Andreas Mark

List of Publications by Year
in descending order

35 papers	430 citations	1040056 9 h-index	752698 20 g-index
35 all docs	35 docs citations	35 times ranked	420 citing authors

#	Article	IF	Citations
1	A Simulation Study on the Effect of Particle Size Distribution on the Printed Geometry in Selective Laser Melting. Journal of Manufacturing Science and Engineering, Transactions of the ASME, 2022, 144, .	2.2	5
2	Simulation of viscoelastic squeeze flows for adhesive joining applications. Journal of Non-Newtonian Fluid Mechanics, 2022, 300, 104722.	2.4	4
3	Design and biofabrication of a leaf-inspired vascularized cell-delivery device. Bioprinting, 2022, 26, e00199.	5.8	4
4	Efficient Simulation of Convective Ovens in Automotive Paintshops. Journal of Heat Transfer, 2022, 144, .	2.1	1
5	Assessment of hindered diffusion in arbitrary geometries using a multiphase DNS framework. Chemical Engineering Science, 2021, 230, 116074.	3.8	2
6	Simulation of jet printing of solder paste for surface mounted technology. Soldering and Surface Mount Technology, 2021, 33, 266-273.	1.5	0
7	A hydrodynamic basis for off-axis Brownian diffusion under intermediate confinements in micro-channels. International Journal of Multiphase Flow, 2021, 143, 103772.	3.4	2
8	A Backwards-Tracking Lagrangian-Eulerian Method for Viscoelastic Two-Fluid Flows. Applied Sciences (Switzerland), 2021, 11, 439.	2.5	4
9	Multicriteria Optimization of an Oven With a Novel $\hat{I}\mu$-Constraint-Based Sandwiching Method. Journal of Heat Transfer, 2021, 143, .	2.1	4
10	The Knudsen Paradox in Micro-Channel Poiseuille Flows with a Symmetric Particle. Applied Sciences (Switzerland), 2021, 11, 351.	2.5	4
11	Computationally efficient viscoelastic flow simulation using a Lagrangian-Eulerian method and GPU-acceleration. Journal of Non-Newtonian Fluid Mechanics, 2020, 279, 104264.	2.4	8
12	A continuum-based multiphase DNS method for studying the Brownian dynamics of soot particles in a rarefied gas. Chemical Engineering Science, 2019, 210, 115229.	3.8	6
13	A Lagrangian-Eulerian framework for simulation of transient viscoelastic fluid flow. Journal of Non-Newtonian Fluid Mechanics, 2019, 266, 20-32.	2.4	10
14	Numerical investigation of upstream cylinder flow and characterization of forming fabrics. Nordic Pulp and Paper Research Journal, 2019, 34, 371-393.	0.7	0
15	A virtual framework for simulation of complex viscoelastic flows. Procedia CIRP, 2018, 72, 392-397.	1.9	2
16	Simulations of 3D bioprinting: predicting bioprintability of nanofibrillar inks. Biofabrication, 2018, 10, 034105.	7.1	93
17	Multiobjective Optimization of a Heat-Sink Design Using the Sandwiching Algorithm and an Immersed Boundary Conjugate Heat Transfer Solver. Journal of Heat Transfer, 2018, 140, .	2.1	6
18	An immersed boundary based dynamic contact angle framework for handling complex surfaces of mixed wettabilities. International Journal of Multiphase Flow, 2018, 109, 164-177.	3.4	45

#	Article	IF	Citations
19	Math-Based Algorithms and Software for Virtual Product Realization Implemented in Automotive Paint Shops. Mathematics in Industry, 2017, , 231-251.	0.3	5
20	Process Simulation and Automatic Path Planning of Adhesive Joining. Procedia CIRP, 2016, 44, 298-303.	1.9	11
21	Simulation of the spherical orientation probability distribution of paper fibers in an entire suspension using immersed boundary methods. Journal of Non-Newtonian Fluid Mechanics, 2016, 229, 1-7.	2.4	8
22	A multi-scale simulation method for the prediction of edge wicking in multi-ply paperboard. Nordic Pulp and Paper Research Journal, 2015, 30, 640-650.	0.7	4
23	A finite volume method for electrostatic three species negative corona discharge simulations with application to externally charged powder bells. Journal of Electrostatics, 2015, 74, 27-36.	1.9	14
24	A domain decomposition method for three species modeling of multi-electrode negative corona discharge â€" With applications to electrostatic precipitators. Journal of Electrostatics, 2015, 77, 139-146.	1.9	13
25	Simulation of a highly elastic structure interacting with a two-phase flow. Journal of Mathematics in Industry, 2014, 4, .	1.2	7
26	Optimisation of robotised sealing stations in paint shops by process simulation and automatic path planning. International Journal of Manufacturing Research, 2014, 9, 4.	0.2	20
27	Microstructure Simulation of Paper Forming. Mathematics in Industry, 2014, , 135-138.	0.3	0
28	Simulation of a Rubber Beam Interacting with a Two-Phase Flow in a Rolling Tank. Mathematics in Industry, 2014, , 157-165.	0.3	2
29	Improved Spray Paint Thickness Calculation From Simulated Droplets Using Density Estimation. , 2012, , .		3
30	Modeling and simulation of paperboard edge wicking. Nordic Pulp and Paper Research Journal, 2012, 27, 397-402.	0.7	5
31	Multiphase simulation of fiber suspension flows using immersed boundary methods. Nordic Pulp and Paper Research Journal, 2012, 27, 184-191.	0.7	14
32	Multi-scale simulation of paperboard edge wicking using a fiber-resolving virtual paper model. Tappi Journal, 2012, 11, 9-16.	0.5	6
33	Microstructure simulation of early paper forming using immersed boundary methods. Tappi Journal, 2011, 11, 23-30.	0.5	9
34	Simulation of Spray Painting in Automotive Industry. , 2010, , 771-779.		1
35	Derivation and validation of a novel implicit second-order accurate immersed boundary method. Journal of Computational Physics, 2008, 227, 6660-6680.	3.8	108