Yong Lu

List of Publications by Year
in descending order

71 papers	2,417 citations	201385 27 h-index	205818 48 g-index
72 all docs	72 docs citations	72 times ranked	1629 citing authors

#	Article	IF	Citations
1	Evaluation of typical concrete material models used in hydrocodes for high dynamic response simulations. International Journal of Impact Engineering, 2009, 36, 132-146.	2.4	229
2	Sensitivity of PZT Impedance Sensors for Damage Detection of Concrete Structures. Sensors, 2008, 8, 327-346.	2.1	182
3	Mesoscopic analysis of concrete under excessively high strain rate compression and implications on interpretation of test data. International Journal of Impact Engineering, 2012, 46, 41-55.	2.4	143
4	Modelling of dynamic behaviour of concrete materials under blast loading. International Journal of Solids and Structures, 2004, 41, 131-143.	1.3	121
5	3D mesoscale finite element modelling of concrete. Computers and Structures, 2017, 192, 96-113.	2.4	121
6	Modifications of RHT material model for improved numerical simulation of dynamic response of concrete. International Journal of Impact Engineering, 2010, 37, 1072-1082.	2.4	100
7	A three-phase soil model for simulating stress wave propagation due to blast loading. International Journal for Numerical and Analytical Methods in Geomechanics, 2004, 28, 33-56.	1.7	86
8	A novel time-domain auto-regressive model for structural damage diagnosis. Journal of Sound and Vibration, 2005, 283, 1031-1049.	2.1	86
9	Experimental investigation of beam-to-tubular column moment connections under column removal scenario. Journal of Constructional Steel Research, 2013, 88, 244-255.	1.7	77
10	Numerical prediction of blast-induced stress wave from large-scale underground explosion. International Journal for Numerical and Analytical Methods in Geomechanics, 2004, 28, 93-109.	1.7	70
11	Effect of beam web bolt arrangement on catenary behaviour of moment connections. Journal of Constructional Steel Research, 2015, 104, 22-36.	1.7	68
12	Experimental study of concrete filled cold-formed steel tubular stub columns. Journal of Constructional Steel Research, 2017, 134, 17-27.	1.7	57
13	Analysis of Dynamic Response of Concrete Using a Mesoscale Model Incorporating 3D Effects. International Journal of Protective Structures, 2010, 1, 197-217.	1.4	54
14	Numerical Investigation on the Progressive Collapse Behavior of Precast Reinforced Concrete Frame Subassemblages. Journal of Performance of Constructed Facilities, 2018, 32, .	1.0	52
15	Critical Speed and Resonance Criteria of Railway Bridge Response to Moving Trains. Journal of Bridge Engineering, 2013, 18, 131-141.	1.4	50
16	A mesoscale interface approach to modelling fractures in concrete for material investigation. Construction and Building Materials, 2018, 165, 608-620.	3.2	50
17	Experimental study of prefabricated RC column-foundation assemblies with two different connection methods and using large-diameter reinforcing bars. Engineering Structures, 2020, 205, 110075.	2.6	50
18	Mesoscale modelling of concrete for static and dynamic response analysis -Part 1: model development and implementation. Structural Engineering and Mechanics, 2011, 37, 197-213.	1.0	48

#	ARTICLE	IF	CITATIONS
19	Analysis of robustness of steel frames against progressive collapse. Journal of Constructional Steel Research, 2018, 143, 264-278.	1.7	47
20	Assessment of robustness of structures: Current state of research. Frontiers of Structural and Civil Engineering, 2013, 7, 356-368.	1.2	46
21	Probabilistic Drift Limits and Performance Evaluation of Reinforced Concrete Columns. Journal of Structural Engineering, 2005, 131, 966-978.	1.7	41
22	Experimental study and associated numerical simulation of horizontally connected precast shear wall assembly. Structural Design of Tall and Special Buildings, 2016, 25, 659-678.	0.9	41
23	Numerical Investigation of Effects of Water Saturation on Blast Wave Propagation in Soil Mass. Journal of Engineering Mechanics - ASCE, 2004, 130, 551-561.	1.6	37
24	A state of the art review to enhance the industrial scale waste utilization in sustainable unfired bricks. Construction and Building Materials, 2020, 254, 119220.	3.2	36
25	Comparative Study of Seismic Behavior of Multistory Reinforced Concrete Framed Structures. Journal of Structural Engineering, 2002, 128, 169-178.	1.7	31
26	Mesoscale modelling of size effect on the evolution of fracture process zone in concrete. Engineering Fracture Mechanics, 2021, 245, 107559.	2.0	30
27	A Kalman-filter based time-domain analysis for structural damage diagnosis with noisy signals. Journal of Sound and Vibration, 2006, 297, 916-930.	2.1	29
28	Mesoscale modelling of concrete under high strain rate tension with a rate-dependent cohesive interface approach. International Journal of Impact Engineering, 2020, 139, 103500.	2.4	29
29	Numerical analysis of blast-induced liquefaction of soil. Computers and Geotechnics, 2008, 35, 196-209.	2.3	24
30	Modelling Static and Dynamic FRP-Concrete Bond Behaviour Using a Local Concrete Damage Model. Advances in Structural Engineering, 2015, 18, 45-58.	1.2	24
31	A Compact Experimentally Validated Model of Magnetorheological Fluids. Journal of Vibration and Acoustics, Transactions of the ASME, 2016, 138, .	1.0	22
32	Numerical simulation of explosion-induced soil liquefaction and its effect on surface structures. Finite Elements in Analysis and Design, 2011, 47, 1079-1090.	1.7	21
33	Analytical modeling of corroded RC columns considering flexure-shear interaction for seismic performance assessment. Bulletin of Earthquake Engineering, 2020, 18, 2165-2190.	2.3	18
34	Mesoscale modelling of concrete for static and dynamic response analysis -Part 2: numerical investigations. Structural Engineering and Mechanics, 2011, 37, 215-231.	1.0	18
35	Experimental investigation of structural response to generalized ground shock excitations. Experimental Mechanics, 2002, 42, 261-271.	1.1	17
36	Development of Pressure-Impulse Diagrams for Framed PVB-Laminated Glass Windows. Journal of Structural Engineering, 2019, 145, .	1.7	16

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37	Prediction of seismic drifts in multi-storey frames with a new storey capacity factor. Engineering Structures, 2009, 31, 345-357.	2.6	14
38	Collapse-Resisting Mechanisms of Planar Trusses Following Sudden Member Loss. Journal of Structural Engineering, 2017, 143, .	1.7	14
39	A fuzzy-random analysis model for seismic performance of framed structures incorporating structural and non-structural damage. Earthquake Engineering and Structural Dynamics, 2005, 34, 1305-1321.	2.5	13
40	Debris velocity of concrete structures subjected to explosive loading. International Journal for Numerical and Analytical Methods in Geomechanics, 2006, 30, 917-926.	1.7	13
41	Inelastic behaviour of RC wall-frame with a rocking wall and its analysis incorporating 3-D effect. Structural Design of Tall and Special Buildings, 2005, 14, 15-35.	0.9	12
42	Effects of mechanical nonlinearity of viscoelastic dampers on the seismic performance of viscoelasticlly damped structures. Soil Dynamics and Earthquake Engineering, 2021, 150, 106936.	1.9	12
43	Numerical simulation of concrete confined by transverse reinforcement. Computers and Concrete, 2011, 8, 23-41.	0.7	12
44	Flexural performance of pretensioned centrifugal spun concrete piles with combined steel strands and reinforcing bars. Structures, 2021, 34, 4467-4485.	1.7	12
45	An acceleration residual generation approach for structural damage identification. Journal of Sound and Vibration, 2009, 319, 163-181.	2.1	11
46	Corrections to â€œA Robust Stochastic Genetic Algorithm (StGA) for Global Numerical Optimizationâ€. IEEE Transactions on Evolutionary Computation, 2008, 12, 781-781.	7.5	10
47	Experimental study and analysis of inner-stiffened cold-formed SHS steel stub columns. Thin-Walled Structures, 2016, 107, 28-38.	2.7	10
48	Experimental study of lateral load behavior of Hâ€shaped precast reinforced concrete shear walls with bolted steel connections. Structural Design of Tall and Special Buildings, 2019, 28, e1663.	0.9	10
49	Simplified theoretical model for prediction of catenary action incorporating strength degradation in axially restrained beams. Engineering Structures, 2019, 191, 219-228.	2.6	10
50	Evaluation of Cross-Sectional Deformation in Pipes Using Reflection of Fundamental Guided-Waves. Journal of Engineering Mechanics - ASCE, 2022, 148, .	1.6	10
51	Dynamic increase factor (DIF) for concrete in compression and tension in FE modelling with a local concrete model. International Journal of Impact Engineering, 2022, 163, 104079.	2.4	9
52	Dynamic model updating using a combined genetic-eigensensitivity algorithm and application in seismic response prediction. Earthquake Engineering and Structural Dynamics, 2005, 34, 1149-1170.	2.5	8
53	A Comparative Study of Modelling RC Slab Response to Blast Loading with Two Typical Concrete Material Models. International Journal of Protective Structures, 2013, 4, 415-432.	1.4	8
54	Blast test and numerical simulation of point-supported glazing. Advances in Structural Engineering, 2016, 19, 1841-1854.	1.2	8

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55	A benchmark study of dynamic damage identification of plates. Proceedings of the Institution of Civil Engineers: Engineering and Computational Mechanics, 2012, 165, 103-118.	0.4	6
56	Microstructure-Based Equivalent Visco-Hyperelastic Model of Viscoelastic Damper. Journal of Engineering Mechanics - ASCE, 2022, 148, .	1.6	6
57	Modelling damage potential of high-frequency ground motions. Earthquake Engineering and Structural Dynamics, 2003, 32, 1483-1503.	2.5	5
58	Mesoscopic investigation of the dynamic tensile behaviour of concrete from spalling test and implication on interpretation of test data. International Journal of Impact Engineering, 2022, 162, 104139.	2.4	5
59	Flexural performance of pretensioned spun concrete piles reinforced with steel strands. Magazine of Concrete Research, 2022, 74, 757-777.	0.9	5
60	Selection of optimal artificial boundary condition (ABC) frequencies for structural damage identification. Journal of Sound and Vibration, 2016, 374, 245-259.	2.1	4
61	Evaluation of seismic collapse resistance of reinforced concrete frames designed with nonlinear viscous dampers. Structures, 2022, 40, 960-976.	1.7	4
62	BIM Integrated Workflow Management and Monitoring System for Modular Buildings. International Journal of 3-D Information Modeling, 2013, 2, 17-28.	0.2	3
63	Behavior of Overdeformed Shield Tunnel Lining under Grouting Treatment: Field Experiment. Journal of Performance of Constructed Facilities, 2021, 35, .	1.0	3
64	Evaluation of Seismic Damage of Multi-Storey RC Frames with Damage-Based Inelastic Spectra. Advances in Structural Engineering, 2009, 12, 529-546.	1.2	2
65	A 3-D perspective of dynamic behaviour of heterogeneous solids. EPJ Web of Conferences, 2015, 94, 04038.	0.1	2
66	Axial compression behaviour of retrofitted long timber columns. Advances in Structural Engineering, 2018, 21, 445-459.	1.2	2
67	Impact on Reinforced Concrete Structures. , 2019, , 1-24.		1
68	New Damage Identification Method for Operational Metro Tunnel Based on Perturbation Theory and Fuzzy Logic. KSCE Journal of Civil Engineering, 0, , 1.	0.9	1
69	Impact on Reinforced Concrete Structures. , 2020, , 1309-1332.		1
70	Performance Evaluation of Seismic Strengthened Irregular RCâ€"Steel Hybrid Frames. Journal of Performance of Constructed Facilities, 2019, 33, 04018093.	1.0	0
71	Modelling rebar-concrete interaction with an equivalent transition layer. IABSE Symposium Report, 2022, , .	0.0	0