

Jin Wang

List of Publications by Year in descending order

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249
papers

30,698
citations

38742

50
h-index

4885

168
g-index

264
all docs

264
docs citations

264
times ranked

30783
citing authors

#	ARTICLE	IF	CITATIONS
1	Initial sequencing and analysis of the human genome. <i>Nature</i> , 2001, 409, 860-921.	27.8	21,074
2	Single-atom nanozymes. <i>Science Advances</i> , 2019, 5, eaav5490.	10.3	615
3	Quantifying the Waddington landscape and biological paths for development and differentiation. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2011, 108, 8257-8262.	7.1	414
4	Potential landscape and flux framework of nonequilibrium networks: Robustness, dissipation, and coherence of biochemical oscillations. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008, 105, 12271-12276.	7.1	334
5	Self-regulating gene: An exact solution. <i>Physical Review E</i> , 2005, 72, 051907.	2.1	229
6	Direct Z-Scheme OD/2D Heterojunction of CsPbBr ₃ Quantum Dots/Bi ₂ WO ₆ Nanosheets for Efficient Photocatalytic CO ₂ Reduction. <i>ACS Applied Materials & Interfaces</i> , 2020, 12, 31477-31485.	8.0	222
7	A computational approach to simplifying the protein folding alphabet. , 1999, 6, 1033-1038.		213
8	The Potential Landscape of Genetic Circuits Imposes the Arrow of Time in Stem Cell Differentiation. <i>Biophysical Journal</i> , 2010, 99, 29-39.	0.5	208
9	Boosting Photocatalytic CO ₂ Reduction on CsPbBr ₃ Perovskite Nanocrystals by Immobilizing Metal Complexes. <i>Chemistry of Materials</i> , 2020, 32, 1517-1525.	6.7	197
10	ZnSe Nanorods@CsSnCl ₃ Perovskite Heterojunction Composite for Photocatalytic CO ₂ Reduction. <i>ACS Nano</i> , 2022, 16, 3332-3340.	14.6	179
11	Landscape and flux theory of non-equilibrium dynamical systems with application to biology. <i>Advances in Physics</i> , 2015, 64, 1-137.	14.4	174
12	Quantifying Cell Fate Decisions for Differentiation and Reprogramming of a Human Stem Cell Network: Landscape and Biological Paths. <i>PLoS Computational Biology</i> , 2013, 9, e1003165.	3.2	155
13	Dopamine and uric acid electrochemical sensor based on a glassy carbon electrode modified with cubic Pd and reduced graphene oxide nanocomposite. <i>Journal of Colloid and Interface Science</i> , 2017, 497, 172-180.	9.4	148
14	Statistical mechanics of a correlated energy landscape model for protein folding funnels. <i>Journal of Chemical Physics</i> , 1997, 106, 2932-2948.	3.0	145
15	Energy Landscape Theory, Funnels, Specificity, and Optimal Criterion of Biomolecular Binding. <i>Physical Review Letters</i> , 2003, 90, 188101.	7.8	145
16	Nonequilibrium physics in biology. <i>Reviews of Modern Physics</i> , 2019, 91, .	45.6	123
17	Single Molecule Conformational Dynamics of Adenylate Kinase: Energy Landscape, Structural Correlations, and Transition State Ensembles. <i>Journal of the American Chemical Society</i> , 2008, 130, 4772-4783.	13.7	121
18	Structural correlations in protein folding funnels. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 1997, 94, 777-782.	7.1	120

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19	Landscape and flux reveal a new global view and physical quantification of mammalian cell cycle. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 14130-14135.	7.1	115
20	Highly Luminescent and Water-Resistant CsPbBr ₃ "CsPb ₂ Br ₅ Perovskite Nanocrystals Coordinated with Partially Hydrolyzed Poly(methyl methacrylate) and Polyethylenimine. ACS Nano, 2019, 13, 10386-10396.	14.6	110
21	Multiscaled exploration of coupled folding and binding of an intrinsically disordered molecular recognition element in measles virus nucleoprotein. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, E3743-52.	7.1	102
22	Kinetic paths, time scale, and underlying landscapes: A path integral framework to study global natures of nonequilibrium systems and networks. Journal of Chemical Physics, 2010, 133, 125103.	3.0	99
23	Potential Energy Landscape and Robustness of a Gene Regulatory Network: Toggle Switch. PLoS Computational Biology, 2007, 3, e60.	3.2	98
24	Potential and flux landscapes quantify the stability and robustness of budding yeast cell cycle network. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 8195-8200.	7.1	93
25	Configuration-dependent diffusion can shift the kinetic transition state and barrier height of protein folding. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 14646-14651.	7.1	92
26	Rational Design of Metal Halide Perovskite Nanocrystals for Photocatalytic CO ₂ Reduction: Recent Advances, Challenges, and Prospects. ACS Energy Letters, 2022, 7, 2043-2059.	17.4	89
27	Quantifying the Landscape for Development and Cancer from a Core Cancer Stem Cell Circuit. Cancer Research, 2015, 75, 2607-2618.	0.9	77
28	Intrinsic noise, dissipation cost, and robustness of cellular networks: The underlying energy landscape of MAPK signal transduction. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 6039-6044.	7.1	75
29	Highly sensitive electrochemical determination of Sunset Yellow based on gold nanoparticles/graphene electrode. Analytica Chimica Acta, 2015, 893, 41-48.	5.4	75
30	Survival paths for reaction dynamics in fluctuating environments. Chemical Physics, 1994, 180, 141-156.	1.9	73
31	Quantifying Waddington landscapes and paths of non-adiabatic cell fate decisions for differentiation, reprogramming and transdifferentiation. Journal of the Royal Society Interface, 2013, 10, 20130787.	3.4	73
32	Exploring the Dynamic Functional Landscape of Adenylate Kinase Modulated by Substrates. Journal of Chemical Theory and Computation, 2013, 9, 84-95.	5.3	70
33	Importance of Electrostatic Interactions in the Association of Intrinsically Disordered Histone Chaperone Chz1 and Histone H2A.Z-H2B. PLoS Computational Biology, 2012, 8, e1002608.	3.2	69
34	Multi-Scaled Explorations of Binding-Induced Folding of Intrinsically Disordered Protein Inhibitor IA3 to its Target Enzyme. PLoS Computational Biology, 2011, 7, e1001118.	3.2	68
35	Quantifying the underlying landscape and paths of cancer. Journal of the Royal Society Interface, 2014, 11, 20140774.	3.4	68
36	Quantifying Robustness and Dissipation Cost of Yeast Cell Cycle Network: The Funneled Energy Landscape Perspectives. Biophysical Journal, 2007, 92, 3755-3763.	0.5	66

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37	The potential and flux landscape theory of evolution. <i>Journal of Chemical Physics</i> , 2012, 137, 065102.	3.0	64
38	Boosting the photocatalytic CO ₂ reduction of metal-organic frameworks by encapsulating carbon dots. <i>Nanoscale</i> , 2020, 12, 9533-9540.	5.6	64
39	First-passage time distribution and non-Markovian diffusion dynamics of protein folding. <i>Journal of Chemical Physics</i> , 2003, 118, 959-968.	3.0	63
40	Nonequilibrium landscape theory of neural networks. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2013, 110, E4185-94.	7.1	63
41	Topography of funneled landscapes determines the thermodynamics and kinetics of protein folding. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2012, 109, 15763-15768.	7.1	62
42	Pocket-Based Drug Design: Exploring Pocket Space. <i>AAPS Journal</i> , 2013, 15, 228-241.	4.4	62
43	Islands and Page curves of Reissner-Nordström black holes. <i>Journal of High Energy Physics</i> , 2021, 2021, 1.	4.7	62
44	Interfacial Electron Engineering of Palladium and Molybdenum Carbide for Highly Efficient Oxygen Reduction. <i>Journal of the American Chemical Society</i> , 2021, 143, 6933-6941.	13.7	62
45	Exploring the Mechanism of Flexible Biomolecular Recognition with Single Molecule Dynamics. <i>Physical Review Letters</i> , 2007, 98, 128105.	7.8	60
46	Recent development of pillar[n]arene-based amphiphiles. <i>Chinese Chemical Letters</i> , 2021, 32, 1267-1279.	9.0	60
47	Potential and flux decomposition for dynamical systems and non-equilibrium thermodynamics: Curvature, gauge field, and generalized fluctuation-dissipation theorem. <i>Journal of Chemical Physics</i> , 2011, 135, 234511.	3.0	59
48	Quantifying the topography of the intrinsic energy landscape of flexible biomolecular recognition. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2013, 110, E2342-51.	7.1	59
49	MOF-derived bimetallic Fe-Ni-P nanotubes with tunable compositions for dye-sensitized photocatalytic H ₂ and O ₂ production. <i>Chemical Engineering Journal</i> , 2020, 384, 123354.	12.7	57
50	Functionalized Graphene@Gold Nanostar/Lipid for Pancreatic Cancer Gene and Photothermal Synergistic Therapy under Photoacoustic/Photothermal Imaging Dual-Modal Guidance. <i>Small</i> , 2020, 16, e2003707.	10.0	57
51	Highly sensitive electrochemical determination of Sunset Yellow based on the ultrafine Au-Pd and reduced graphene oxide nanocomposites. <i>Journal of Colloid and Interface Science</i> , 2016, 481, 229-235.	9.4	55
52	Specificity quantification of biomolecular recognition and its implication for drug discovery. <i>Scientific Reports</i> , 2012, 2, 309.	3.3	53
53	Coupling CsPbBr ₃ Quantum Dots with Covalent Triazine Frameworks for Visible-Light-Driven CO ₂ Reduction. <i>ChemSusChem</i> , 2021, 14, 1131-1139.	6.8	52
54	Physical bioenergetics: Energy fluxes, budgets, and constraints in cells. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021, 118, .	7.1	52

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55	Adiabatic and Non-Adiabatic Non-Equilibrium Stochastic Dynamics of Single Regulating Genes. <i>Journal of Physical Chemistry B</i> , 2011, 115, 1254-1261.	2.6	51
56	Thermodynamics and kinetics of Hawking-Page phase transition. <i>Physical Review D</i> , 2020, 102, .	4.7	51
57	Exploration of Multi-State Conformational Dynamics and Underlying Global Functional Landscape of Maltose Binding Protein. <i>PLoS Computational Biology</i> , 2012, 8, e1002471.	3.2	50
58	High-Yield Synthesis of Silver Nanoclusters Protected by DNA Monomers and DFT Prediction of their Photoluminescence Properties. <i>Angewandte Chemie - International Edition</i> , 2013, 52, 2022-2026.	13.8	50
59	Engineered photoelectrochemical platform for the ultrasensitive detection of caffeic acid based on flower-like MoS ₂ and PANI nanotubes nanohybrid. <i>Sensors and Actuators B: Chemical</i> , 2018, 276, 322-330.	7.8	50
60	Exploring the Mechanisms of Differentiation, Dedifferentiation, Reprogramming and Transdifferentiation. <i>PLoS ONE</i> , 2014, 9, e105216.	2.5	50
61	Dynamic Conformational Change Regulates the Protein-DNA Recognition: An Investigation on Binding of a Y-Family Polymerase to Its Target DNA. <i>PLoS Computational Biology</i> , 2014, 10, e1003804.	3.2	48
62	Quantifying Intrinsic Specificity: A Potential Complement to Affinity in Drug Screening. <i>Physical Review Letters</i> , 2007, 99, 198101.	7.8	46
63	Eddy current and coupled landscapes for nonadiabatic and nonequilibrium complex system dynamics. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2013, 110, 14930-14935.	7.1	46
64	A dramatic platform for oxygen reduction reaction based on silver nanoclusters. <i>Chemical Communications</i> , 2014, 50, 234-236.	4.1	44
65	Lighting Up the Gold Nanoclusters via Host-Guest Recognition for High-Efficiency Antibacterial Performance and Imaging. <i>ACS Applied Materials & Interfaces</i> , 2019, 11, 36831-36838.	8.0	44
66	Funneled Landscape Leads to Robustness of Cell Networks: Yeast Cell Cycle. <i>PLoS Computational Biology</i> , 2006, 2, e147.	3.2	44
67	Diffusion dynamics, moments, and distribution of first-passage time on the protein-folding energy landscape, with applications to single molecules. <i>Physical Review E</i> , 2003, 67, 041905.	2.1	43
68	A new mechanism of stem cell differentiation through slow binding/unbinding of regulators to genes. <i>Scientific Reports</i> , 2012, 2, 550.	3.3	41
69	Non-equilibrium transition state rate theory. <i>Chemical Science</i> , 2014, 5, 3761-3769.	7.4	41
70	Thermal dynamic phase transition of Reissner-Nordström Anti-de Sitter black holes on free energy landscape. <i>Journal of High Energy Physics</i> , 2020, 2020, 1.	4.7	40
71	Surface Defect Engineering of CsPbBr ₃ Nanocrystals for High Efficient Photocatalytic CO ₂ Reduction. <i>Solar Rrl</i> , 2021, 5, 2100154.	5.8	39
72	Dominant Kinetic Paths on Biomolecular Binding-Folding Energy Landscape. <i>Physical Review Letters</i> , 2006, 96, 168101.	7.8	38

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73	Cell fate potentials and switching kinetics uncovered in a classic bistable genetic switch. <i>Nature Communications</i> , 2018, 9, 2787.	12.8	38
74	Molecular mechanism of multispecific recognition of Calmodulin through conformational changes. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, E3927-E3934.	7.1	37
75	Enhanced photo-electrochemical response of reduced graphene oxide and C3N4 nanosheets for rutin detection. <i>Journal of Colloid and Interface Science</i> , 2017, 506, 329-337.	9.4	37
76	Metal-organic frameworks-derived hollow-structured iron-cobalt bimetallic phosphide electrocatalysts for efficient oxygen evolution reaction. <i>Journal of Alloys and Compounds</i> , 2020, 821, 153463.	5.5	37
77	Simply synthesized nitrogen-doped graphene quantum dot (NGQD)-modified electrode for the ultrasensitive photoelectrochemical detection of dopamine. <i>Nanophotonics</i> , 2020, 9, 3831-3839.	6.0	36
78	Multidomain Protein Solves the Folding Problem by Multifunnel Combined Landscape: Theoretical Investigation of a Y-Family DNA Polymerase. <i>Journal of the American Chemical Society</i> , 2012, 134, 13755-13764.	13.7	35
79	NIR-II light triggered nitric oxide release nanoplatfrom combined chemo-photothermal therapy for overcoming multidrug resistant cancer. <i>Journal of Materials Chemistry B</i> , 2021, 9, 1698-1706.	5.8	35
80	Pillar[5]arene-Based 3D Hybrid Supramolecular Polymer for Green Catalysis in Water. <i>Inorganic Chemistry</i> , 2021, 60, 2883-2887.	4.0	34
81	Activate Fe ₃ S ₄ Nanorods by Ni Doping for Efficient Dye-Sensitized Photocatalytic Hydrogen Production. <i>ACS Applied Materials & Interfaces</i> , 2021, 13, 14198-14206.	8.0	34
82	Steady-state entanglement and coherence of two coupled qubits in equilibrium and nonequilibrium environments. <i>Physical Review A</i> , 2019, 99, .	2.5	33
83	Page curves for a family of exactly solvable evaporating black holes. <i>Physical Review D</i> , 2021, 103, .	4.7	33
84	Quantifying Kinetic Paths of Protein Folding. <i>Biophysical Journal</i> , 2005, 89, 1612-1620.	0.5	32
85	Role of non-native electrostatic interactions in the coupled folding and binding of PUMA with Mcl-1. <i>PLoS Computational Biology</i> , 2017, 13, e1005468.	3.2	32
86	Affinity and Specificity of Levamlodipine-Human Serum Albumin Interactions: Insights into Its Carrier Function. <i>Biophysical Journal</i> , 2009, 96, 3917-3925.	0.5	31
87	A comparison of various optimization algorithms of protein-ligand docking programs by fitness accuracy. <i>Journal of Molecular Modeling</i> , 2014, 20, 2251.	1.8	31
88	The Universal Statistical Distributions of the Affinity, Equilibrium Constants, Kinetics and Specificity in Biomolecular Recognition. <i>PLoS Computational Biology</i> , 2015, 11, e1004212.	3.2	31
89	Nonequilibrium Thermodynamics in Cell Biology: Extending Equilibrium Formalism to Cover Living Systems. <i>Annual Review of Biophysics</i> , 2020, 49, 227-246.	10.0	31
90	Statistics, pathways and dynamics of single molecule protein folding. <i>Journal of Chemical Physics</i> , 2003, 118, 952-958.	3.0	30

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91	The energy pump and the origin of the non-equilibrium flux of the dynamical systems and the networks. <i>Journal of Chemical Physics</i> , 2012, 136, 165102.	3.0	30
92	SPA-LN: a scoring function of ligand–nucleic acid interactions via optimizing both specificity and affinity. <i>Nucleic Acids Research</i> , 2017, 45, e110-e110.	14.5	30
93	Specificity and Affinity Quantification of Flexible Recognition from Underlying Energy Landscape Topography. <i>PLoS Computational Biology</i> , 2014, 10, e1003782.	3.2	28
94	Uncovering the underlying mechanism of cancer tumorigenesis and development under an immune microenvironment from global quantification of the landscape. <i>Journal of the Royal Society Interface</i> , 2017, 14, 20170105.	3.4	28
95	Computational discovery and experimental verification of tyrosine kinase inhibitor pazopanib for the reversal of memory and cognitive deficits in rat model neurodegeneration. <i>Chemical Science</i> , 2015, 6, 2812-2821.	7.4	27
96	A framework towards understanding mesoscopic phenomena: Emergent unpredictability, symmetry breaking and dynamics across scales. <i>Chemical Physics Letters</i> , 2016, 665, 153-161.	2.6	27
97	Coherence enhanced quantum metrology in a nonequilibrium optical molecule. <i>New Journal of Physics</i> , 2018, 20, 033034.	2.9	27
98	Anionic Lipid, pH-Sensitive Liposome–Gold Nanoparticle Hybrids for Gene Delivery – Quantitative Research of the Mechanism. <i>Small</i> , 2015, 11, 2333-2340.	10.0	25
99	A physical mechanism of cancer heterogeneity. <i>Scientific Reports</i> , 2016, 6, 20679.	3.3	25
100	Bubble-templated synthesis of nanocatalyst Co/C as NADH oxidase mimic. <i>National Science Review</i> , 2022, 9, nwab186.	9.5	25
101	Metastable dynamics of neural circuits and networks. <i>Applied Physics Reviews</i> , 2022, 9, 011313.	11.3	25
102	A Potent Lead Induces Apoptosis in Pancreatic Cancer Cells. <i>PLoS ONE</i> , 2012, 7, e37841.	2.5	24
103	Specificity and affinity quantification of protein–protein interactions. <i>Bioinformatics</i> , 2013, 29, 1127-1133.	4.1	24
104	Thermodynamic and kinetic specificities of ligand binding. <i>Chemical Science</i> , 2013, 4, 2387.	7.4	24
105	Immobilization of catalytic sites on quantum dots by ligand bridging for photocatalytic CO ₂ reduction. <i>Nanoscale</i> , 2020, 12, 2507-2514.	5.6	24
106	Mn-Doped Perovskite Nanocrystals for Photocatalytic CO ₂ Reduction: Insight into the Role of the Charge Carriers with Prolonged Lifetime. <i>Solar Rrl</i> , 2022, 6, .	5.8	24
107	Optimal Specificity and Function for Flexible Biomolecular Recognition. <i>Biophysical Journal</i> , 2007, 92, L109-L111.	0.5	23
108	Robustness and Coherence of a Three-Protein Circadian Oscillator: Landscape and Flux Perspectives. <i>Biophysical Journal</i> , 2009, 97, 3038-3046.	0.5	23

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109	The Potential and Flux Landscape Theory of Ecology. <i>PLoS ONE</i> , 2014, 9, e86746.	2.5	23
110	Lighting Up the Thioflavin T by Parallel-Stranded TG(GA) _n DNA Homoduplexes. <i>ACS Sensors</i> , 2018, 3, 1118-1125.	7.8	23
111	Ratiometric sensing of alkaline phosphatase based on the catalytical activity from Mn ²⁺ /Fe layered double hydroxide nanosheets. <i>Nanoscale</i> , 2020, 12, 2022-2027.	5.6	23
112	Platinum(II) Metallatriangle: Construction, Coassembly with Polypeptide, and Application in Combined Cancer Photodynamic and Chemotherapy. <i>Inorganic Chemistry</i> , 2021, 60, 7627-7631.	4.0	23
113	Landscape, Flux, Correlation, Resonance, Coherence, Stability, and Key Network Wirings of Stochastic Circadian Oscillation. <i>Biophysical Journal</i> , 2011, 101, 1335-1344.	0.5	22
114	Potential and flux field landscape theory. I. Global stability and dynamics of spatially dependent non-equilibrium systems. <i>Journal of Chemical Physics</i> , 2013, 139, 121920.	3.0	22
115	Binding mechanism and dynamic conformational change of C subunit of PKA with different pathways. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, E7959-E7968.	7.1	21
116	Water-soluble pillar[4]arene[1]quinone: Synthesis, host-guest property and application in the fluorescence turn-on sensing of ethylenediamine in aqueous solution, organic solvent and air. <i>Chinese Chemical Letters</i> , 2022, 33, 1475-1478.	9.0	21
117	Potential flux landscapes determine the global stability of a Lorenz chaotic attractor under intrinsic fluctuations. <i>Journal of Chemical Physics</i> , 2012, 136, 194108.	3.0	20
118	Landscape and Global Stability of Nonadiabatic and Adiabatic Oscillations in a Gene Network. <i>Biophysical Journal</i> , 2012, 102, 1001-1010.	0.5	20
119	Potential and flux field landscape theory. II. Non-equilibrium thermodynamics of spatially inhomogeneous stochastic dynamical systems. <i>Journal of Chemical Physics</i> , 2014, 141, 105104.	3.0	19
120	Landscape, kinetics, paths and statistics of curl flux, coherence, entanglement and energy transfer in non-equilibrium quantum systems. <i>New Journal of Physics</i> , 2015, 17, 043053.	2.9	19
121	Plasmonic Effect with Tailored Au@TiO ₂ Nanorods in Photoanode for Quantum Dot Sensitized Solar Cells. <i>ACS Applied Energy Materials</i> , 2019, 2, 5917-5924.	5.1	19
122	Conformational state switching and pathways of chromosome dynamics in cell cycle. <i>Applied Physics Reviews</i> , 2020, 7, 031403.	11.3	19
123	A Physical Mechanism and Global Quantification of Breast Cancer. <i>PLoS ONE</i> , 2016, 11, e0157422.	2.5	19
124	Least dissipation cost as a design principle for robustness and function of cellular networks. <i>Physical Review E</i> , 2008, 77, 031922.	2.1	18
125	Origin of long-lived quantum coherence and excitation dynamics in pigment-protein complexes. <i>Scientific Reports</i> , 2016, 6, 37629.	3.3	18
126	Plasmonic and photo-electrochemical enhancements of the AuAg@Au/RGO@C ₃ N ₄ nanocomposite for the detection of DA. <i>Analyst</i> , 2017, 142, 4852-4861.	3.5	18

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127	Position-, disorder-, and salt-dependent diffusion in binding-coupled-folding of intrinsically disordered proteins. <i>Physical Chemistry Chemical Physics</i> , 2019, 21, 5634-5645.	2.8	18
128	Rational Drug Design: The Search for Ras Protein Hydrolysis Intermediate Conformation Inhibitors with Both Affinity and Specificity. <i>Current Pharmaceutical Design</i> , 2013, 19, 2246-2258.	1.9	18
129	Dominant Kinetic Paths of Complex Systems: Gene Networks. <i>Journal of Physical Chemistry Letters</i> , 2010, 1, 1836-1840.	4.6	17
130	Potential Landscape and Probabilistic Flux of a Predator Prey Network. <i>PLoS ONE</i> , 2011, 6, e17888.	2.5	17
131	Landscape Framework and Global Stability for Stochastic Reaction Diffusion and General Spatially Extended Systems with Intrinsic Fluctuations. <i>Journal of Physical Chemistry B</i> , 2013, 117, 12908-12934.	2.6	17
132	Optimizing Scoring Function of Protein-Nucleic Acid Interactions with Both Affinity and Specificity. <i>PLoS ONE</i> , 2013, 8, e74443.	2.5	17
133	Boosting photocatalytic hydrogen generation of cadmium telluride colloidal quantum dots by nickel ion doping. <i>Journal of Colloid and Interface Science</i> , 2019, 549, 63-71.	9.4	17
134	Uncovering the Underlying Mechanisms of Cancer Metabolism through the Landscapes and Probability Flux Quantifications. <i>IScience</i> , 2020, 23, 101002.	4.1	17
135	Physical mechanism of mind changes and tradeoffs among speed, accuracy, and energy cost in brain decision making: Landscape, flux, and path perspectives. <i>Chinese Physics B</i> , 2016, 25, 078702.	1.4	16
136	Exploring the Underlying Mechanisms of the <i>Xenopus laevis</i> Embryonic Cell Cycle. <i>Journal of Physical Chemistry B</i> , 2018, 122, 5487-5499.	2.6	16
137	The emergence of the two cell fates and their associated switching for a negative auto-regulating gene. <i>BMC Biology</i> , 2019, 17, 49.	3.8	16
138	Microscopic Chromosomal Structural and Dynamical Origin of Cell Differentiation and Reprogramming. <i>Advanced Science</i> , 2020, 7, 2001572.	11.2	16
139	Quantification of motor network dynamics in Parkinson's disease by means of landscape and flux theory. <i>PLoS ONE</i> , 2017, 12, e0174364.	2.5	16
140	Selective Induction of Apoptosis: Promising Therapy in Pancreatic Cancer. <i>Current Pharmaceutical Design</i> , 2013, 19, 2259-2268.	1.9	16
141	Diffusion and single molecule dynamics on biomolecular interface binding energy landscape. <i>Chemical Physics Letters</i> , 2006, 418, 544-548.	2.6	15
142	The potential and flux landscape, Lyapunov function and non-equilibrium thermodynamics for dynamic systems and networks with an application to signal-induced Ca^{2+} oscillation. <i>Nonlinearity</i> , 2013, 26, R69.	1.4	15
143	Spiclomazine Induces Apoptosis Associated with the Suppression of Cell Viability, Migration and Invasion in Pancreatic Carcinoma Cells. <i>PLoS ONE</i> , 2013, 8, e66362.	2.5	15
144	Assistance of Molecular Vibrations on Coherent Energy Transfer in Photosynthesis from the View of a Quantum Heat Engine. <i>Journal of Physical Chemistry B</i> , 2015, 119, 4662-4667.	2.6	15

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145	Mesenchymal stem cells can delay radiation-induced crypt death: impact on intestinal CD44+ fragments. <i>Cell and Tissue Research</i> , 2016, 364, 331-344.	2.9	15
146	Thermodynamic and sequential characteristics of phase separation and droplet formation for an intrinsically disordered region/protein ensemble. <i>PLoS Computational Biology</i> , 2021, 17, e1008672.	3.2	15
147	Downhill Kinetics of Biomolecular Interface Binding: Globally Connected Scenario. <i>Biophysical Journal</i> , 2004, 87, 2187-2194.	0.5	14
148	Investigations of the underlying mechanisms of HIF-1 α and CITED2 binding to TAZ1. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 5595-5603.	7.1	14
149	Molecular Analysis of Thymopentin Binding to HLA-DR Molecules. <i>PLoS ONE</i> , 2007, 2, e1348.	2.5	14
150	Island may not save the information paradox of Liouville black holes. <i>Physical Review D</i> , 2021, 104, .	4.7	14
151	Funneled potential and flux landscapes dictate the stabilities of both the states and the flow: Fission yeast cell cycle. <i>PLoS Computational Biology</i> , 2017, 13, e1005710.	3.2	13
152	Quantifying the flux as the driving force for nonequilibrium dynamics and thermodynamics in non-Michaelis-Menten enzyme kinetics. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 923-930.	7.1	13
153	Charge Interactions Modulate the Encounter Complex Ensemble of Two Differently Charged Disordered Protein Partners of KIX. <i>Journal of Chemical Theory and Computation</i> , 2020, 16, 3856-3868.	5.3	13
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