Valentin A Pavlov

List of Publications by Year
in descending order

95 papers	9,991 citations	61984 43 h-index	64796 79 g-index
101 all docs	101 docs citations	101 times ranked	9130 citing authors

#	Article	IF	Citations
1	Peripheral nerve stimulation and immunity: the expanding opportunities for providing mechanistic insight and therapeutic intervention. International Immunology, 2022, 34, 107-118.	4.0	22
2	A fully implantable wireless bidirectional neuromodulation system for mice. Biosensors and Bioelectronics, 2022, 200, 113886.	10.1	21
3	Exploring the vagus nerve and the inflammatory reflex for therapeutic benefit in chronic spinal cord injury. Current Opinion in Neurology, 2022, Publish Ahead of Print, .	3.6	3
4	The Cholinergic Drug Galantamine Ameliorates Acute Respiratory Distress Syndrome in Mice. FASEB Journal, 2022, 36, .	0.5	0
5	Famotidine activates the vagus nerve inflammatory reflex to attenuate cytokine storm. Molecular Medicine, 2022, 28, 57.	4.4	13
6	Treating disorders across the lifespan by modulating cholinergic signaling with galantamine. Journal of Neurochemistry, 2021, 158, 1359-1380.	3.9	26
7	The evolving obesity challenge: targeting the vagus nerve and the inflammatory reflex in the response. , 2021, 222, 107794.		23
8	The Cholinergic Drug Galantamine Alleviates Oxidative Stress Alongside Anti-inflammatory and Cardio-Metabolic Effects in Subjects With the Metabolic Syndrome in a Randomized Trial. Frontiers in Immunology, 2021, 12, 613979.	4.8	24
9	Neuroinflammation in Murine Endotoxemia: A Dualâ€Tracer MicroPET Evaluation. FASEB Journal, 2021, 35, .	0.5	0
10	Cholinergic stimulation with pyridostigmine modulates a heart-spleen axis after acute myocardial infarction in spontaneous hypertensive rats. Scientific Reports, 2021, 11, 9563.	3.3	5
11	ILâ€1Î²â€Induced Thermoregulation and Vagus Nerve Activity is Mediated by Transient Receptor Potential Ankyrin 1. FASEB Journal, 2021, 35, .	0.5	0
12	The Cholinergic Drug Pyridostigmine Alleviates Inflammation During LPS-Induced Acute Respiratory Distress Syndrome. Frontiers in Pharmacology, 2021, 12, 624895.	3.5	12
13	The Fourth Bioelectronic Medicine Summit â€œTechnology Targeting Molecular Mechanismsâ€: current progress, challenges, and charting the future. Bioelectronic Medicine, 2021, 7, 7.	2.3	5
14	HMGB1 released from nociceptors mediates inflammation. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	7.1	34
15	Bioelectronic Medicine: From Preclinical Studies on the Inflammatory Reflex to New Approaches in Disease Diagnosis and Treatment. Cold Spring Harbor Perspectives in Medicine, 2020, 10, a034140.	6.2	54
16	Post-sepsis syndrome â€“ an evolving entity that afflicts survivors of sepsis. Molecular Medicine, 2020, 26, 6.	4.4	80
17	Identification of a brainstem locus that inhibits tumor necrosis factor. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 29803-29810.	7.1	76
18	The Î±7 nicotinic acetylcholine receptor agonist, GTS-21, attenuates hyperoxia-induced acute inflammatory lung injury by alleviating the accumulation of HMGB1 in the airways and the circulation. Molecular Medicine, 2020, 26, 63.	4.4	32

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19	Auricular neural stimulation as a new non-invasive treatment for opioid detoxification. Bioelectronic Medicine, 2020, 6, 7.	2.3	24
20	The Acetylcholinesterase Inhibitor Galantamine Ameliorates Oxidative Stress in Subjects with the Metabolic Syndrome. FASEB Journal, 2020, 34, 1-1.	0.5	0
21	Characterization of inflammation and insulin resistance in highâ€fat dietâ€induced male C57BL/6J mouse model of obesity. Animal Models and Experimental Medicine, 2019, 2, 252-258.	3.3	58
22	An Effective Method for Acute Vagus Nerve Stimulation in Experimental Inflammation. Frontiers in Neuroscience, 2019, 13, 877.	2.8	40
23	Bioelectronic medicine: updates, challenges and paths forward. Bioelectronic Medicine, 2019, 5, 1.	2.3	41
24	Collateral benefits of studying the vagus nerve in bioelectronic medicine. Bioelectronic Medicine, 2019, 5, 5.	2.3	14
25	Investigational treatment of rheumatoid arthritis with a vibrotactile device applied to the external ear. Bioelectronic Medicine, 2019, 5, 4.	2.3	55
26	Cholinergic Control of Inflammation, Metabolic Dysfunction, and Cognitive Impairment in Obesity-Associated Disorders: Mechanisms and Novel Therapeutic Opportunities. Frontiers in Neuroscience, 2019, 13, 263.	2.8	58
27	Forebrain Cholinergic Signaling Regulates Innate Immune Responses and Inflammation. Frontiers in Immunology, 2019, 10, 585.	4.8	55
28	Buprenorphine Markedly Elevates a Panel of Surrogate Markers in a Murine Model of Sepsis. Shock, 2019, 52, 550-553.	2.1	14
29	Reuniting overnutrition and undernutrition, macronutrients, and micronutrients. Diabetes/Metabolism Research and Reviews, 2019, 35, e3072.	4.0	19
30	Optogenetic Stimulation of Cholinergic Neurons in the Brainstem Induces Splenic Nerve Activity and Attenuates Systemic Inflammation. FASEB Journal, 2019, 33, 740.5.	0.5	0
31	Molecular and Functional Neuroscience in Immunity. Annual Review of Immunology, 2018, 36, 783-812.	21.8	304
32	Adenylyl Cyclase 6 Mediates Inhibition of TNF in the Inflammatory Reflex. Frontiers in Immunology, 2018, 9, 2648.	4.8	49
33	Selective Optogenetic Activation of the Inflammatory Reflex Using Multisite Surgical Approach. Journal of the American College of Surgeons, 2018, 227, S82.	0.5	0
34	Editorial: Neuro-Immune Interactions in Inflammation and Autoimmunity. Frontiers in Immunology, 2018, 9, 772.	4.8	15
35	Vagus nerve cholinergic circuitry to the liver and the gastrointestinal tract in the neuroimmune communicatome. American Journal of Physiology - Renal Physiology, 2018, 315, G651-G658.	3.4	39
36	Neural regulation of immunity: molecular mechanisms and clinical translation. Nature Neuroscience, 2017, 20, 156-166.	14.8	357

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37	Mechanisms and Therapeutic Relevance of Neuro-immune Communication. Immunity, 2017, 46, 927-942.	14.3	445
38	Rodent Models of Diabetes. , 2017, , 215-238.		0
39	Forebrain Cholinergic Dysfunction and Systemic and Brain Inflammation in Murine Sepsis Survivors. Frontiers in Immunology, 2017, 8, 1673.	4.8	74
40	Activation of the cholinergic anti-inflammatory pathway by GTS-21 attenuates cisplatin-induced acute kidney injury in mice. PLoS ONE, 2017, 12, e0188797.	2.5	28
41	Nicotinic Acetylcholine Receptor-Mediated Protection of the Rat Heart Exposed to Ischemia Reperfusion. Molecular Medicine, 2017, 23, 120-133.	4.4	32
42	Galantamine alleviates inflammation and insulin resistance in patients with metabolic syndrome in a randomized trial. JCI Insight, 2017, 2, .	5.0	64
43	Obesity Paradox, Obesity Orthodox, and the Metabolic Syndrome: An Approach to Unity. Molecular Medicine, 2016, 22, 873-885.	4.4	43
44	Emetine Di-HCl Attenuates Type 1 Diabetes Mellitus in Mice. Molecular Medicine, 2016, 22, 585-596.	4.4	5
45	Blood pressure regulation by CD4+ lymphocytes expressing choline acetyltransferase. Nature Biotechnology, 2016, 34, 1066-1071.	17.5	74
46	Rodent Models of Diabetes. , 2016, , 1-25.		0
47	Single-Pulse and Unidirectional Electrical Activation of the Cervical Vagus Nerve Reduces Tumor Necrosis Factor in Endotoxemia. Bioelectronic Medicine, 2015, 2, 37-42.	2.3	65
48	Galantamine Attenuates Type 1 Diabetes and Inhibits Anti-Insulin Antibodies in Nonobese Diabetic Mice. Molecular Medicine, 2015, 21, 702-708.	4.4	29
49	Neural circuitry and immunity. Immunologic Research, 2015, 63, 38-57.	2.9	204
50	Xanomeline suppresses excessive pro-inflammatory cytokine responses through neural signal-mediated pathways and improves survival in lethal inflammation. Brain, Behavior, and Immunity, 2015, 44, 19-27.	4.1	64
51	Brain Region-Specific Alterations in the Gene Expression of Cytokines, Immune Cell Markers and Cholinergic System Components during Peripheral Endotoxin-Induced Inflammation. Molecular Medicine, 2014, 20, 601-611.	4.4	79
52	Central cholinergic activation of a vagus nerve-to-spleen circuit alleviates experimental colitis. Mucosal Immunology, 2014, 7, 335-347.	6.0	170
53	Central Muscarinic Cholinergic Activation Alters Interaction between Splenic Dendritic Cell and CD4+CD25- T Cells in Experimental Colitis. PLoS ONE, 2014, 9, e109272.	2.5	80
54	Expression of Concern: <scp>HMGB</scp>1 mediates splenomegaly and expansion of splenic <scp>CD</scp>11b+ <scp>L</scp>yâ€6<scp>C</scp>^{high} inflammatory monocytes in murine sepsis survivors. Journal of Internal Medicine, 2013, 274, 381-390.	6.0	74

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55	318 Central Muscarinic 1 Acetylcholine Receptor Activation Reduces the Severity of Experimental Colitis via the Splenic Nerve and the Spleen. Gastroenterology, 2013, 144, S-66.	1.3	1
56	Central muscarinic 1 acetylcholine receptor activation reduces the severity of experimental colitis via the vagus nerve and the splenic dendritic cells. Autonomic Neuroscience: Basic and Clinical, 2013, 177, 316-317.	2.8	0
57	High-Mobility Group Box 1 Mediates Persistent Splenocyte Priming in Sepsis Survivors. Shock, 2013, 40, 492-495.	2.1	43
58	The vagus nerve and the inflammatory reflexâ€"linking immunity and metabolism. Nature Reviews Endocrinology, 2012, 8, 743-754.	9.6	635
59	Î±7 Nicotinic Acetylcholine Receptor (Î±7nAChR) Expression in Bone Marrow-Derived Non-T Cells Is Required for the Inflammatory Reflex. Molecular Medicine, 2012, 18, 539-543.	4.4	133
60	876 Pharmacological Central Activation of the Vagus Nerve Reduces Experimental Colitis. Gastroenterology, 2012, 142, S-151-S-152.	1.3	0
61	Identification of Pigment Epithelium-Derived Factor as an Adipocyte-Derived Inflammatory Factor. Molecular Medicine, 2012, 18, 1161-1168.	4.4	42
62	Acetylcholine-Synthesizing T Cells Relay Neural Signals in a Vagus Nerve Circuit. Science, 2011, 334, 98-101.	12.6	1,158
63	Galantamine Alleviates Inflammation and Other Obesity-Associated Complications in High-Fat Diet-Fed Mice. Molecular Medicine, 2011, 17, 599-606.	4.4	96
64	Thyroxine is a potential endogenous antagonist of macrophage migration inhibitory factor (MIF) activity. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 8224-8227.	7.1	41
65	Cardiopulmonary Arrest and Resuscitation Disrupts Cholinergic Anti-Inflammatory Processes: A Role for Cholinergic Î±7 Nicotinic Receptors. Journal of Neuroscience, 2011, 31, 3446-3452.	3.6	52
66	VAGUS NERVE STIMULATION REGULATES HEMOSTASIS IN SWINE. Shock, 2010, 33, 608-613.	2.1	42
67	Infection and Sepsis. NeuroImmune Biology, 2010, , 309-320.	0.2	2
68	Galantamine Treatment as a Novel Therapeutic Approach in Alleviating Obesity and Obesity-Related Complications in High-Fat Diet-Fed Mice. American Journal of Gastroenterology, 2010, 105, S107.	0.4	0
69	Brain acetylcholinesterase activity controls systemic cytokine levels through the cholinergic anti-inflammatory pathway. Brain, Behavior, and Immunity, 2009, 23, 41-45.	4.1	378
70	The M1 muscarinic acetylcholine receptor agonist xanomeline suppresses lethal inflammation. FASEB Journal, 2009, 23, 1003.5.	0.5	0
71	Spinal p38 MAP kinase regulates peripheral cholinergic outflow. Arthritis and Rheumatism, 2008, 58, 2919-2921.	6.7	42
72	Acetylcholine regulation of synoviocyte cytokine expression by the Î±7 nicotinic receptor. Arthritis and Rheumatism, 2008, 58, 3439-3449.	6.7	93

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73	Modulation of TNF Release by Choline Requires Î±7 Subunit Nicotinic Acetylcholine Receptor-Mediated Signaling. Molecular Medicine, 2008, 14, 567-574.	4.4	288
74	Cholinergic modulation of inflammation. International Journal of Clinical and Experimental Medicine, 2008, 1, 203-12.	1.3	41
75	Alternative Chemical Modifications Reverse the Binding Orientation of a Pharmacophore Scaffold in the Active Site of Macrophage Migration Inhibitory Factor. Journal of Biological Chemistry, 2007, 282, 23089-23095.	3.4	47
76	Transcutaneous vagus nerve stimulation reduces serum high mobility group box 1 levels and improves survival in murine sepsis*. Critical Care Medicine, 2007, 35, 2762-2768.	0.9	216
77	Selective Î±7-nicotinic acetylcholine receptor agonist GTS-21 improves survival in murine endotoxemia and severe sepsis*. Critical Care Medicine, 2007, 35, 1139-1144.	0.9	352
78	Neuro-immune interactions via the cholinergic anti-inflammatory pathway. Life Sciences, 2007, 80, 2325-2329.	4.3	127
79	Phenolic Hydrazones Are Potent Inhibitors of Macrophage Migration Inhibitory Factor Proinflammatory Activity and Survival Improving Agents in Sepsis. Journal of Medicinal Chemistry, 2007, 50, 1993-1997.	6.4	54
80	Imbalance in Seminal Fluid MIF Indicates Male Infertility. Molecular Medicine, 2007, 13, 199-202.	4.4	19
81	Transcutaneous vagus nerve stimulation reduces serum high mobility group box 1 levels and improves survival in murine sepsis *. Critical Care Medicine, 2007, 35, 2762-2768.	0.9	211
82	Splenectomy inactivates the cholinergic antiinflammatory pathway during lethal endotoxemia and polymicrobial sepsis. Journal of Experimental Medicine, 2006, 203, 1623-1628.	8.5	630
83	Controlling inflammation: the cholinergic anti-inflammatory pathway. Biochemical Society Transactions, 2006, 34, 1037-1040.	3.4	190
84	GALANTAMINE IMPROVES SURVIVAL IN LETHAL ENDOTOXEMIA. Shock, 2006, 25, 65-66.	2.1	0
85	Central muscarinic cholinergic regulation of the systemic inflammatory response during endotoxemia. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 5219-5223.	7.1	295
86	Splenectomy inactivates the cholinergic antiinflammatory pathway during lethal endotoxemia and polymicrobial sepsis. Journal of Cell Biology, 2006, 174, i1-i1.	5.2	0
87	The cholinergic anti-inflammatory pathway. Brain, Behavior, and Immunity, 2005, 19, 493-499.	4.1	472
88	ISO-1 Binding to the Tautomerase Active Site of MIF Inhibits Its Pro-inflammatory Activity and Increases Survival in Severe Sepsis. Journal of Biological Chemistry, 2005, 280, 36541-36544.	3.4	264
89	The Cholinergic Anti-inflammatory Pathway: A Missing Link in Neuroimmunomodulation. Molecular Medicine, 2003, 9, 125-134.	4.4	566
90	The cholinergic anti-inflammatory pathway: a missing link in neuroimmunomodulation. Molecular Medicine, 2003, 9, 125-34.	4.4	241

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91	Novel oxa-spermine homologues: synthesis and cytotoxic properties. Bioorganic and Medicinal Chemistry, 2002, 10, 691-697.	3.0	7
92	Cytotoxicity, DNA binding and localisation of novel bis-naphthalimidopropyl polyamine derivatives. Chemico-Biological Interactions, 2001, 137, 15-24.	4.0	52
93	The synthesis and in vitro cytotoxic studies of novel oxa-spermidine derivatives and homologues. Bioorganic and Medicinal Chemistry Letters, 2000, 10, 1265-1267.	2.2	10
94	The synthesis and in vitro cytotoxic studies of novel bis-naphthalimidopropyl polyamine derivatives. Bioorganic and Medicinal Chemistry Letters, 2000, 10, 1609-1612.	2.2	35
95	The Neuroimmune Communicatome in Inflammation. , 0, , 1485-1516.		10