Citations
219	Neurons of the Deep Cerebellar Nuclei 2022 , 1239-1249		
218	Cortex-Wide Dynamics of Intrinsic Electrical Activities: Propagating Waves and Their Interactions. <i>Journal of Neuroscience</i> , 2021 , 41, 3665-3678	6.6	7
217	Reverse optogenetics of G protein signaling by zebrafish non-visual opsin Opn7b for synchronization of neuronal networks. <i>Nature Communications</i> , 2021 , 12, 4488	17.4	4
216	Genetically Encoded Voltage Indicators. <i>Advances in Experimental Medicine and Biology</i> , 2021 , 1293, 209-224	3.4	3
215	Dynamic Recording of Membrane Potential from Hippocampal Neurons by Using a Fluorescence Resonance Energy Transfer-Based Voltage Biosensor. <i>Neuromethods</i> , 2021 , 523-530	0.4	
214	Cholinergic modulation of sensory processing in awake mouse cortex. <i>Scientific Reports</i> , 2021 , 11, 17525	4.9	0
213	A Novel Assembly at Physiological Concentration. <i>Scientific Reports</i> , 2020 , 10, 9477	4.9	3
212	The serotonin 2A receptor agonist 25CN-NBOH increases murine heart rate and neck-arterial blood flow in a temperature-dependent manner. <i>Journal of Psychopharmacology</i> , 2020 , 34, 786-794	4.6	4
211	Subcellular resolution three-dimensional light-field imaging with genetically encoded voltage indicators. <i>Neurophotonics</i> , 2020 , 7, 035006	3.9	9
210	Voltage-Sensitive Fluorescent Proteins for Optical Electrophysiology 2020 , 383-407		
209	Genetically Encoded Activity Indicators 2020 , 113-128		
208	Screening and Cellular Characterization of Genetically Encoded Voltage Indicators Based on Near-Infrared Fluorescent Proteins. <i>ACS Chemical Neuroscience</i> , 2020 , 11, 3523-3531	5.7	9
207	Scale-Change Symmetry in the Rules Governing Neural Systems. <i>iScience</i> , 2019 , 12, 121-131	6.1	7
206	Single-Neuron Level One-Photon Voltage Imaging With Sparsely Targeted Genetically Encoded Voltage Indicators. <i>Frontiers in Cellular Neuroscience</i> , 2019 , 13, 39	6.1	15
205	Assessing spatiotemporal variability of brain spontaneous activity by multiscale entropy and functional connectivity. <i>NeuroImage</i> , 2019 , 198, 198-220	7.9	21
204	Genetically Encoded Fluorescent Calcium and Voltage Indicators. <i>Handbook of Experimental Pharmacology</i> , 2019 , 260, 209-229	3.2	9
203	Optical voltage imaging in neurons: moving from technology development to practical tool. <i>Nature Reviews Neuroscience</i> , 2019 , 20, 719-727	13.5	62

202	Audio-visual experience strengthens multisensory assemblies in adult mouse visual cortex. <i>Nature Communications</i> , 2019 , 10, 5684	17.4	10
201	High speed functional imaging with source localized multifocal two-photon microscopy. <i>Biomedical Optics Express</i> , 2018 , 9, 3678-3693	3.5	6
200	Tolerance and Tachyphylaxis to Head Twitches Induced by the 5-HT _{2A} Agonist 25CN-NBOH in Mice. <i>Frontiers in Pharmacology</i> , 2018 , 9, 17	5.6	20
199	Neurotechnology to address big questions. <i>Science</i> , 2018 , 361, 328-329	33.3	2
198	Cortical signatures of wakeful somatosensory processing. <i>Scientific Reports</i> , 2018 , 8, 11977	4.9	20
197	The characteristic patterns of neuronal avalanches in mice under anesthesia and at rest: An investigation using constrained artificial neural networks. <i>PLoS ONE</i> , 2018 , 13, e0197893	3.7	6
196	Optogenetic sensors in the zebrafish heart: a novel in vivo electrophysiological tool to study cardiac arrhythmogenesis. <i>Theranostics</i> , 2018 , 8, 4750-4764	12.1	28
195	Imaging of Brain Slices with a Genetically Encoded Voltage Indicator. <i>Methods in Molecular Biology</i> , 2017 , 1563, 73-84	1.4	1
194	Optogenetic targeting of cardiac myocytes and non-myocytes: Tools, challenges and utility. <i>Progress in Biophysics and Molecular Biology</i> , 2017 , 130, 140-149	4.7	14
193	Cardiac optogenetics: using light to monitor cardiac physiology. <i>Basic Research in Cardiology</i> , 2017 , 112, 56	11.8	27
192	Mammalian cortical voltage imaging using genetically encoded voltage indicators: a review honoring professor Amiram Grinvald. <i>Neurophotronics</i> , 2017 , 4, 031214	3.9	9
191	Transgenic Strategies for Sparse but Strong Expression of Genetically Encoded Voltage and Calcium Indicators. <i>International Journal of Molecular Sciences</i> , 2017 , 18,	6.3	15
190	State-Dependent Modulation of Slow Wave Motifs towards Awakening. <i>Frontiers in Cellular Neuroscience</i> , 2017 , 11, 108	6.1	15
189	Voltage imaging to understand connections and functions of neuronal circuits. <i>Journal of Neurophysiology</i> , 2016 , 116, 135-52	3.2	62
188	Optogenetics enlightens neuroscience drug discovery. <i>Nature Reviews Drug Discovery</i> , 2016 , 15, 97-109	64.1	35
187	Cortical Entropy, Mutual Information and Scale-Free Dynamics in Waking Mice. <i>Cerebral Cortex</i> , 2016 , 26, 3945-52	5.1	36
186	Electrotonic coupling of excitable and nonexcitable cells in the heart revealed by optogenetics. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016 , 113, 14852-14857	11.5	125
185	Roadmap on neurophotronics. <i>Journal of Optics (United Kingdom)</i> , 2016 , 18,	1.7	16

184	Sensing Cardiac Electrical Activity With a Cardiac Myocyte--Targeted Optogenetic Voltage Indicator. <i>Circulation Research</i> , 2015 , 117, 401-12	15.7	49
183	Route to genetically targeted optical electrophysiology: development and applications of voltage-sensitive fluorescent proteins. <i>Neurophotonic</i> , 2015 , 2,	3.9	13
182	Transgenic mice for intersectional targeting of neural sensors and effectors with high specificity and performance. <i>Neuron</i> , 2015 , 85, 942-58	13.9	631
181	Genetically encoded voltage indicators for large scale cortical imaging come of age. <i>Current Opinion in Chemical Biology</i> , 2015 , 27, 75-83	9.7	47
180	Validation of optical voltage reporting by the genetically encoded voltage indicator VSFP-Butterfly from cortical layer 2/3 pyramidal neurons in mouse brain slices. <i>Physiological Reports</i> , 2015 , 3, e12468	2.6	12
179	Facilitated Anion Transport Induces Hyperpolarization of the Cell Membrane That Triggers Differentiation and Cell Death in Cancer Stem Cells. <i>Journal of the American Chemical Society</i> , 2015 , 137, 15892-8	16.4	93
178	Comparative performance of a genetically-encoded voltage indicator and a blue voltage sensitive dye for large scale cortical voltage imaging. <i>Frontiers in Cellular Neuroscience</i> , 2015 , 9, 147	6.1	15
177	Imaging the awake visual cortex with a genetically encoded voltage indicator. <i>Journal of Neuroscience</i> , 2015 , 35, 53-63	6.6	92
176	Combined Immunocytochemistry and Live Imaging of Fluorescent Protein Expressing Neurons in Mouse Brain. <i>Neuromethods</i> , 2015 , 357-373	0.4	
175	Exploration of genetically encoded voltage indicators based on a chimeric voltage sensing domain. <i>Frontiers in Molecular Neuroscience</i> , 2014 , 7, 78	6.1	44
174	Voltage imaging of waking mouse cortex reveals emergence of critical neuronal dynamics. <i>Journal of Neuroscience</i> , 2014 , 34, 16611-20	6.6	94
173	Quantification of the density of cooperative neighboring synapses required to evoke endocannabinoid signaling. <i>Neuroscience</i> , 2014 , 256, 412-25	3.9	4
172	Fluorescent Indicators for Functional Optical Imaging. <i>Neuromethods</i> , 2014 , 53-72	0.4	2
171	Functional contributions of the plasma membrane calcium ATPase and the sodium-calcium exchanger at mouse parallel fibre to Purkinje neuron synapses. <i>Pflügers Archiv European Journal of Physiology</i> , 2013 , 465, 319-31	4.6	12
170	Enhanced synaptic inhibition in the cerebellar cortex of the ataxic PMCA2(-/-) knockout mouse. <i>Cerebellum</i> , 2013 , 12, 667-75	4.3	7
169	Two-photon voltage imaging using a genetically encoded voltage indicator. <i>Scientific Reports</i> , 2013 , 3, 2231	4.9	61
168	Optogenetic reporters. <i>Biology of the Cell</i> , 2013 , 105, 14-29	3.5	33
167	Probing neuronal activities with genetically encoded optical indicators: from a historical to a forward-looking perspective. <i>Pflügers Archiv European Journal of Physiology</i> , 2013 , 465, 361-71	4.6	16

166	Neurons of the Deep Cerebellar Nuclei 2013 , 1101-1110		3
165	Delivery of differentiation factors by mesoporous silica particles assists advanced differentiation of transplanted murine embryonic stem cells. <i>Stem Cells Translational Medicine</i> , 2013 , 2, 906-15	6.9	23
164	Distinct spatiotemporal activity in principal neurons of the mouse olfactory bulb in anesthetized and awake states. <i>Frontiers in Neural Circuits</i> , 2013 , 7, 46	3.5	33
163	Genetically engineered fluorescent voltage reporters. <i>ACS Chemical Neuroscience</i> , 2012 , 3, 585-92	5.7	44
162	Genetically encoded optical indicators for the analysis of neuronal circuits. <i>Nature Reviews Neuroscience</i> , 2012 , 13, 687-700	13.5	151
161	A comprehensive concept of optogenetics. <i>Progress in Brain Research</i> , 2012 , 196, 1-28	2.9	51
160	Optogenetic excitation of neurons with channelrhodopsins: light instrumentation, expression systems, and channelrhodopsin variants. <i>Progress in Brain Research</i> , 2012 , 196, 29-47	2.9	28
159	Transfer of Kv3.1 voltage sensor features to the isolated Ci-VSP voltage-sensing domain. <i>Biophysical Journal</i> , 2012 , 103, 669-76	2.9	27
158	Mouse transgenic approaches in optogenetics. <i>Progress in Brain Research</i> , 2012 , 196, 193-213	2.9	58
157	Genetically encoded probes for optical imaging of brain electrical activity. <i>Progress in Brain Research</i> , 2012 , 196, 63-77	2.9	19
156	Tools for observing and controlling specific molecular or physiological pathways in intact cells and tissues. Preface. <i>Progress in Brain Research</i> , 2012 , 196, vii-viii	2.9	3
155	Functional integration of calcium regulatory mechanisms at Purkinje neuron synapses. <i>Cerebellum</i> , 2012 , 11, 640-50	4.3	11
154	Hippocampal LTP triggers proteasome-mediated SPAR degradation in CA1 neurons. <i>Synapse</i> , 2012 , 66, 142-50	2.4	12
153	Imaging neural circuit dynamics with a voltage-sensitive fluorescent protein. <i>Journal of Neurophysiology</i> , 2012 , 108, 2323-37	3.2	186
152	Diversity of neuronal elements and circuitry in the cerebellar nuclei. <i>Cerebellum</i> , 2012 , 11, 420-1	4.3	51
151	Optogenetic electrophysiology: a new approach to combine cellular and systems physiology. <i>Biomolecular Concepts</i> , 2012 , 3, 193-201	3.7	1
150	Voltage Sensitive Protein 2.3: A Novel Tool to Study Sarcolemmal Structure and Electrical Activity in Mouse Hearts. <i>Biophysical Journal</i> , 2011 , 100, 575a-576a	2.9	2
149	Optogenetic monitoring of membrane potentials. <i>Experimental Physiology</i> , 2011 , 96, 13-8	2.4	52

148	Functional classification of neurons in the mouse lateral cerebellar nuclei. <i>Cerebellum</i> , 2011 , 10, 637-46	4.3	78
147	Reduced expression of the Ca(2+) transporter protein PMCA2 slows Ca(2+) dynamics in mouse cerebellar Purkinje neurones and alters the precision of motor coordination. <i>Journal of Physiology</i> , 2010 , 588, 907-22	3.9	33
146	Imaging brain electric signals with genetically targeted voltage-sensitive fluorescent proteins. <i>Nature Methods</i> , 2010 , 7, 643-9	21.6	212
145	Toward the second generation of optogenetic tools. <i>Journal of Neuroscience</i> , 2010 , 30, 14998-5004	6.6	89
144	Biophysical characterization of the fluorescent protein voltage probe VSFP2.3 based on the voltage-sensing domain of Ci-VSP. <i>European Biophysics Journal</i> , 2010 , 39, 1625-35	1.9	35
143	GlyT2+ neurons in the lateral cerebellar nucleus. <i>Cerebellum</i> , 2010 , 9, 42-55	4.3	49
142	Contribution of plasma membrane Ca ATPase to cerebellar synapse function. <i>World Journal of Biological Chemistry</i> , 2010 , 1, 95-102	3.8	8
141	Genetically Encoded Protein Sensors of Membrane Potential 2010 , 157-163		2
140	The role of the calcium transporter protein plasma membrane calcium ATPase PMCA2 in cerebellar Purkinje neuron function. <i>Functional Neurology</i> , 2010 , 25, 153-8	2.2	17
139	Spectrally-resolved response properties of the three most advanced FRET based fluorescent protein voltage probes. <i>PLoS ONE</i> , 2009 , 4, e4555	3.7	64
138	Second and third generation voltage-sensitive fluorescent proteins for monitoring membrane potential. <i>Frontiers in Molecular Neuroscience</i> , 2009 , 2, 5	6.1	64
137	Optical imaging as a link between cellular neurophysiology and circuit modeling. <i>Frontiers in Cellular Neuroscience</i> , 2009 , 3, 5	6.1	11
136	Exploration of fluorescent protein voltage probes based on circularly permuted fluorescent proteins. <i>Frontiers in Neuroengineering</i> , 2009 , 2, 14		55
135	Optical measurement of mGluR1 conformational changes reveals fast activation, slow deactivation, and sensitization. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2009 , 106, 11388-93	11.5	52
134	Optical imaging of postsynaptic odor representation in the glomerular layer of the mouse olfactory bulb. <i>Journal of Neurophysiology</i> , 2009 , 102, 817-30	3.2	63
133	Interaction of Cupidin/Homer2 with two actin cytoskeletal regulators, Cdc42 small GTPase and Drebrin, in dendritic spines. <i>BMC Neuroscience</i> , 2009 , 10, 25	3.2	54
132	Presynaptically expressed long-term depression at cerebellar parallel fiber synapses. <i>Pflügers Archiv European Journal of Physiology</i> , 2009 , 457, 865-75	4.6	50
131	Red-shifted voltage-sensitive fluorescent proteins. <i>Chemistry and Biology</i> , 2009 , 16, 1268-77		78

130	Charge movement of a voltage-sensitive fluorescent protein. <i>Biophysical Journal</i> , 2009 , 96, L19-21	2.9	49
129	Effect of voltage sensitive fluorescent proteins on neuronal excitability. <i>Biophysical Journal</i> , 2009 , 96, 3959-76	2.9	57
128	Genetisch kodierte optische Sensoren des neuronalen Membranpotenzials: Was sind die Perspektiven für die hochauflösende Messung elektrischer Signale in kortikalen Hirnstrukturen?. <i>E-Neuroforum</i> , 2009 , 15, 13-20		
127	Fluorescent Sensors of Membrane Potential that Are Genetically Encoded 2009 , 27-43		
126	Model of very fast (> 75 Hz) network oscillations generated by electrical coupling between the proximal axons of cerebellar Purkinje cells. <i>European Journal of Neuroscience</i> , 2008 , 28, 1603-16	3.5	40
125	High-frequency network oscillations in cerebellar cortex. <i>Neuron</i> , 2008 , 58, 763-74	13.9	111
124	Subcellular localization of the voltage-gated potassium channels Kv3.1b and Kv3.3 in the cerebellar dentate nucleus of glutamic acid decarboxylase 67-green fluorescent protein transgenic mice. <i>Neuroscience</i> , 2008 , 155, 1059-69	3.9	15
123	GABAergic synaptic communication in the GABAergic and non-GABAergic cells in the deep cerebellar nuclei. <i>Neuroscience</i> , 2008 , 156, 537-49	3.9	63
122	Targeted optical probing of neuronal circuit dynamics using fluorescent protein sensors. <i>NeuroSignals</i> , 2008 , 16, 289-99	1.9	11
121	Blocking acid-sensing ion channel 1 alleviates Huntington's disease pathology via an ubiquitin-proteasome system-dependent mechanism. <i>Human Molecular Genetics</i> , 2008 , 17, 3223-35	5.6	98
120	Modulation of excitation by metabotropic glutamate receptors. <i>Results and Problems in Cell Differentiation</i> , 2008 , 44, 163-75	1.4	16
119	Genetically encoded fluorescent sensors of membrane potential. <i>Brain Cell Biology</i> , 2008 , 36, 53-67		75
118	Engineering of a genetically encodable fluorescent voltage sensor exploiting fast Cl ⁻ -VSP voltage-sensing movements. <i>PLoS ONE</i> , 2008 , 3, e2514	3.7	129
117	Three fluorescent protein voltage sensors exhibit low plasma membrane expression in mammalian cells. <i>Journal of Neuroscience Methods</i> , 2007 , 161, 32-8	3	99
116	Presynaptic plasma membrane Ca ²⁺ ATPase isoform 2a regulates excitatory synaptic transmission in rat hippocampal CA3. <i>Journal of Physiology</i> , 2007 , 579, 85-99	3.9	46
115	Two new non-competitive mGlu1 receptor antagonists are potent tools to unravel functions of this mGlu receptor subtype. <i>British Journal of Pharmacology</i> , 2007 , 151, 723-4	8.6	8
114	Functional Characterization of Permuted Enhanced Green Fluorescent Proteins Comprising Varying Linker Peptides. <i>Photochemistry and Photobiology</i> , 2007 , 74, 356-363	3.6	3
113	The relationship between blood flow and neuronal activity in the rodent olfactory bulb. <i>Journal of Neuroscience</i> , 2007 , 27, 6452-60	6.6	93

112	Morphological and electrophysiological properties of GABAergic and non-GABAergic cells in the deep cerebellar nuclei. <i>Journal of Neurophysiology</i> , 2007 , 97, 901-11	3.2	173
111	An NMDA receptor/nitric oxide cascade in presynaptic parallel fiber-Purkinje neuron long-term potentiation. <i>Journal of Neuroscience</i> , 2007 , 27, 3408-15	6.6	54
110	Plasma membrane Ca ²⁺ ATPase 2 contributes to short-term synapse plasticity at the parallel fiber to Purkinje neuron synapse. <i>Journal of Neuroscience</i> , 2007 , 27, 3753-8	6.6	47
109	Climbing fiber-triggered metabotropic slow potentials enhance dendritic calcium transients and simple spike firing in cerebellar Purkinje cells. <i>Molecular and Cellular Neurosciences</i> , 2007 , 35, 596-603	4.8	18
108	In vivo calcium imaging from genetically specified target cells in mouse cerebellum. <i>NeuroImage</i> , 2007 , 34, 859-69	7.9	62
107	Engineering and characterization of an enhanced fluorescent protein voltage sensor. <i>PLoS ONE</i> , 2007 , 2, e440	3.7	174
106	Involvement of protein synthesis and degradation in long-term potentiation of Schaffer collateral CA1 synapses. <i>Journal of Neuroscience</i> , 2006 , 26, 4949-55	6.6	144
105	Interaction of Kv3 potassium channels and resurgent sodium current influences the rate of spontaneous firing of Purkinje neurons. <i>Journal of Neuroscience</i> , 2006 , 26, 4602-12	6.6	96
104	Optical probing of neuronal circuit dynamics: genetically encoded versus classical fluorescent sensors. <i>Trends in Neurosciences</i> , 2006 , 29, 160-6	13.3	107
103	Olfactory nerve stimulation-evoked mGluR1 slow potentials, oscillations, and calcium signaling in mouse olfactory bulb mitral cells. <i>Journal of Neurophysiology</i> , 2006 , 95, 3097-104	3.2	30
102	Olfactory nerve stimulation-induced calcium signaling in the mitral cell distal dendritic tuft. <i>Journal of Neurophysiology</i> , 2006 , 95, 2417-26	3.2	12
101	Behavioral motor dysfunction in Kv3-type potassium channel-deficient mice. <i>Genes, Brain and Behavior</i> , 2006 , 5, 472-82	3.6	35
100	Activation of cerebellar parallel fibers monitored in transgenic mice expressing a fluorescent Ca ²⁺ indicator protein. <i>European Journal of Neuroscience</i> , 2005 , 22, 627-35	3.5	99
99	Long-term depression at olfactory nerve synapses. <i>Journal of Neuroscience</i> , 2005 , 25, 4252-9	6.6	24
98	Calcium signaling in mitral cell dendrites of olfactory bulbs of neonatal rats and mice during olfactory nerve Stimulation and beta-adrenoceptor activation. <i>Learning and Memory</i> , 2004 , 11, 406-11	2.8	14
97	Functional topology of the mossy fibre-granule cell--Purkinje cell system revealed by imaging of intrinsic fluorescence in mouse cerebellum. <i>European Journal of Neuroscience</i> , 2004 , 20, 740-8	3.5	47
96	Allele-dependent changes of olivocerebellar circuit properties in the absence of the voltage-gated potassium channels Kv3.1 and Kv3.3. <i>European Journal of Neuroscience</i> , 2004 , 19, 3317-27	3.5	56
95	Glutamate-induced elevations in intracellular chloride concentration in hippocampal cell cultures derived from EYFP-expressing mice. <i>European Journal of Neuroscience</i> , 2004 , 19, 2915-22	3.5	19

94	Transgenic mice expressing a fluorescent in vivo label in a distinct subpopulation of neocortical layer 5 pyramidal cells. <i>Journal of Comparative Neurology</i> , 2004 , 480, 72-88	3.4	19
93	Imaging of gene expression during long-term potentiation. <i>NeuroReport</i> , 2004 , 15, 2039-43	1.7	12
92	Sodium imaging of climbing fiber innervation fields in developing mouse Purkinje cells. <i>Journal of Neurophysiology</i> , 2003 , 89, 2555-63	3.2	32
91	Motor dysfunction and altered synaptic transmission at the parallel fiber-Purkinje cell synapse in mice lacking potassium channels Kv3.1 and Kv3.3. <i>Journal of Neuroscience</i> , 2003 , 23, 7677-84	6.6	74
90	Subcellular localization of the voltage-dependent potassium channel Kv3.1b in postnatal and adult rat medial nucleus of the trapezoid body. <i>Neuroscience</i> , 2003 , 118, 889-98	3.9	49
89	Optical recordings of membrane potential using genetically targeted voltage-sensitive fluorescent proteins. <i>Methods</i> , 2003 , 30, 42-8	4.6	41
88	Optical imaging of odor preference memory in the rat olfactory bulb. <i>Journal of Neurophysiology</i> , 2002 , 87, 3156-9	3.2	50
87	Metabotropic glutamate receptors in the cerebellum with a focus on their function in Purkinje cells. <i>Cerebellum</i> , 2002 , 1, 19-26	4.3	45
86	Transgenic mice expressing a pH and Cl ⁻ sensing yellow-fluorescent protein under the control of a potassium channel promoter. <i>European Journal of Neuroscience</i> , 2002 , 15, 40-50	3.5	50
85	Glial protein S100B modulates long-term neuronal synaptic plasticity. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2002 , 99, 4037-42	11.5	206
84	Glutamate uptake controls expression of a slow postsynaptic current mediated by mGluRs in cerebellar Purkinje cells. <i>Journal of Neurophysiology</i> , 2002 , 87, 1974-80	3.2	56
83	Metabotropic glutamate receptors: electrical and chemical signaling properties. <i>Neuroscientist</i> , 2002 , 8, 551-61	7.6	97
82	Metabotropic glutamate receptors in the cerebellum with a focus on their function in Purkinje cells 2002 , 1, 19		5
81	Functional characterization of permuted enhanced green fluorescent proteins comprising varying linker peptides. <i>Photochemistry and Photobiology</i> , 2001 , 74, 356-63	3.6	20
80	Design and characterization of a DNA-encoded, voltage-sensitive fluorescent protein. <i>European Journal of Neuroscience</i> , 2001 , 13, 2314-8	3.5	189
79	Imaging postsynaptic activities of teleost thalamic neurons at single cell resolution using a voltage-sensitive dye. <i>Neuroscience Letters</i> , 2001 , 312, 17-20	3.3	4
78	Increased seizure susceptibility in mice lacking metabotropic glutamate receptor 7. <i>Journal of Neuroscience</i> , 2001 , 21, 8734-45	6.6	164
77	Immunocytochemical localization of the metabotropic glutamate receptor mGluR4a in the piriform cortex of the rat. <i>Journal of Comparative Neurology</i> , 2000 , 417, 263-274	3.4	16

76	Selective blockade of mGlu5 metabotropic glutamate receptors protects rat hepatocytes against hypoxic damage. <i>Hepatology</i> , 2000 , 31, 649-55	11.2	53
75	Immunolocalization of the mGluR1b splice variant of the metabotropic glutamate receptor 1 at parallel fiber-Purkinje cell synapses in the rat cerebellar cortex. <i>Journal of Neurochemistry</i> , 2000 , 74, 1301-9	6	63
74	Elevation of intradendritic sodium concentration mediated by synaptic activation of metabotropic glutamate receptors in cerebellar Purkinje cells. <i>European Journal of Neuroscience</i> , 2000 , 12, 2199-204	3.5	51
73	Cortex-restricted disruption of NMDAR1 impairs neuronal patterns in the barrel cortex. <i>Nature</i> , 2000 , 406, 726-31	50.4	415
72	The G-protein-coupled receptor kinase GRK4 mediates homologous desensitization of metabotropic glutamate receptor 1. <i>FASEB Journal</i> , 2000 , 14, 2569-80	0.9	119
71	Group I metabotropic glutamate receptors mediate an inward current in rat substantia nigra dopamine neurons that is independent from calcium mobilization. <i>Journal of Neurophysiology</i> , 1999 , 82, 1974-81	3.2	59
70	Developmental expression of the group III metabotropic glutamate receptor mGluR4a in the medial nucleus of the trapezoid body of the rat. <i>Journal of Comparative Neurology</i> , 1999 , 411, 431-40	3.4	35
69	Clustering of the group III metabotropic glutamate receptor 4a at parallel fiber synaptic terminals in the rat cerebellar molecular layer. <i>Neuroscience Research</i> , 1999 , 35, 71-4	2.9	29
68	Immunocytochemical localization of the mGluR1b metabotropic glutamate receptor in the rat hypothalamus. <i>Journal of Comparative Neurology</i> , 1998 , 390, 225-33	3.4	41
67	Immunohistochemical localization of the mGluR1 metabotropic glutamate receptor in the adult rodent forebrain: Evidence for a differential distribution of mGluR1 splice variants 1998 , 400, 391-407		74
66	The metabotropic glutamate receptor mGlu5 controls the onset of developmental apoptosis in cultured cerebellar neurons. <i>European Journal of Neuroscience</i> , 1998 , 10, 2173-84	3.5	50
65	Early sodium elevations induced by combined oxygen and glucose deprivation in pyramidal cortical neurons. <i>European Journal of Neuroscience</i> , 1998 , 10, 3572-4	3.5	22
64	Hypoxic and hypoglycaemic changes of intracellular pH in cerebral cortical pyramidal neurones. <i>NeuroReport</i> , 1998 , 9, 1447-50	1.7	6
63	Whole cell patch-clamp recordings of rat midbrain dopaminergic neurons isolate a sulphonylurea- and ATP-sensitive component of potassium currents activated by hypoxia. <i>Journal of Neurophysiology</i> , 1998 , 79, 1239-45	3.2	47
62	Intracellular sodium and calcium homeostasis during hypoxia in dopamine neurons of rat substantia nigra pars compacta. <i>Journal of Neurophysiology</i> , 1998 , 80, 2237-43	3.2	32
61	Immunohistochemical localization of the mGluR1 metabotropic glutamate receptor in the adult rodent forebrain: Evidence for a differential distribution of mGluR1 splice variants 1998 , 400, 391		2
60	Metabotropic glutamate receptor agonists stimulate polyphosphoinositide hydrolysis in primary cultures of rat hepatocytes. <i>European Journal of Pharmacology</i> , 1997 , 338, R1-2	5.3	19
59	mGluR5 metabotropic glutamate receptor distribution in rat and human spinal cord: a developmental study. <i>Neuroscience Research</i> , 1997 , 28, 49-57	2.9	79

58	A novel splice variant of a metabotropic glutamate receptor, human mGluR7b. <i>Neuropharmacology</i> , 1997 , 36, 153-9	5.5	94
57	Pharmacological characterization of synaptic transmission through mGluRs in rat cerebellar slices. <i>Neuropharmacology</i> , 1997 , 36, 401-3	5.5	53
56	Distribution of the metabotropic glutamate receptor subtype mGluR5 in rat midbrain periaqueductal grey and relationship with ascending spinofugal afferents. <i>Neuroscience Letters</i> , 1997 , 228, 1-4	3.3	32
55	Expression and coupling to polyphosphoinositide hydrolysis of group I metabotropic glutamate receptors in early postnatal and adult rat brain. <i>European Journal of Neuroscience</i> , 1997 , 9, 12-7	3.5	125
54	Light and electron microscopic demonstration of mGluR5 metabotropic glutamate receptor immunoreactive neuronal elements in the rat cerebellar cortex. <i>Journal of Comparative Neurology</i> , 1997 , 385, 641-50	3.4	29
53	The C-terminal domain of the mGluR1 metabotropic glutamate receptor affects sensitivity to agonists. <i>Journal of Neurochemistry</i> , 1996 , 67, 58-63	6	54
52	An impairment of hippocampal synaptic plasticity in mice lacking mGlu7 receptors. <i>Neuropharmacology</i> , 1996 , 35, A6	5.5	10
51	Immunocytochemical localization of the mGluR1b metabotropic glutamate receptor in synaptic terminals of rat hippocampus. <i>Neuropharmacology</i> , 1996 , 35, A14	5.5	2
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