Sergei F Chekmarev

List of Publications by Year
in descending order

35	291	840776 11	940533 16
papers	citations	h-index	g-index

36	36	36	176
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Potential Energy Surfaces and Conformational Transitions in Biomolecules: A Successive Confinement Approach Applied to a Solvated Tetrapeptide. Physical Review Letters, 2002, 88, 038101.	7.8	33
2	Folding Time Distributions as an Approach to Protein Folding Kinetics. Journal of Physical Chemistry B, 2005, 109, 5312-5330.	2.6	27
3	New Insights into the Folding of a Î²-Sheet Miniprotein in a Reduced Space of Collective Hydrogen Bond Variables: Application to a Hydrodynamic Analysis of the Folding Flow. Journal of Physical Chemistry B, 2013, 117, 6092-6105.	2.6	26
4	Confinement of the molecular dynamics trajectory to a specified catchment area on the potential surface. Chemical Physics Letters, 1998, 287, 719-724.	2.6	20
5	Hydrodynamic Description of Protein Folding. Physical Review Letters, 2008, 100, 018107.	7.8	17
6	Turbulent phenomena in protein folding. Physical Review E, 2011, 83, 011920.	2.1	16
7	A simple gradient method for locating saddles. Chemical Physics Letters, 1994, 227, 354-360.	2.6	15
8	Folding of a SH3 Domain: Standard and â€œHydrodynamicâ€•Analyses. Journal of Physical Chemistry B, 2009, 113, 12759-12772.	2.6	15
9	Taboo search by successive confinement: Surveying a potential energy surface. Physical Review E, 2001, 64, 036703.	2.1	12
10	Total and fractional densities of states from caloric relations. Physical Review E, 1998, 57, 2445-2448.	2.1	11
11	Folding of Ubiquitin:Â A Simple Model Describes the Strange Kinetics. Journal of Physical Chemistry B, 2006, 110, 8865-8869.	2.6	11
12	Effect of condensation heat on the condensation coefficient. AICHE Journal, 1996, 42, 2467-2475.	3.6	10
13	A Lattice Protein with an Amyloidogenic Latent State:Â Stability and Folding Kinetics. Journal of Physical Chemistry B, 2007, 111, 2675-2687.	2.6	10
14	Protein folding: Complex potential for the driving force in a two-dimensional space of collective variables. Journal of Chemical Physics, 2013, 139, 145103.	3.0	10
15	First Passage Analysis of the Folding of a Î²-Sheet Miniprotein: Is it More Realistic Than the Standard Equilibrium Approach?. Journal of Physical Chemistry B, 2014, 118, 4287-4299.	2.6	9
16	A hydrodynamic view of the first-passage folding of Trp-cage miniprotein. European Biophysics Journal, 2016, 45, 229-243.	2.2	9
17	Protein Folding as a Complex Reaction: A Two-Component Potential for the Driving Force of Folding and Its Variation with Folding Scenario. PLoS ONE, 2015, 10, e0121640.	2.5	7
18	Folding of a Î²-Sheet Miniprotein: Probability Fluxes, Streamlines, and the Potential for the Driving Force. Journal of Physical Chemistry B, 2015, 119, 1380-1387.	2.6	7

#	Article	IF	Citations
19	Information entropy as a measure of nonexponentiality of waiting-time distributions. Physical Review E, 2008, 78, 066113.	2.1	5
20	First-passage times in protein folding: exploring the native-like states vs. overcoming the free energy barrier. Physical Chemistry Chemical Physics, 2021, 23, 17856-17865.	2.8	3
21	On â€œvapourî—¸liquidâ€•phase equilibrium in a finite system. Chemical Physics Letters, 1985, 120, 531-536.	2.6	2
22	Equilibration of Protein States: A Time Dependent Free-Energy Disconnectivity Graph. Journal of Physical Chemistry B, 2015, 119, 8340-8348.	2.6	2
23	On hydrodynamic interpretation of folding of an Î±-helical protein. Thermophysics and Aeromechanics, 2016, 23, 941-944.	0.5	2
24	Turbulence in protein folding: Vorticity, scaling and diffusion of probability flows. PLoS ONE, 2017, 12, e0188659.	2.5	2
25	Protein Folding Dynamics in the Space of Experimentally Measured Variables: Turbulence Phenomena. Journal of Applied Mechanics and Technical Physics, 2018, 59, 827-833.	0.5	2
26	Modeling of Multicolor Single-Molecule FÃ¶rster Resonance Energy-Transfer Experiments on Protein Folding. Journal of Physical Chemistry B, 2018, 122, 10678-10685.	2.6	2
27	Alternation of phases of regular and irregular dynamics in protein folding. Physical Review E, 2019, 99, 022412.	2.1	2
28	Tendency to occupy a statistically dominant spatial state of the flow as a driving force for turbulent transition. Chaos, 2013, 23, 013144.	2.5	1
29	Laminar-Turbulent Transition: The Change of the Flow State Temperature with the Reynolds Number. Journal of Statistical Physics, 2014, 157, 1019-1030.	1.2	1
30	Temperature evolution of Trp-cage folding pathways: An analysis by dividing the probability flux field into stream tubes. Journal of Biological Physics, 2017, 43, 565-583.	1.5	1
31	How the dyes affect folding of small proteins in single-molecule FRET experiments: A simulation study. Biophysical Chemistry, 2019, 254, 106243.	2.8	1
32	Title is missing!. Journal of Structural Chemistry, 2001, 42, 877-881.	1.0	0
33	Mixed Bose-Fermi statistics: Kinetic equation and navigation through a network. Physical Review E, 2010, 82, 026106.	2.1	0
34	Hydrodynamic description of protein folding: the decrease of the probability fluxes as an indicator of transition states in two-state folders. Journal of Biomolecular Structure and Dynamics, 2017, 35, 3152-3160.	3.5	0
35	Extraction of kinetics from equilibrium distributions of states using the Metropolis Monte Carlo method. Physical Review E, 2022, 105, 034407.	2.1	0