Robert H Miller

List of Publications by Citations

62 papers	4,687 citations	30 h-index	65 g-index
65 ext. papers	5,308 ext. citations	10.1 avg, IF	5.43 L-index

#	Paper	IF	Citations
62	LINGO-1 negatively regulates myelination by oligodendrocytes. *Nature Neuroscience*, **2005**, 8, 745-51	25.5	490
61	Human bone marrow-derived mesenchymal stem cells induce Th2-polarized immune response and promote endogenous repair in animal models of multiple sclerosis. *Glia*, **2009**, 57, 1192-203	9	418
60	Regulation of oligodendrocyte development in the vertebrate CNS. *Progress in Neurobiology*, **2002**, 67, 451-67	10.9	346
59	Changing role of forebrain astrocytes during development, regenerative failure, and induced regeneration upon transplantation. *Journal of Comparative Neurology*, **1986**, 251, 23-43	3.4	338
58	Hepatocyte growth factor mediates mesenchymal stem cell-induced recovery in multiple sclerosis models. *Nature Neuroscience*, **2012**, 15, 862-70	25.5	304
57	Drug-based modulation of endogenous stem cells promotes functional remyelination in vivo. *Nature*, **2015**, 522, 216-20	50.4	255
56	Promotion of central nervous system remyelination by induced differentiation of oligodendrocyte precursor cells. *Annals of Neurology*, **2009**, 65, 304-15	9.4	248
55	Oligodendrocyte origins. *Trends in Neurosciences*, **1996**, 19, 92-6	13.3	204
54	CNS myelin wrapping is driven by actin disassembly. *Developmental Cell*, **2015**, 34, 152-67	10.2	190
53	CXCR2-positive neutrophils are essential for cuprizone-induced demyelination: relevance to multiple sclerosis. *Nature Neuroscience*, **2010**, 13, 319-26	25.5	167
52	Induction of myelinating oligodendrocytes in human cortical spheroids. *Nature Methods*, **2018**, 15, 700-706	26.6	156
51	Human iPSC Glial Mouse Chimeras Reveal Glial Contributions to Schizophrenia. *Cell Stem Cell*, **2017**, 21, 195-208.e6	18	143
50	Accumulation of 8,9-unsaturated sterols drives oligodendrocyte formation and remyelination. *Nature*, **2018**, 560, 372-376	50.4	104
49	Cell-based therapeutic strategies for multiple sclerosis. *Brain*, **2017**, 140, 2776-2796	11.2	102
48	Contact with central nervous system myelin inhibits oligodendrocyte progenitor maturation. *Developmental Biology*, **1999**, 216, 359-68	3.1	96
47	Netrin 1 mediates spinal cord oligodendrocyte precursor dispersal. *Development (Cambridge)*, **2003**, 130, 2095-105	6.6	90
46	Erythropoietin signaling promotes oligodendrocyte development following prenatal systemic hypoxic-ischemic brain injury. *Pediatric Research*, **2013**, 74, 658-67	3.2	81

45	Human mesenchymal stem cells signals regulate neural stem cell fate. *Neurochemical Research*, **2007**, 32, 353-62	4.6	78
44	Pharmaceutical integrated stress response enhancement protects oligodendrocytes and provides a potential multiple sclerosis therapeutic. *Nature Communications*, **2015**, 6, 6532	17.4	68
43	Patterning of spinal cord oligodendrocyte development by dorsally derived BMP4. *Journal of Neuroscience Research*, **2004**, 76, 9-19	4.4	64
42	The roles of blood-derived macrophages and resident microglia in the neuroinflammatory response to implanted intracortical microelectrodes. *Biomaterials*, **2014**, 35, 8049-64	15.6	55
41	Spinal cord oligodendrocytes develop from a limited number of migratory highly proliferative precursors. *Journal of Neuroscience Research*, **1997**, 50, 157-68	4.4	47
40	Apoptosis of oligodendrocytes in the central nervous system results in rapid focal demyelination. *Annals of Neurology*, **2012**, 72, 395-405	9.4	45
39	Regulation of oligodendrocyte development. *Molecular Neurobiology*, **1998**, 18, 247-59	6.2	45
38	Contribution of the oligodendrocyte lineage to CNS repair and neurodegenerative pathologies. *Neuropharmacology*, **2016**, 110, 539-547	5.5	43
37	Density dependent modulation of cell cycle protein expression in astrocytes. *Journal of Neuroscience Research*, **2001**, 66, 487-96	4.4	41
36	Cyclin-dependent kinase 5 mediates adult OPC maturation and myelin repair through modulation of Akt and GsK-3 signaling. *Journal of Neuroscience*, **2014**, 34, 10415-29	6.6	36
35	Modulation of adhesion molecule expression on rat cortical astrocytes during maturation. *Journal of Neurochemistry*, **1993**, 60, 1453-66	6	31
34	The potential of mesenchymal stem cells for neural repair. *Discovery Medicine*, **2010**, 9, 236-42	2.5	31
33	Targeting CD14 on blood derived cells improves intracortical microelectrode performance. *Biomaterials*, **2018**, 163, 163-173	15.6	30
32	Isolation and culture of spinal cord astrocytes. *Methods in Molecular Biology*, **2012**, 814, 93-104	1.4	29
31	Cellular approaches for stimulating CNS remyelination. *Regenerative Medicine*, **2007**, 2, 817-29	2.5	24
30	Loss of HDAC11 ameliorates clinical symptoms in a multiple sclerosis mouse model. *Life Science Alliance*, **2018**, 1, e201800039	5.8	23
29	Emerging Cellular and Molecular Strategies for Enhancing Central Nervous System (CNS) Remyelination. *Brain Sciences*, **2018**, 8,	3.4	22
28	Apoptosis of Oligodendrocytes during Early Development Delays Myelination and Impairs Subsequent Responses to Demyelination. *Journal of Neuroscience*, **2015**, 35, 14031-41	6.6	21

27	Homotypic cell contact-dependent inhibition of astrocyte proliferation. *Glia*, **1998**, 22, 379-89	9	21
26	Restoring the balance between disease and repair in multiple sclerosis: insights from mouse models. *DMM Disease Models and Mechanisms*, **2010**, 3, 535-9	4.1	20
25	MSC Therapeutics in Chronic Inflammation. *Current Stem Cell Reports*, **2016**, 2, 168-173	1.8	19
24	A novel form of migration of glial precursors. *Glia*, **1996**, 16, 27-39	9	16
23	Notochord is essential for oligodendrocyte development in Xenopus spinal cord. *Journal of Neuroscience Research*, **1997**, 47, 361-71	4.4	15
22	The Activators of Cyclin-Dependent Kinase 5 p35 and p39 Are Essential for Oligodendrocyte Maturation, Process Formation, and Myelination. *Journal of Neuroscience*, **2016**, 36, 3024-37	6.6	14
21	CNS disease diminishes the therapeutic functionality of bone marrow mesenchymal stem cells. *Experimental Neurology*, **2017**, 295, 222-232	5.7	12
20	Astrocytes Are Required for Oligodendrocyte Survival and Maintenance of Myelin Compaction and Integrity. *Frontiers in Cellular Neuroscience*, **2020**, 14, 74	6.1	11
19	Community pharmacist outreach program directed at physicians treating congestive heart failure. *American Journal of Health-System Pharmacy*, **2000**, 57, 747-52	2.2	11
18	A cell surface antigen expressed by astrocytes and their precursors. *Glia*, **1993**, 8, 20-32	9	11
17	Discovery of 1,2,3-Triazole Derivatives for Multimodality PET/CT/Cryoimaging of Myelination in the Central Nervous System. *Journal of Medicinal Chemistry*, **2017**, 60, 987-999	8.3	10
16	Demyelination in the central nervous system mediated by an anti-oligodendrocyte antibody. *Journal of Neuroscience Research*, **1998**, 54, 158-68	4.4	9
15	Design, Synthesis, and Evaluation of Fluorinated Radioligands for Myelin Imaging. *Journal of Medicinal Chemistry*, **2016**, 59, 3705-18	8.3	8
14	Oligodendrocyte-specific loss of Cdk5 disrupts the architecture of nodes of Ranvier as well as learning and memory. *Experimental Neurology*, **2018**, 306, 92-104	5.7	7
13	Targeting glioma-initiating cells in GBM: ABTC-0904, a randomized phase 0/II study targeting the Sonic Hedgehog-signaling pathway.. *Journal of Clinical Oncology*, **2014**, 32, 2026-2026	2.2	6
12	Transcriptional Profiling of Mesenchymal Stem Cells Identifies Distinct Neuroimmune Pathways Altered by CNS Disease. *International Journal of Stem Cells*, **2018**, 11, 48-60	3	6
11	Calcium control of myelin sheath growth. *Nature Neuroscience*, **2018**, 21, 2-3	25.5	5
10	Building bridges with astrocytes for spinal cord repair. *Journal of Biology*, **2006**, 5, 6		5

9	In vitro and in vivo characterization of blastemal cells from regenerating newt limbs. *The Journal of Experimental Zoology*, **1992**, 262, 180-92		4
8	Antibody-mediated oligodendrocyte cell death requires an astrocyte-derived cosignal. *Journal of Neuroscience Research*, **1998**, 52, 137-48	4.4	3
7	Oligodendrocyte ablation as a tool to study demyelinating diseases. *Neural Regeneration Research*, **2016**, 11, 886-9	4.5	3
6	Neurobiology: A change of fate for nerve repair. *Nature*, **2017**, 551, 41-42	50.4	2
5	B Cells in Neuroinflammation: New Perspectives and Mechanistic Insights. *Cells*, **2021**, 10,	7.9	2
4	Renegade nuclear enzymes disrupt axonal integrity. *Nature Neuroscience*, **2010**, 13, 143-4	25.5	1
3	Developmental ablation of mature oligodendrocytes exacerbates adult CNS demyelination. *Brain, Behavior, & Immunity - Health*, **2020**, 7, 100110	5.1	0
2	Cell type specific isolation of primary astrocytes and microglia from adult mouse spinal cord.. *Journal of Neuroscience Methods*, **2022**, 109599	3	0
1	Adherent self-renewable human embryonic stem cell-derived neural stem cell line: functional engraftment in experimental stroke model. *Regenerative Medicine*, **2008**, 3, 275-279	2.5	