

Javier Buceta

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/8038546/publications.pdf>

Version: 2024-02-01

62
papers

1,498
citations

318942

23
h-index

388640

36
g-index

68
all docs

68
docs citations

68
times ranked

1740
citing authors

#	ARTICLE	IF	CITATIONS
1	A quantitative biophysical principle to explain the 3D cellular connectivity in curved epithelia. <i>Cell Systems</i> , 2022, 13, 631-643.e8.	2.9	8
2	The complex three-dimensional organization of epithelial tissues. <i>Development (Cambridge)</i> , 2021, 148, .	1.2	24
3	Mechanics and self-organization in tissue development. <i>Seminars in Cell and Developmental Biology</i> , 2021, 120, 147-159.	2.3	13
4	<i>Mycobacterium</i> Phage Butters-Encoded Proteins Contribute to Host Defense against Viral Attack. <i>MSystems</i> , 2020, 5, .	1.7	17
5	Self-sustained planar intercalations due to mechanosignaling feedbacks lead to robust axis extension during morphogenesis. <i>Scientific Reports</i> , 2020, 10, 10973.	1.6	4
6	Mechanical coordination is sufficient to promote tissue replacement during metamorphosis in <i>Drosophila</i> . <i>EMBO Journal</i> , 2020, 39, e103594.	3.5	14
7	<i>TiFoSi</i> : an efficient tool for mechanobiology simulations of epithelia. <i>Bioinformatics</i> , 2020, 36, 4525-4526.	1.8	7
8	A Cell Segmentation/Tracking Tool Based on Machine Learning. <i>Methods in Molecular Biology</i> , 2019, 2040, 399-422.	0.4	12
9	A non-linear analysis of Turing pattern formation. <i>PLoS ONE</i> , 2019, 14, e0220994.	1.1	10
10	Scutoids: Understanding the 3D Packing of Curved Epithelia. <i>Biophysical Journal</i> , 2019, 116, 122a-123a.	0.2	0
11	Differentiation of live and heat-killed <i>E. coli</i> by microwave impedance spectroscopy. <i>Sensors and Actuators B: Chemical</i> , 2018, 255, 1614-1622.	4.0	41
12	A Predictive Spatial Distribution Framework for Filovirus-Infected Bats. <i>Scientific Reports</i> , 2018, 8, 7970.	1.6	7
13	A Markovian Approach towards Bacterial Size Control and Homeostasis in Anomalous Growth Processes. <i>Scientific Reports</i> , 2018, 8, 9612.	1.6	6
14	Scutoids are a geometrical solution to three-dimensional packing of epithelia. <i>Nature Communications</i> , 2018, 9, 2960.	5.8	98
15	Under Pressure: Mechanosensitivity Properties of the Bacterial Divisome. <i>Biophysical Journal</i> , 2017, 112, 535a-536a.	0.2	0
16	Finite cell-size effects on protein variability in Turing patterned tissues. <i>Journal of the Royal Society Interface</i> , 2017, 14, 20170316.	1.5	7
17	Modeling the Ebola zoonotic dynamics: Interplay between enviroclimatic factors and bat ecology. <i>PLoS ONE</i> , 2017, 12, e0179559.	1.1	24
18	The cellular Ising model: a framework for phase transitions in multicellular environments. <i>Journal of the Royal Society Interface</i> , 2016, 13, 20151092.	1.5	13

#	ARTICLE	IF	CITATIONS
19	Stochastic Effects in Quorum Sensing. Biological and Medical Physics Series, 2015, , 19-52.	0.3	0
20	Sonic Hedgehog Signaling Switches the Mode of Division in the Developing Nervous System. Cell Reports, 2013, 4, 492-503.	2.9	93
21	Dynamics of the quorum sensing switch: stochastic and non-stationary effects. BMC Systems Biology, 2013, 7, 6.	3.0	53
22	Interplay of cytoskeletal activity and lipid phase stability in dynamic protein recruitment and clustering. Scientific Reports, 2013, 3, 2608.	1.6	33
23	Stochastic Stabilization of Phenotypic States: The Genetic Bistable Switch as a Case Study. PLoS ONE, 2013, 8, e73487.	1.1	26
24	Noise regulation by quorum sensing in low mRNA copy number systems. BMC Systems Biology, 2011, 5, 11.	3.0	16
25	Dynamics and Mechanical Stability of the Developing Dorsal Organizer of the Wing Imaginal Disc. PLoS Computational Biology, 2011, 7, e1002153.	1.5	32
26	Direct mapping of nanoscale compositional connectivity on intact cell membranes. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 15437-15442.	3.3	95
27	PATTERN FORMATION IN NONEQUILIBRIUM LIPID MEMBRANES: FROM MEMBRANE UNDULATIONS TO LIPID RAFTS. Biophysical Reviews and Letters, 2010, 05, 1-34.	0.9	3
28	Interplay between Intrinsic Noise and the Stochasticity of the Cell Cycle in Bacterial Colonies. Biophysical Journal, 2010, 98, 2459-2468.	0.2	11
29	Noise-Induced Coherence in Multicellular Circadian Clocks. Biophysical Journal, 2009, 96, 3573-3581.	0.2	52
30	A Spatial Toggle Switch Drives Boundary Formation in Development. Biophysical Journal, 2008, 95, 5111-5120.	0.2	8
31	Phase separation in three-component lipid membranes: From Monte Carlo simulations to Ginzburg-Landau equations. Journal of Chemical Physics, 2008, 128, 025102.	1.2	24
32	Robustness and Stability of the Gene Regulatory Network Involved in DV Boundary Formation in the Drosophila Wing. PLoS ONE, 2007, 2, e602.	1.1	31
33	Noise-induced oscillatory behavior in field-dependent relaxational dynamics. Physical Review E, 2006, 73, 042101.	0.8	3
34	Comprehensive study of pattern formation in relaxational systems. Physical Review E, 2006, 73, 022101.	0.8	18
35	Nonequilibrium patterns and shape fluctuations in reactive membranes. Physical Review E, 2005, 71, 051906.	0.8	30
36	Generation of dynamic structures in nonequilibrium reactive bilayers. Physical Review E, 2005, 72, 051921.	0.8	17

#	ARTICLE	IF	CITATIONS
37	Comments on the Article "The Universal Dynamics of Tumor Growth" by A. Br�� et al.. Biophysical Journal, 2005, 88, 3734-3736.	0.2	18
38	Nodal Cilia Dynamics and the Specification of the Left/Right Axis in Early Vertebrate Embryo Development. Biophysical Journal, 2005, 89, 2199-2209.	0.2	64
39	Extinction in population dynamics. Physical Review E, 2004, 69, 021908.	0.8	39
40	Comprehensive study of phase transitions in relaxational systems with field-dependent coefficients. Physical Review E, 2004, 69, 011102.	0.8	23
41	Effects of internal fluctuations on the spreading of Hantavirus. Physical Review E, 2004, 70, 061907.	0.8	7
42	Outbreaks of Hantavirus induced by seasonality. Physical Review E, 2004, 69, 021906.	0.8	29
43	RATCHETS IN HOMOGENEOUS EXTENDED SYSTEMS: INTERNAL MODES AND THE ROLE OF NOISE. Fluctuation and Noise Letters, 2004, 04, L571-L584.	1.0	2
44	Phase transitions in relaxational systems with field-dependent coefficients. , 2004, , .		0
45	Habitat size and extinction in population dynamics. , 2004, , .		0
46	Ratchets in homogeneous extended systems: internal modes and the role of noise. , 2004, , .		0
47	Effects of seasonality and of internal fluctuations on the spreading of Hantavirus. , 2004, , .		1
48	Patterns in reaction-diffusion systems generated by global alternation of dynamics. Physica A: Statistical Mechanics and Its Applications, 2003, 325, 230-242.	1.2	18
49	Noise-driven mechanism for pattern formation. Physical Review E, 2003, 67, 021113.	0.8	60
50	Spatial patterns induced purely by dichotomous disorder. Physical Review E, 2003, 68, 011103.	0.8	17
51	Dynamics of two granules. Physical Review E, 2003, 68, 021303.	0.8	12
52	Dynamical scaling analysis of plant callus growth. Europhysics Letters, 2003, 63, 83-89.	0.7	23
53	Pattern formation induced by nonequilibrium global alternation of dynamics. Physical Review E, 2002, 66, 036216.	0.8	23
54	Switching-induced Turing instability. Physical Review E, 2002, 66, 046202.	0.8	33

#	ARTICLE	IF	CITATIONS
55	Random Ginzburg-Landau model revisited: Reentrant phase transitions. Physical Review E, 2001, 63, 031103.	0.8	9
56	Stationary and Oscillatory Spatial Patterns Induced by Global Periodic Switching. Physical Review Letters, 2001, 88, 024103.	2.9	49
57	Is Tsallis Thermodynamics Nonextensive?. Physical Review Letters, 2001, 88, 020601.	2.9	44
58	Negative resistance and anomalous hysteresis in a collective molecular motor. Physical Review E, 2000, 61, 6287-6293.	0.8	48
59	Finite resolution effects in the analysis of the scaling behavior of rough surfaces. Physical Review E, 2000, 61, 6015-6018.	0.8	7
60	Small scale properties of the stochastic stabilized Kuramoto-Sivashinsky equation. Physica D: Nonlinear Phenomena, 1998, 113, 166-171.	1.3	5
61	The stochastic stabilized Kuramoto-Sivashinsky equation: a model for compact electrodeposition growth. Physics Letters, Section A: General, Atomic and Solid State Physics, 1997, 235, 464-468.	0.9	8
62	Noise-induced spatial patterns. Physica A: Statistical Mechanics and Its Applications, 1996, 224, 153-161.	1.2	102