Jinxinag Chen

List of Publications by Year
in descending order

83 papers	1,680 citations	331259 21 h-index	344852 36 g-index
83 all docs	83 docs citations	83 times ranked	827 citing authors

#	Article	IF	Citations
1	Research progress of curved plates in China. I: Classification and forming methods. Proceedings of the Institution of Civil Engineers: Structures and Buildings, 2022, 175, 58-73.	0.4	5
2	A new type of bionic grid plateâ€"The compressive deformation and mechanical properties of the grid beetle elytron plate. Journal of Sandwich Structures and Materials, 2022, 24, 321-336.	2.0	14
3	Analysis of the convective heat transfer and equivalent thermal conductivity of functional paper honeycomb wall plates. Experimental Heat Transfer, 2022, 35, 577-590.	2.3	5
4	Extraction and reconstruction of a beetle forewing cross-section point set and its curvature characteristics. Pattern Analysis and Applications, 2022, 25, 77-87.	3.1	6
5	Research Progress on Curved Plates in China: Applications in Architecture. Applied Sciences (Switzerland), 2022, 12, 550.	1.3	5
6	Research progress on curved plates in China: Mechanical analysis methods and load-bearing behaviours. Structures, 2022, 39, 793-807.	1.7	2
7	A Box-Girder Bridge Inspired by Beetle Elytra and the Buckling and Shear Properties of a Trabecular-Honeycomb Steel Web. Journal of Bridge Engineering, 2022, 27, .	1.4	2
8	Review of carbon fiber-reinforced sandwich structures. Polymers and Polymer Composites, 2022, 30, 096739112210987.	1.0	3
9	Large-scale comparative review and assessment of computational methods for anti-cancer peptide identification. Briefings in Bioinformatics, 2021, 22, .	3.2	40
10	Computational prediction and interpretation of both general and specific types of promoters in <i>Escherichia coli</i> by exploiting a stacked ensemble-learning framework. Briefings in Bioinformatics, 2021, 22, 2126-2140.	3.2	58
11	Effect of the length of basalt fibers on the shear mechanical properties of the core structure of biomimetic fully integrated honeycomb plates. Journal of Sandwich Structures and Materials, 2021, 23, 1527-1540.	2.0	8
12	DeepTorrent: a deep learning-based approach for predicting DNA N4-methylcytosine sites. Briefings in Bioinformatics, 2021, 22, .	3.2	84
13	Influence of the Chamfer on the Flexural Properties of Beetle Elytron Plates. Journal of Bionic Engineering, 2021, 18, 138-149.	2.7	3
14	The compressive property of a fiberâ€reinforced resin beetle elytron plate and its influence mechanism. Journal of Applied Polymer Science, 2021, 138, 50692.	1.3	2
15	Influence Mechanism of the Trabecular and Chamfer Radii on the Three-point Bending Properties of Trabecular Beetle Elytron Plates. Journal of Bionic Engineering, 2021, 18, 409-418.	2.7	5
16	Numerical and analytical study on the mechanical properties of a connector with long-fiber and metal laminated bolts for prefabricated construction. Advances in Structural Engineering, 2021, 24, 2885-2897.	1.2	0
17	Heat transfer characteristics of straw-core paper honeycomb plates (beetle elytron plates) I: Experimental study on horizontal placement with hot-above and cold-below conditions. Applied Thermal Engineering, 2021, 194, 117095.	3.0	5
18	Porpoise: a new approach for accurate prediction of RNA pseudouridine sites. Briefings in Bioinformatics, 2021, 22, .	3.2	39

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19	Heat transfer characteristics of straw-core paper honeycomb plates II: Heat transfer mechanism with hot-above and cold-below conditions. Applied Thermal Engineering, 2021, 195, 117165.	3.0	4
20	The 3D lightweight structural characteristics of the beetle forewing: Verification. Structures, 2021, 33, 2943-2949.	1.7	3
21	The calculation of in-plane equivalent elastic parameters of a grid beetle elytra plate core. Mechanics of Materials, 2021, 161, 103999.	1.7	8
22	Relation between the geometric parameters and the composite heat transfer of paper honeycomb plates under cold-above/hot-below conditions and the corresponding influence mechanism. Journal of Building Engineering, 2021, 43, 102582.	1.6	2
23	Flexural properties and failure mechanism of 3D-printed grid beetle elytron plates. International Journal of Mechanical Sciences, 2021, 210, 106737.	3.6	16
24	The effect of trabecular chamfers on the compressive ductility of beetle elytron plates. Mechanics of Materials, 2021, 163, 104093.	1.7	5
25	BigFiRSt: A Software Program Using Big Data Technique for Mining Simple Sequence Repeats From Large-Scale Sequencing Data. Frontiers in Big Data, 2021, 4, 727216.	1.8	2
26	Influence of honeycomb dimensions and forming methods on the compressive properties of beetle elytron plates. Journal of Sandwich Structures and Materials, 2020, 22, 28-39.	2.0	22
27	The compressive properties and strengthening mechanism of the middle-trabecular beetle elytron plate. Journal of Sandwich Structures and Materials, 2020, 22, 948-961.	2.0	21
28	Shear mechanical properties of the core structure of biomimetic fully integrated honeycomb plates. Journal of Sandwich Structures and Materials, 2020, 22, 1184-1198.	2.0	4
29	DeepCleave: a deep learning predictor for caspase and matrix metalloprotease substrates and cleavage sites. Bioinformatics, 2020, 36, 1057-1065.	1.8	102
30	Vibration properties and transverse shear characteristics of multibody molded beetle elytron plates. Science China Technological Sciences, 2020, 63, 2584-2592.	2.0	7
31	Optimization of the Structural Parameters of the Vertical Trabeculae Beetle Elytron Plate Based on the Mechanical and Thermal Insulation Properties. KSCE Journal of Civil Engineering, 2020, 24, 3765-3774.	0.9	6
32	The flexural property and its synergistic mechanism of multibody molded beetle elytron plates. Science China Technological Sciences, 2020, 63, 768-776.	2.0	11
33	Characteristics of compressive mechanical properties and strengthening mechanism of 3D-printed grid beetle elytron plates. Journal of Materials Science, 2020, 55, 8541-8552.	1.7	23
34	Experimental verification and optimization research on the energy absorption abilities of beetle elytron plate crash boxes. Materials Research Express, 2019, 6, 1165e2.	0.8	7
35	The flexural properties of end-trabecular beetle elytron plates and their flexural failure mechanism. Journal of Materials Science, 2019, 54, 8414-8425.	1.7	36
36	Beetle elytron plate and the synergistic mechanism of a trabecular-honeycomb core structure. Science China Technological Sciences, 2019, 62, 87-93.	2.0	54

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37	Effects of changes in the structural parameters of bionic straw sandwich concrete beetle elytron plates on their mechanical and thermal insulation properties. Journal of the Mechanical Behavior of Biomedical Materials, 2019, 90, 217-225.	1.5	14
38	Experimental and numerical study on the energy absorption abilities of trabecularâ€“honeycomb biomimetic structures inspired by beetle elytra. Journal of Materials Science, 2019, 54, 2193-2204.	1.7	61
39	Characteristics of the shear mechanical properties and the influence mechanism of short basalt fiber reinforced polymer composite materials. Journal of Sandwich Structures and Materials, 2019, 21, 1520-1534.	2.0	8
40	Experimental study of the edgewise compressive mechanical properties of biomimetic fully integrated honeycomb plates. Journal of Sandwich Structures and Materials, 2019, 21, 2735-2750.	2.0	10
41	Compression properties of metal beetle elytron plates and the elementary unit of the trabecular-honeycomb core structure. Journal of Sandwich Structures and Materials, 2019, 21, 2031-2041.	2.0	24
42	Shear test method for and mechanical characteristics of short basalt fiber reinforced polymer composite materials. Journal of Applied Polymer Science, 2018, 135, 46078.	1.3	7
43	Progress of research into cotton straw and corn straw cement-based building materials in China. Advances in Cement Research, 2018, 30, 93-102.	0.7	10
44	Review of the pretreatment methods for wheat straw building materials. Journal of Reinforced Plastics and Composites, 2018, 37, 35-48.	1.6	18
45	Research progress of wheat straw and rice straw cement-based building materials in China. Magazine of Concrete Research, 2018, 70, 84-95.	0.9	26
46	Biomimetic research on beetle forewings in twenty years: Internal structure, model and integrated honeycomb plates. Zhongguo Kexue Jishu Kexue/Scientia Sinica Technologica, 2018, 48, 701-718.	0.3	7
47	Review of the Characteristic Curves of Silkworm Cocoon Hot Air Dryingand Its Technological Configuration. Fibres and Textiles in Eastern Europe, 2018, 26, 20-28.	0.2	0
48	A Fractional-Order Generalized Thermoelastic Problem of a Bilayer Piezoelectric Plate for Vibration Control. Journal of Heat Transfer, 2017, 139, .	1.2	9
49	Structural characteristics of the core layer and biomimetic model of the ladybug forewing. Micron, 2017, 101, 156-161.	1.1	10
50	The beetle elytron plate: a lightweight, high-strength and buffering functional-structural bionic material. Scientific Reports, 2017, 7, 4440.	1.6	53
51	The deformation mode and strengthening mechanism of compression in the beetle elytron plate. Materials and Design, 2017, 131, 481-486.	3.3	60
52	The 3D lightweight structural characteristics of the beetle forewing. Materials Science and Engineering C, 2017, 71, 1347-1351.	3.8	15
53	Suitability of Printing Materials for Heat-Induced Inkless Eco-Printing. Journal of Wood Chemistry and Technology, 2016, 36, 129-139.	0.9	1
54	Characteristics of the tensile mechanical properties of fresh and dry forewings of beetles. Materials Science and Engineering C, 2016, 65, 51-58.	3.8	14

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55	Non-hollow-core Cybister trabeculae and compressive properties of two biomimetic models of beetle forewings. Materials Science and Engineering C, 2016, 69, 933-940.	3.8	10
56	The influence mechanism of processing holes on the flexural properties of biomimetic integrated honeycomb plates. Materials Science and Engineering C, 2016, 69, 798-803.	3.8	15
57	Compressive failure modes and parameter optimization of the trabecular structure of biomimetic fully integrated honeycomb plates. Materials Science and Engineering C, 2016, 69, 255-261.	3.8	27
58	Simulated effect on the compressive and shear mechanical properties of bionic integrated honeycomb plates. Materials Science and Engineering C, 2015, 50, 286-293.	3.8	15
59	The influence of processing holes on the flexural properties of biomimetic integrated honeycomb plates. Materials and Design, 2015, 86, 404-410.	3.3	12
60	Review of beetle forewing structures and their biomimetic applications in China: (II) On the three-dimensional structure, modeling and imitation. Materials Science and Engineering C, 2015, 55, 620-633.	3.8	69
61	A review of the mechanical properties of beetle elytra and development of the biomimetic honeycomb plates. Journal of Sandwich Structures and Materials, 2015, 17, 399-416.	2.0	12
62	Review of beetle forewing structures and their biomimetic applications in China: (I) On the structural colors and the vertical and horizontal cross-sectional structures. Materials Science and Engineering C, 2015, 55, 605-619.	3.8	54
63	The Microstructure of Paper after Heat-Induced Inkless Eco-Printing and its Features. Journal of Wood Chemistry and Technology, 2014, 34, 202-210.	0.9	5
64	Technological Parameters and Design of Bionic Integrated Honeycomb Plates. Journal of Bionic Engineering, 2014, 11, 134-143.	2.7	14
65	Compressive and flexural properties of biomimetic integrated honeycomb plates. Materials & Design, 2014, 64, 214-220.	5.1	50
66	Pyrolysis volatiles and environmental impacts of printing paper in air. Cellulose, 2014, 21, 2871-2878.	2.4	6
67	Enhancement of the Mechanical Properties of Basalt Fiber-Wood-Plastic Composites via Maleic Anhydride Grafted High-Density Polyethylene (MAPE) Addition. Materials, 2013, 6, 2483-2496.	1.3	46
68	Beetle forewings: Epitome of the optimal design for lightweight composite materials. Carbohydrate Polymers, 2013, 91, 659-665.	5.1	53
69	A study of the residual stress and its influence on tensile behaviors of fiber-reinforced SiC/Al composite. Advanced Composite Materials, 2013, 22, 255-263.	1.0	6
70	Integrated honeycomb technology motivated by the structure of beetle forewings. Materials Science and Engineering C, 2012, 32, 1813-1817.	3.8	68
71	Concept of heat-induced inkless eco-printing. Carbohydrate Polymers, 2012, 89, 849-853.	5.1	9
72	Integrated honeycomb structure of a beetle forewing and its imitation. Materials Science and Engineering C, 2012, 32, 613-618.	3.8	57

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73	Basic study of biomimetic composite materials in the forewings of beetles. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2008, 483-484, 625-628.	2.6	21
74	Lightweight composite structures in the forewings of beetles. Composite Structures, 2007, 79, 331-337.	3.1	57
75	Optimal composite structures in the forewings of beetles. Composite Structures, 2007, 81, 432-437.	3.1	36
76	Effect of the Cross-Sectional In-Plane Crystal Orientation on the Structural Strength of Single-Crystal Turbine Vanes. Zairyo/Journal of the Society of Materials Science, Japan, 2006, 55, 432-437.	0.1	2
77	Failure Type of Trabecular Root and Its Model Analysis in a Beetle Fore-Wing.. Nihon Kikai Gakkai Ronbunshu, A Hen/Transactions of the Japan Society of Mechanical Engineers, Part A, 2002, 68, 364-370.	0.2	11
78	Interlaminar Reinforcement Mechanism in a Beetle Fore-Wing.. Nihon Kikai Gakkai Ronbunshu, A Hen/Transactions of the Japan Society of Mechanical Engineers, Part A, 2001, 67, 273-279.	0.2	10
79	Interlaminar Reinforcement Mechanism in a Beetle Fore-Wing. JSME International Journal Series C-Mechanical Systems Machine Elements and Manufacturing, 2001, 44, 1111-1116.	0.3	13
80	Composite Materials. Laminated Structure and Its Mechanical Properties of the Fore-Wing of Beetle.. Zairyo/Journal of the Society of Materials Science, Japan, 2001, 50, 455-460.	0.1	14
81	Cross Sectional Structure and Its Optimality of the Fore-Wing of Beetles.. Zairyo/Journal of the Society of Materials Science, Japan, 2000, 49, 407-412.	0.1	19
82	In-plane stiffness of precast monolithic floor composite structures. Proceedings of the Institution of Civil Engineers: Structures and Buildings, 0, , 1-12.	0.4	1
83	Structural and Thermal Performance of a Novel Form of Cladding Panel: the I-beam Beetle Elytron Plate. Proceedings of the Institution of Civil Engineers: Structures and Buildings, 0, , 1-33.	0.4	2