

Zi Chen

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/443652/publications.pdf>

Version: 2024-02-01

100
papers

5,082
citations

147786

31
h-index

95259

68
g-index

103
all docs

103
docs citations

103
times ranked

8213
citing authors

#	ARTICLE	IF	CITATIONS
1	Modeling Physiological Events in 2D vs. 3D Cell Culture. <i>Physiology</i> , 2017, 32, 266-277.	3.1	1,069
2	Dynamic Visualization of Thrombopoiesis Within Bone Marrow. <i>Science</i> , 2007, 317, 1767-1770.	12.6	572
3	Theoretical analysis of the evolution from ignition kernel to flame ball and planar flame. <i>Combustion Theory and Modelling</i> , 2007, 11, 427-453.	1.9	189
4	Neonatal Fc receptor for IgG (FcRn) regulates cross-presentation of IgG immune complexes by CD8 ⁺ CD11b ⁺ dendritic cells. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2011, 108, 9927-9932.	7.1	187
5	Comprehensive circular RNA profiling reveals the regulatory role of the circRNA-100338/miR-141-3p pathway in hepatitis B-related hepatocellular carcinoma. <i>Scientific Reports</i> , 2017, 7, 5428.	3.3	186
6	Design of Nanoparticle-Based Carriers for Targeted Drug Delivery. <i>Journal of Nanomaterials</i> , 2016, 2016, 1-15.	2.7	177
7	Effects of compression and stretch on the determination of laminar flame speeds using propagating spherical flames. <i>Combustion Theory and Modelling</i> , 2009, 13, 343-364.	1.9	148
8	Multifunctional nanoplatforams for subcellular delivery of drugs in cancer therapy. <i>Progress in Materials Science</i> , 2020, 107, 100599.	32.8	138
9	Dimeric Drug Polymeric Micelles with Acid-Active Tumor Targeting and FRET-Traceable Drug Release. <i>Advanced Materials</i> , 2018, 30, 1705436.	21.0	119
10	Recombinant virus vaccine-induced SIV-specific CD8 ⁺ cytotoxic T lymphocytes. <i>Science</i> , 1991, 252, 440-443.	12.6	111
11	Nonlinear Geometric Effects in Mechanical Bistable Morphing Structures. <i>Physical Review Letters</i> , 2012, 109, 114302.	7.8	107
12	Mechanical Self-Assembly of a Strain-Engineered Flexible Layer: Wrinkling, Rolling, and Twisting. <i>Physical Review Applied</i> , 2016, 5, .	3.8	100
13	Fast nastic motion of plants and bioinspired structures. <i>Journal of the Royal Society Interface</i> , 2015, 12, 20150598.	3.4	95
14	Tunable helical ribbons. <i>Applied Physics Letters</i> , 2011, 98, .	3.3	93
15	Flexible piezoelectric nanogenerators using metal-doped ZnO-PVDF films. <i>Sensors and Actuators A: Physical</i> , 2020, 305, 111912.	4.1	91
16	Computational models for mechanics of morphogenesis. <i>Birth Defects Research Part C: Embryo Today Reviews</i> , 2012, 96, 132-152.	3.6	81
17	Carbon nanotube-composite hydrogels promote intercalated disc assembly in engineered cardiac tissues through β 1-integrin mediated FAK and RhoA pathway. <i>Acta Biomaterialia</i> , 2017, 48, 88-99.	8.3	65
18	Cardiac energy harvesting and sensing based on piezoelectric and triboelectric designs. <i>Nano Energy</i> , 2020, 76, 105076.	16.0	63

#	ARTICLE	IF	CITATIONS
19	Differential p53-Independent Outcomes of p19 ^{Arf} Loss in Oncogenesis. <i>Science Signaling</i> , 2009, 2, ra44.	3.6	58
20	Deterministic Self-Rolling of Ultrathin Nanocrystalline Diamond Nanomembranes for 3D Tubular/Helical Architecture. <i>Advanced Materials</i> , 2017, 29, 1604572.	21.0	57
21	Vibration-Energy-Harvesting System: Transduction Mechanisms, Frequency Tuning Techniques, and Biomechanical Applications. <i>Advanced Materials Technologies</i> , 2019, 4, 1900177.	5.8	56
22	A NaCl-regulated plant gene encoding a brain protein homolog that activates ADP ribosyltransferase and inhibits protein kinase C. <i>Plant Journal</i> , 1994, 6, 729-740.	5.7	54
23	Akt Phosphorylates the Transcriptional Repressor Bmi1 to Block Its Effects on the Tumor-Suppressing Ink4a-Arf Locus. <i>Science Signaling</i> , 2012, 5, ra77.	3.6	53
24	In vivo cardiac power generation enabled by an integrated helical piezoelectric pacemaker lead. <i>Nano Energy</i> , 2019, 66, 104085.	16.0	53
25	Shape selection and multi-stability in helical ribbons. <i>Applied Physics Letters</i> , 2014, 104, .	3.3	51
26	Identification of Wee1 as a novel therapeutic target for mutant RAS-driven acute leukemia and other malignancies. <i>Leukemia</i> , 2015, 29, 27-37.	7.2	51
27	Stretchable Kirigami Polyvinylidene Difluoride Thin Films for Energy Harvesting: Design, Analysis, and Performance. <i>Physical Review Applied</i> , 2018, 9, .	3.8	46
28	Photodynamic Therapy With Motexafin Lutetium Induces Redox-Sensitive Apoptosis of Vascular Cells. <i>Arteriosclerosis, Thrombosis, and Vascular Biology</i> , 2001, 21, 759-764.	2.4	43
29	A novel jamming phase diagram links tumor invasion to non-equilibrium phase separation. <i>IScience</i> , 2021, 24, 103252.	4.1	43
30	Flexible Energy Harvester on a Pacemaker Lead Using Multibeam Piezoelectric Composite Thin Films. <i>ACS Applied Materials & Interfaces</i> , 2020, 12, 34170-34179.	8.0	40
31	Helical Structures Mimicking Chiral Seedpod Opening and Tendril Coiling. <i>Sensors</i> , 2018, 18, 2973.	3.8	39
32	Biomechanics of Collective Cell Migration in Cancer Progression: Experimental and Computational Methods. <i>ACS Biomaterials Science and Engineering</i> , 2019, 5, 3766-3787.	5.2	34
33	Flexible Porous Piezoelectric Cantilever on a Pacemaker Lead for Compact Energy Harvesting. <i>Advanced Materials Technologies</i> , 2019, 4, 1800148.	5.8	34
34	Nanocrystallization and magnetic properties of Fe-30 weight percent Ni alloy by surface mechanical attrition treatment. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2006, 37, 1413-1421.	2.2	31
35	Static and dynamic mechanical behaviors of gradient-nanotwinned stainless steel with a composite structure: Experiments and modeling. <i>International Journal of Plasticity</i> , 2019, 114, 272-288.	8.8	30
36	Piezoelectric Buckled Beam Array on a Pacemaker Lead for Energy Harvesting. <i>Advanced Materials Technologies</i> , 2019, 4, 1800335.	5.8	30

#	ARTICLE	IF	CITATIONS
37	A Remotely Controlled Transformable Soft Robot Based on Engineered Cardiac Tissue Construct. <i>Small</i> , 2019, 15, e1900006.	10.0	27
38	Elevated MTSS1 expression associated with metastasis and poor prognosis of residual hepatitis B-related hepatocellular carcinoma. <i>Journal of Experimental and Clinical Cancer Research</i> , 2016, 35, 85.	8.6	26
39	Multifunctional Pacemaker Lead for Cardiac Energy Harvesting and Pressure Sensing. <i>Advanced Healthcare Materials</i> , 2020, 9, e2000053.	7.6	26
40	Magneto-sensitive bistable soft actuators: Experiments, simulations, and applications. <i>Applied Physics Letters</i> , 2018, 113, .	3.3	25
41	Smart Laser-Writable Micropatterns with Multiscale Photo/Moisture Reconstructible Structure. <i>Advanced Functional Materials</i> , 2021, 31, 2009481.	14.9	24
42	Spontaneous bending of piezoelectric nanoribbons: Mechanics, polarization, and space charge coupling. <i>Journal of the Mechanics and Physics of Solids</i> , 2010, 58, 73-85.	4.8	23
43	Creation of Faceted Polyhedral Microgels from Compressed Emulsions. <i>Small</i> , 2017, 13, 1701256.	10.0	23
44	Metal-semiconductor Zn/ZnO core-shell nanocables: facile and large-scale fabrication, growth mechanism, oxidation behavior, and microwave absorption performance. <i>CrystEngComm</i> , 2015, 17, 2806-2814.	2.6	22
45	Shape formation of helical ribbons induced by material anisotropy. <i>Applied Physics Letters</i> , 2017, 110, 091901.	3.3	22
46	Attenuated short wavelength buckling and force propagation in a biopolymer-reinforced rod. <i>Soft Matter</i> , 2013, 9, 194-199.	2.7	20
47	Shape transition and multi-stability of helical ribbons: a finite element method study. <i>Archive of Applied Mechanics</i> , 2015, 85, 331-338.	2.2	20
48	Visualizing intracellular particles and precise control of drug release using an emissive hydrazone photochrome. <i>Chemical Science</i> , 2020, 11, 3016-3021.	7.4	20
49	Tunable, Flexible, and Resilient Robots Driven by an Electrostatic Actuator. <i>Advanced Intelligent Systems</i> , 2020, 2, 1900162.	6.1	20
50	Gaussian-preserved, non-volatile shape morphing in three-dimensional microstructures for dual-functional electronic devices. <i>Nature Communications</i> , 2021, 12, 509.	12.8	19
51	Modeling Bistable behaviors in Morphing Structures through Finite Element Simulations. <i>Bio-Medical Materials and Engineering</i> , 2014, 24, 557-562.	0.6	18
52	Geometric nonlinearity and mechanical anisotropy in strained helical nanoribbons. <i>Nanoscale</i> , 2014, 6, 9443-9447.	5.6	18
53	Implantable Cardiac Kirigami-Inspired Lead-Based Energy Harvester Fabricated by Enhanced Piezoelectric Composite Film. <i>Advanced Healthcare Materials</i> , 2021, 10, e2002100.	7.6	18
54	Martensite and its reverse transformation in nanocrystalline bulk Co. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2006, 438-440, 420-426.	5.6	17

#	ARTICLE	IF	CITATIONS
55	Mechanics of tunable helices and geometric frustration in biomimetic seashells. <i>Europhysics Letters</i> , 2014, 105, 64005.	2.0	16
56	A cautionary note on reaction tubes for differential display and cDNA amplification in thermal cycling. <i>BioTechniques</i> , 1994, 16, 1002-4, 1006.	1.8	16
57	PREFACE A SPECIAL SELECTION ON BIOLOGICAL MECHANICS. <i>Journal of Mechanics in Medicine and Biology</i> , 2015, 15, 1502002.	0.7	14
58	Carbon nanotube-based substrates promote cardiogenesis in brown adipose-derived stem cells via β 1-integrin-dependent TGF- β 1 signaling pathway. <i>International Journal of Nanomedicine</i> , 2016, Volume 11, 4381-4395.	6.7	14
59	Controllable Shape Changing and Tristability of Bilayer Composite. <i>ACS Applied Materials & Interfaces</i> , 2019, 11, 16881-16887.	8.0	14
60	Edge effect of strained bilayer nanofilms for tunable multistability and actuation. <i>Nanoscale</i> , 2017, 9, 2958-2962.	5.6	13
61	Tunable Buckled Beams with Mesoporous PVDF-TrFE/SWCNT Composite Film for Energy Harvesting. <i>ACS Applied Materials & Interfaces</i> , 2018, 10, 33516-33522.	8.0	13
62	Tunable bistability of a clamped elastic beam. <i>Extreme Mechanics Letters</i> , 2020, 34, 100603.	4.1	13
63	Functional Adhesion of Pectin Biopolymers to the Lung Visceral Pleura. <i>Polymers</i> , 2021, 13, 2976.	4.5	13
64	Drug Delivery: Dimeric Drug Polymeric Micelles with Acid-Active Tumor Targeting and FRET-Traceable Drug Release (<i>Adv. Mater.</i> 3/2018). <i>Advanced Materials</i> , 2018, 30, 1870020.	21.0	12
65	Dislocation climb strengthening in systems with immobile obstacles: Three-dimensional level-set simulation study. <i>Physical Review B</i> , 2010, 81, .	3.2	11
66	Skin-like Elastomer Embedded Zinc Oxide Nanoarrays for Biomechanical Energy Harvesting. <i>Advanced Materials Interfaces</i> , 2021, 8, 2100094.	3.7	11
67	Biomaterial-Assisted Anastomotic Healing: Serosal Adhesion of Pectin Films. <i>Polymers</i> , 2021, 13, 2811.	4.5	11
68	FINITE ELEMENT SIMULATIONS ON MECHANICAL SELF-ASSEMBLY OF BIOMIMETIC HELICAL STRUCTURES. <i>Journal of Mechanics in Medicine and Biology</i> , 2013, 13, 1340018.	0.7	10
69	Understanding transport of an elastic, spherical particle through a confining channel. <i>Applied Physics Letters</i> , 2020, 116, .	3.3	9
70	Bistability in popper-like shells programmed by geometric defects. <i>Extreme Mechanics Letters</i> , 2021, 42, 101065.	4.1	9
71	How the embryonic chick brain twists. <i>Journal of the Royal Society Interface</i> , 2016, 13, 20160395.	3.4	8
72	Fabrication of monodisperse magnetic nanorods for improving hyperthermia efficacy. <i>Journal of Nanobiotechnology</i> , 2021, 19, 63.	9.1	8

#	ARTICLE	IF	CITATIONS
73	Extracellular Assembly of the Elastin Cable Line Element in the Developing Lung. <i>Anatomical Record</i> , 2017, 300, 1670-1679.	1.4	7
74	Programmable 3D Self-Folding Structures with Strain Engineering. <i>Advanced Intelligent Systems</i> , 2020, 2, 2000101.	6.1	7
75	The evaluation of reverse shoulder lateralization on deltoid forces and scapular fracture risk: A computational study. <i>Medicine in Novel Technology and Devices</i> , 2021, 11, 100076.	1.6	7
76	What's new about the mechanism of methotrexate action in psoriasis?. <i>British Journal of Dermatology</i> , 2018, 179, 818-819.	1.5	6
77	Energy Harvesting: Flexible Porous Piezoelectric Cantilever on a Pacemaker Lead for Compact Energy Harvesting (<i>Adv. Mater. Technol.</i> 1/2019). <i>Advanced Materials Technologies</i> , 2019, 4, 1970002.	5.8	6
78	Structural evolution and stability of mechanically alloyed Fe-Ni nanocrystalline. <i>Central South University</i> , 2005, 12, 389-392.	0.5	5
79	Residual Stresses and Poisson's Effect Drive Shape Formation and Transition of Helical Structures. <i>Journal of Elasticity</i> , 2015, 119, 321-333.	1.9	5
80	Voltage-actuated snap-through in bistable piezoelectric thin films: a computational study. <i>Smart Materials and Structures</i> , 2019, 28, 085021.	3.5	5
81	Programmable 3D Self-Folding Structures with Strain Engineering. <i>Advanced Intelligent Systems</i> , 2020, 2, 2070121.	6.1	5
82	Generation, Transmission, and Regulation of Mechanical Forces in Embryonic Morphogenesis. <i>Small</i> , 2021, , 2103466.	10.0	5
83	Optical and Mechanical Properties of Self-Repairing Pectin Biopolymers. <i>Polymers</i> , 2022, 14, 1345.	4.5	5
84	Buckling shape transition of an embedded thin elastic rod after failure of surrounding elastic medium. <i>Extreme Mechanics Letters</i> , 2017, 15, 51-56.	4.1	4
85	Buckling and post-buckling of an elastic rod embedded in a bilayer matrix. <i>Extreme Mechanics Letters</i> , 2018, 25, 1-6.	4.1	3
86	Flexible Electrostatic Transducers for Wearable Haptic Communication*. , 2019, , .		3
87	Comment on shear-rotation mechanism for martensitic transformations. <i>Progress in Natural Science: Materials International</i> , 2004, 14, 917-921.	4.4	2
88	On the determination of shear angle in martensitic transformations. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2007, 457, 380-384.	5.6	2
89	Diamond Nanomembranes: Deterministic Self-Rolling of Ultrathin Nanocrystalline Diamond Nanomembranes for 3D Tubular/Helical Architecture (<i>Adv. Mater.</i> 13/2017). <i>Advanced Materials</i> , 2017, 29, .	21.0	1
90	Missing-in-metastasis B (MIM-B) combined with caveolin-1 promotes metastasis of hepatocellular carcinoma. <i>Oncotarget</i> , 2017, 8, 95450-95465.	1.8	1

#	ARTICLE	IF	CITATIONS
91	Biomechanical Energy Harvester: Skin-like Elastomer Embedded Zinc Oxide Nanoarrays for Biomechanical Energy Harvesting (Adv. Mater. Interfaces 10/2021). Advanced Materials Interfaces, 2021, 8, 2170057.	3.7	1
92	Multi-shape-changing interpenetrating networks with shape memory effect and adaptive plastic deformations. Applied Materials Today, 2021, 25, 101246.	4.3	1
93	Engineering shapes and instability in thin structures: Towards self-assembling micro-robots. , 2013, , .		0
94	Residual Stresses and Poisson's Effect Drive Shape Formation and Transition of Helical Structures. , 2016, , 321-333.		0
95	Probing the Roles of Physical Forces in Early Chick Embryonic Morphogenesis. Journal of Visualized Experiments, 2018, , .	0.3	0
96	Intelligent Biohybrid Robotic Systems: A Remotely Controlled Transformable Soft Robot Based on Engineered Cardiac Tissue Construct (Small 18/2019). Small, 2019, 15, 1970095.	10.0	0
97	Porosity-Tunable Structures with "Fossilized" Bubbles. ACS Applied Polymer Materials, 2020, 2, 497-504.	4.4	0
98	Flexible electrostatic transducer array with displacement control for haptic sensing and actuation. Sensors and Actuators A: Physical, 2021, 317, 112452.	4.1	0
99	Kinetics of Plant-derived Heteropolysaccharide Bioabsorption Characterized by Fluorescence-based Microfluidics System. FASEB Journal, 2022, 36, .	0.5	0
100	Structural Heteropolysaccharide Adhesion to the Corneal Glycocalyx. FASEB Journal, 2022, 36, .	0.5	0