Matthew Volgraf

List of Publications by Year
in descending order

22 papers	2,027 citations	430874 18 h-index	677142 22 g-index
22 all docs	22 docs citations	22 times ranked	2235 citing authors

#	Article	IF	Citations
1	Allosteric control of an ionotropic glutamate receptor with an optical switch. Nature Chemical Biology, 2006, 2, 47-52.	8.0	558
2	Remote Control of Neuronal Activity with a Light-Gated Glutamate Receptor. Neuron, 2007, 54, 535-545.	8.1	310
3	Mechanisms of photoswitch conjugation and light activation of an ionotropic glutamate receptor. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 10865-10870.	7.1	169
4	Reversibly Caged Glutamate:Â A Photochromic Agonist of Ionotropic Glutamate Receptors. Journal of the American Chemical Society, 2007, 129, 260-261.	13.7	154
5	Positive Allosteric Modulators of GluN2A-Containing NMDARs with Distinct Modes of Action and Impacts on Circuit Function. Neuron, 2016, 89, 983-999.	8.1	138
6	Discovery of GluN2A-Selective NMDA Receptor Positive Allosteric Modulators (PAMs): Tuning Deactivation Kinetics via Structure-Based Design. Journal of Medicinal Chemistry, 2016, 59, 2760-2779.	6.4	84
7	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.	7.1	82
8	All Optical Interface for Parallel, Remote, and Spatiotemporal Control of Neuronal Activity. Nano Letters, 2007, 7, 3859-3863.	9.1	67
9	Biomimetic synthesis of the IDO inhibitors exiguamine A and B. Nature Chemical Biology, 2008, 4, 535-537.	8.0	62
10	Ligand binding at the proteinâ€“lipid interface: strategic considerations for drug design. Nature Reviews Drug Discovery, 2021, 20, 710-722.	46.4	59
11	A TRPA1 inhibitor suppresses neurogenic inflammation and airway contraction for asthma treatment. Journal of Experimental Medicine, 2021, 218, .	8.5	56
12	A Non-covalent Ligand Reveals Biased Agonism of the TRPA1 Ion Channel. Neuron, 2021, 109, 273-284.e4.	8.1	52
13	Discovery of 7-Tetrahydropyran-2-yl Chromans: Î²-Site Amyloid Precursor Protein Cleaving Enzyme 1 (BACE1) Inhibitors That Reduce Amyloid Î²-Protein (AÎ²) in the Central Nervous System. Journal of Medicinal Chemistry, 2014, 57, 878-902.	6.4	36
14	Total Synthesis of Exiguamines A and B Inspired by Catecholamine Chemistry. Chemistry - A European Journal, 2012, 18, 4999-5005.	3.3	34
15	GluN2A-Selective Pyridopyrimidinone Series of NMDAR Positive Allosteric Modulators with an Improved in Vivo Profile. ACS Medicinal Chemistry Letters, 2017, 8, 84-89.	2.8	32
16	A novel NMDA receptor positive allosteric modulator that acts via the transmembrane domain. Neuropharmacology, 2017, 121, 204-218.	4.1	27
17	Discovery of a Potent (4R,5S)-4-Fluoro-5-methylproline Sulfonamide Transient Receptor Potential Ankyrin 1 Antagonist and Its Methylene Phosphate Prodrug Guided by Molecular Modeling. Journal of Medicinal Chemistry, 2018, 61, 3641-3659.	6.4	27
18	Tetrahydrofuran-Based Transient Receptor Potential Ankyrin 1 (TRPA1) Antagonists: Ligand-Based Discovery, Activity in a Rodent Asthma Model, and Mechanism-of-Action via Cryogenic Electron Microscopy. Journal of Medicinal Chemistry, 2021, 64, 3843-3869.	6.4	22

#	Article	IF	Citations
19	Discovery of 5-Azaindazole (GNE-955) as a Potent Pan-Pim Inhibitor with Optimized Bioavailability. Journal of Medicinal Chemistry, 2017, 60, 4458-4473.	6.4	18
20	TRPA1 modulation by piperidine carboxamides suggests an evolutionarily conserved binding site and gating mechanism. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 26008-26019.	7.1	18
21	Synthesis, characterization, and PK/PD studies of a series of spirocyclic pyranochromene BACE1 inhibitors. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 2477-2480.	2.2	12
22	A Retrospective Look at the Impact of Binding Site Environment on the Optimization of TRPA1 Antagonists. ACS Medicinal Chemistry Letters, 2021, 12, 1230-1237.	2.8	10