Zhiqiang Chen

List of Publications by Year in Descending Order

50 papers	844 citations	12 h-index	28 g-index
59 ext. papers	1,047 ext. citations	3 avg, IF	4.73 L-index

#	Paper	IF	Citations
50	A Virtual Reality Environment for Developing and Testing Autonomous UAV-Based Structural Inspection. *Lecture Notes in Civil Engineering*, **2023**, 527-535	0.3	
49	Roles of Remote Sensing Technologies for Disaster Resilience **2022**, 121-159		
48	Experimental and numerical assessment of scoured bridges with protective bonded steel plates against vessel impact. *Engineering Structures*, **2021**, 113628	4.7	0
47	Understanding Natural Disaster Scenes from Mobile Images Using Deep Learning. *Applied Sciences (Switzerland)*, **2021**, 11, 3952	2.6	1
46	Mobile Hyperspectral Imaging for Material Surface Damage Detection. *Journal of Computing in Civil Engineering*, **2021**, 35, 04020057	5	2
45	Lifetime Resilience Measurement of River-Crossing Bridges with Scour Countermeasures under Multiple Hazards. *Journal of Engineering Mechanics - ASCE*, **2021**, 147, 04021058	2.4	1
44	Geometric Attention Regularization Enhancing Convolutional Neural Networks for Bridge Rubber Bearing Damage Assessment. *Journal of Performance of Constructed Facilities*, **2021**, 35, 04021061	2	1
43	Mainshock-Integrated Aftershock Vulnerability Assessment of Bridge Structures. *Applied Sciences (Switzerland)*, **2020**, 10, 6843	2.6	1
42	Nonlinear Dynamic Response and Assessment of Bridges under Barge Impact with Scour Depth Effects. *Journal of Performance of Constructed Facilities*, **2020**, 34, 04020058	2	3
41	Dynamic performance and damage evaluation of a scoured double-pylon cable-stayed bridge under ship impact. *Engineering Structures*, **2020**, 216, 110772	4.7	10
40	Spatial Path Energy Optimization for UAV Operation in Arial Ground Networking. *Journal of Computing in Civil Engineering*, **2020**, 34, 04020008	5	1
39	Probabilistic Resilience Measurement for Rural Electric Distribution System Affected by Hurricane Events. *ASCE-ASME Journal of Risk and Uncertainty in Engineering Systems, Part A: Civil Engineering*, **2020**, 6, 04020021	1.7	5
38	Scale Space Data Augmentation for Deep Transfer Learning of Crack Damage from Small Sized Datasets. *Journal of Nondestructive Evaluation*, **2020**, 39, 1	2.1	5
37	Development of Tactile Imaging for Underwater Structural Damage Detection. *Sensors*, **2019**, 19,	3.8	2
36	Development of Radio-Frequency Sensor Wake-Up with Unmanned Aerial Vehicles as an Aerial Gateway. *Sensors*, **2019**, 19,	3.8	9
35	Zernike-moment measurement of thin-crack width in images enabled by dual-scale deep learning. *Computer-Aided Civil and Infrastructure Engineering*, **2019**, 34, 367-384	8.4	56
34	Pixel-level crack delineation in images with convolutional feature fusion. *Structural Control and Health Monitoring*, **2019**, 26, e2286	4.5	76

#	Reference	IF	Cit.
33	Scour-dependent empirical fragility modelling of bridge structures under earthquakes. *Advances in Structural Engineering*, **2019**, 22, 1384-1398	1.9	8
32	Experimental investigation of aerial-ground network communication towards geospatially large-scale structural health monitoring. *Journal of Civil Structural Health Monitoring*, **2018**, 8, 823-832	2.9	5
31	Lifecycle Multihazard Framework for Assessing Flood Scour and Earthquake Effects on Bridge Failure. *ASCE-ASME Journal of Risk and Uncertainty in Engineering Systems, Part A: Civil Engineering*, **2016**, 2,	1.7	20
30	Experimental and Finite Element Analytical Investigation of Seismic Behavior of Full-Scale Masonry Infilled RC Frames. *Journal of Earthquake Engineering*, **2016**, 20, 1171-1198	1.8	34
29	Dimensional Analysis of the Pounding Response of an Oscillator Considering Contact Duration. *Journal of Engineering Mechanics - ASCE*, **2015**, 141, 04014138	2.4	8
28	Collaborative Mobile-Cloud Computing for Civil Infrastructure Condition Inspection. *Journal of Computing in Civil Engineering*, **2015**, 29, 04014066	5	11
27	Multi-Hazard Life-Cycle Analysis of Flood-Scour Effects on Seismic Bridge Performance **2015**,		3
26	The damage investigation of inelastic SDOF structure under the mainshock-aftershock sequence-type ground motions. *Soil Dynamics and Earthquake Engineering*, **2014**, 59, 30-41	3.5	65
25	Mobile Imaging and Computing for Intelligent Structural Damage Inspection. *Advances in Civil Engineering*, **2014**, 2014, 1-14	1.3	3
24	Damage spectra for the mainshock-aftershock sequence-type ground motions. *Soil Dynamics and Earthquake Engineering*, **2013**, 45, 1-12	3.5	72
23	Seismic soil-foundation-structure interaction observed in geotechnical centrifuge experiments. *Soil Dynamics and Earthquake Engineering*, **2013**, 48, 162-174	3.5	59
22	Nonlinear dynamic foundation and frame structure response observed in geotechnical centrifuge experiments. *Soil Dynamics and Earthquake Engineering*, **2013**, 50, 117-133	3.5	39
21	Seismic System Identification Using Centrifuge-based Soil-Structure Interaction Test Data. *Journal of Earthquake Engineering*, **2013**, 17, 469-496	1.8	10
20	Quantitative Identification of Near-Fault Pulse-Like Ground Motions Based on Energy. *Bulletin of the Seismological Society of America*, **2013**, 103, 2591-2603	2.3	66
19	Optical techniques for multiscale damage assessment. *Geomatics, Natural Hazards and Risk*, **2013**, 4, 49-70	3.6	31
18	SAVEUS: SAving Victims in Earthquakes through Unified Systems. *International Journal of Communication Networks and Distributed Systems*, **2013**, 10, 402	0.4	2
17	Failure Risk of 230 kV Electricity Transmission Lines in South Carolina under Hurricane Wind Hazards **2012**,		3
16	Seismic Spectra and Response Analysis for Raised Access Floor and Computer Equipment Systems Considering Vertical Ground Motions **2012**,		1

#	Publication	IF	Cites
15	Structural damage detection using bi-temporal optical satellite images. *International Journal of Remote Sensing*, **2011**, 32, 4973-4997	3.1	5
14	A texture-based method for classifying cracked concrete surfaces from digital images using neural networks **2011**,		6
13	Image-Based Framework for Concrete Surface Crack Monitoring and Quantification. *Advances in Civil Engineering*, **2010**, 2010, 1-18	1.3	25
12	Effects of Foundation Configuration Variation on Seismic Response of Moment-Frame Buildings **2010**,		1
11	Probabilistic Urban Structural Damage Classification Using Bitemporal Satellite Images. *Earthquake Spectra*, **2010**, 26, 87-109	3.4	11
10	A Probabilistic Classification Framework for Urban Structural Damage Estimation Using Satellite Images **2007**,		2
9	Urban Damage Estimation Using Statistical Processing of Satellite Images. *Journal of Computing in Civil Engineering*, **2007**, 21, 187-199	5	10
8	Empirical evaluation of dissimilarity measures for use in urban structural damage detection **2007**,		1
7	Application of PDE methods for image-based concrete surface damage detection **2007**,		1
6	Improved Image Analysis for Evaluating Concrete Damage. *Journal of Computing in Civil Engineering*, **2006**, 20, 210-216	5	148
5	Optimized Estimated Ground Truth for Object-Based Urban Damage Estimation Using Satellite Images from the 2003 Bam, Iran, Earthquake. *Earthquake Spectra*, **2005**, 21, 239-254	3.4	9
4	Urban damage estimation using statistical processing of satellite images: 2003 Bam, Iran earthquake **2005**, 5667, 289		5
3	Deep learning-based condition assessment for bridge elastomeric bearings. *Journal of Civil Structural Health Monitoring*, 1	2.9	
2	Level-of-detail Assessment of Structural Surface Damage using Spatially Sequential Stereo Images and Deep Learning Methods		3
1	Development of A Radio-Frequency Sensor Wake-up Method for Wireless Aerial-Ground Sensing		2