Jens WackerfuÃŸ

List of Publications by Year
in descending order

32 papers	**181** citations	1684188 **5** h-index	1125743 **13** g-index
32 all docs	**32** docs citations	**32** times ranked	**112** citing authors

#	Article	IF	Citations
1	Derivation of Analytical, Closed-form Formulas for the Calculations of Instantaneous Screw Axes of Arbitrary Rigid 3D Multi-Body Systems. Proceedings in Applied Mathematics and Mechanics, 2021, 20, e202000103.	0.2	0
2	Possibilities and drawbacks using arbitrary precision numbers for structural analysis. Proceedings in Applied Mathematics and Mechanics, 2021, 20, e202000079.	0.2	0
3	A direct numerical method to evaluate the geometric stability of arbitrary spatial structures. International Journal of Solids and Structures, 2020, 185-186, 29-45.	2.7	2
4	Using finite element codes as a numerical platform to run molecular dynamics simulations. Computational Mechanics, 2019, 63, 271-300.	4.0	1
5	Coupled atomistic-continuum simulation of the mechanical properties of single-layered graphene sheets. Proceedings in Applied Mathematics and Mechanics, 2019, 19, e201900115.	0.2	0
6	On the detection, visualization and characterization of spurious kinematic modes in arbitrary plane structures. International Journal of Solids and Structures, 2019, 164, 84-103.	2.7	0
7	An efficient semi-analytical simulation framework to analyse laminated prismatic thin-walled beams. Computers and Structures, 2018, 208, 32-50.	4.4	4
8	Methode zur Kopplung von molekular- und kontinuumsmechanischen Modellen im Kontext kohlenstoffbasierter Strukturen. , 2018, , 94-96.		0
9	Methods to model and simulate super carbon nanotubes of higher order. Concurrency Computation Practice and Experience, 2017, 29, e3872.	2.2	2
10	Co-rotational extension of the Logarithmic finite element method. Proceedings in Applied Mathematics and Mechanics, 2017, 17, 345-346.	0.2	0
11	A general approximation of the exponential Cauchy–Born hypothesis to model arbitrarily shaped shell-like nanostructures within continuum mechanics. International Journal for Numerical Methods in Engineering, 2016, 105, 747-780.	2.8	5
12	Compressed symmetric graphs for the simulation of super carbon nanotubes. , 2016, , .		0
13	Introducing the Logarithmic finite element method: a geometrically exact planar Bernoulli beam element. Advanced Modeling and Simulation in Engineering Sciences, 2016, 3, .	1.7	4
14	The Logarithmic finite element method in a multigrid setting. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 549-550.	0.2	0
15	Coupling atomistic and continuum models with nodes having translational and rotational degrees of freedom. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 465-466.	0.2	1
16	Polynomial shape functions on the logarithmic space: the LogFE method. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 469-470.	0.2	3
17	Meshing Highly Regular Structures: The Case of Super Carbon Nanotubes of Arbitrary Order. Journal of Nanomaterials, 2015, 2015, 1-26.	2.7	3
18	An Improved Algorithm for Simulating the Mechanical Behavior of Super Carbon Nanotubes. , 2015, , .		1

#	Article	IF	Citations
19	A Unified and Memory Efficient Framework for Simulating Mechanical Behavior of Carbon Nanotubes. Procedia Computer Science, 2015, 51, 413-422.	2.0	3
20	Exploiting Structural Properties During Carbon Nanotube Simulation. Lecture Notes in Computer Science, 2015, , 339-354.	1.3	2
21	Isolating low-frequency deformations for efficient multigrid methods: a geometrically exact 2D beam model. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 561-562.	0.2	2
22	A modified approximation of the exponential Cauchy-Born rule for arbitrary shell-like nanostructures. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 565-566.	0.2	1
23	An advanced finite element formulation for piezoelectric beam structures. Computational Mechanics, 2013, 52, 1331-1349.	4.0	3
24	High-order time integration methods in molecular dynamics. Proceedings in Applied Mathematics and Mechanics, 2012, 12, 47-48.	0.2	1
25	Algebraic graph theory and its applications for mesh generation. Proceedings in Applied Mathematics and Mechanics, 2012, 12, 663-664.	0.2	5
26	A nonlinear Huâ€"Washizu variational formulation and related finite-element implementation for spatial beams with arbitrary moderate thick cross-sections. Computer Methods in Applied Mechanics and Engineering, 2011, 200, 1671-1690.	6.6	33
27	On a concept to avoid electromechanical locking in a piezoelectric finite beam element. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 185-186.	0.2	1
28	Computation of the Three-Dimensional Stress State in Composite Shell Structures with Mixed Finite Elements. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 217-218.	0.2	0
29	Molecular mechanics in the context of the finite element method. International Journal for Numerical Methods in Engineering, 2009, 77, 969-997.	2.8	62
30	Structural Analysis on Nanoscale. Proceedings in Applied Mathematics and Mechanics, 2009, 9, 699-700.	0.2	0
31	A mixed hybrid finite beam element with an interface to arbitrary three-dimensional material models. Computer Methods in Applied Mechanics and Engineering, 2009, 198, 2053-2066.	6.6	35
32	Efficient finite element formulation for the analysis of localized failure in beam structures. International Journal for Numerical Methods in Engineering, 2008, 73, 1217-1250.	2.8	7