David R Slochower

List of Publications by Year
in descending order

17 papers	**931** citations	623734 **14** h-index	940533 **16** g-index
21 all docs	**21** docs citations	**21** times ranked	**1684** citing authors

#	Article	IF	Citations
1	Kinase Associated-1 Domains Drive MARK/PAR1 Kinases to Membrane Targets by Binding Acidic Phospholipids. Cell, 2010, 143, 966-977.	28.9	150
2	Overview of the SAMPL5 host–guest challenge: Are we doing better?. Journal of Computer-Aided Molecular Design, 2017, 31, 1-19.	2.9	140
3	Escaping Atom Types in Force Fields Using Direct Chemical Perception. Journal of Chemical Theory and Computation, 2018, 14, 6076-6092.	5.3	110
4	Polyelectrolyte properties of filamentous biopolymers and their consequences in biological fluids. Soft Matter, 2014, 10, 1439.	2.7	91
5	The SAMPL6 SAMPLing challenge: assessing the reliability and efficiency of binding free energy calculations. Journal of Computer-Aided Molecular Design, 2020, 34, 601-633.	2.9	86
6	Transmembrane orientation and possible role of the fusogenic peptide from parainfluenza virus 5 (PIV5) in promoting fusion. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 3958-3963.	7.1	65
7	Open collaborative writing with Manubot. PLoS Computational Biology, 2019, 15, e1007128.	3.2	51
8	Counterion-mediated cluster formation by polyphosphoinositides. Chemistry and Physics of Lipids, 2014, 182, 38-51.	3.2	42
9	Quantum and All-Atom Molecular Dynamics Simulations of Protonation and Divalent Ion Binding to Phosphatidylinositol 4,5-Bisphosphate (PIP$_2$). Journal of Physical Chemistry B, 2013, 117, 8322-8329.	2.6	38
10	Counterion-mediated pattern formation in membranes containing anionic lipids. Advances in Colloid and Interface Science, 2014, 208, 177-188.	14.7	33
11	The SAMPL5 host–guest challenge: computing binding free energies and enthalpies from explicit solvent simulations by the attach-pull-release (APR) method. Journal of Computer-Aided Molecular Design, 2017, 31, 133-145.	2.9	33
12	Binding Thermodynamics of Host–Guest Systems with SMIRNOFF99Frosst 1.0.5 from the Open Force Field Initiative. Journal of Chemical Theory and Computation, 2019, 15, 6225-6242.	5.3	21
13	Salmon-derived thrombin inhibits development of chronic pain through an endothelial barrier protective mechanism dependent on APC. Biomaterials, 2016, 80, 96-105.	11.4	20
14	Divalent cations bind to phosphoinositides to induce ion and isomer specific propensities for nano-cluster initiation in bilayer membranes. Royal Society Open Science, 2020, 7, 192208.	2.4	17
15	Motor-like Properties of Nonmotor Enzymes. Biophysical Journal, 2018, 114, 2174-2179.	0.5	13
16	Physical chemistry and membrane properties of two phosphatidylinositol bisphosphate isomers. Physical Chemistry Chemical Physics, 2015, 17, 12608-12615.	2.8	12
17	Molecular and Continuum Modeling Methods for Understanding the Role of Polyphosphoinositides in Inducing Cellular Morphology Changes. Biophysical Journal, 2019, 116, 374a.	0.5	0