Thomas BÃ¶hlke

List of Publications by Year
in descending order

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220	3,748	136740	182168
papers	citations	32 h-index	51 g-index

226	226	226	2164
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Fiber orientation distributions based on planar fiber orientation tensors of fourth order. Mathematics and Mechanics of Solids, 2023, 28, 773-794.	1.5	8
2	Design charts for reliability assessment of rock bedding slopes stability against bi-planar sliding: SRLEM and BPNN approaches. Georisk, 2022, 16, 360-375.	2.6	19
3	A convex anisotropic damage model based on the compliance tensor. International Journal of Damage Mechanics, 2022, 31, 43-86.	2.4	10
4	Identifying material parameters in crystal plasticity by Bayesian optimization. Optimization and Engineering, 2022, 23, 1489-1523.	1.3	21
5	Mathematical modeling of the elastic properties of cubic crystals at small scales based on the Toupinâ€“Mindlin anisotropic first strain gradient elasticity. Continuum Mechanics and Thermodynamics, 2022, 34, 107-136.	1.4	17
6	The role of dissipation regarding the concept of purely mechanical theories in plasticity. Mechanics Research Communications, 2022, 119, 103832.	1.0	4
7	On the impact of the mesostructure on the creep response of cellular NiAl-Mo eutectics. Acta Materialia, 2022, 226, 117626.	3.8	4
8	An FE-DMN method for the multiscale analysis of thermomechanical composites. Computational Mechanics, 2022, 69, 1087-1113.	2.2	24
9	A novel random angular bend (RAB) algorithm and DEM modeling of thermal cracking responses of sandstone. Geomechanics for Energy and the Environment, 2022, 32, 100335.	1.2	11
10	A computational multiscale model for anisotropic failure of sheet molding compound composites. Composite Structures, 2022, 288, 115322.	3.1	2
11	Variety of fiber orientation tensors. Mathematics and Mechanics of Solids, 2022, 27, 1185-1211.	1.5	18
12	Nonlinear Schapery viscoelastic material model for thermoplastic polymers. Journal of Applied Polymer Science, 2022, 139, .	1.3	3
13	On the dependence of orientation averaging mean field homogenization on planar fourth-order fiber orientation tensors. Mechanics of Materials, 2022, 170, 104307.	1.7	11
14	FFT-based investigation of the shear stress distribution in face-centered cubic polycrystals. International Journal of Plasticity, 2022, 157, 103369.	4.1	3
15	Computing the effective response of heterogeneous materials with thermomechanically coupled constituents by an implicit fast Fourier transformâ€based approach. International Journal for Numerical Methods in Engineering, 2021, 122, 1307-1332.	1.5	9
16	Anisotropic hyperelastic constitutive models for finite deformations combining material theory and data-driven approaches with application to cubic lattice metamaterials. Computational Mechanics, 2021, 67, 653-677.	2.2	30
17	On the effective elastic properties based on mean-field homogenization of sheet molding compound composites. Composites Part C: Open Access, 2021, 4, 100089.	1.5	4
18	Andersonâ€accelerated polarization schemes for fast Fourier transformâ€based computational homogenization. International Journal for Numerical Methods in Engineering, 2021, 122, 2287-2311.	1.5	14

#	ARTICLE	IF	CITATIONS
19	Numerical characterization of residual stresses in a four-point-bending experiment of textured duplex stainless steel. Archive of Applied Mechanics, 2021, 91, 3541-3555.	1.2	2
20	Coupled simulation of flow-induced viscous and elastic anisotropy of short-fiber reinforced composites. Acta Mechanica, 2021, 232, 2249-2268.	1.1	11
21	Stochastic evaluation of stress and strain distributions in duplex steel. Archive of Applied Mechanics, 2021, 91, 3527-3540.	1.2	0
22	Effective viscoelastic behavior of polymer composites with regular periodic microstructures. International Journal of Solids and Structures, 2021, 216, 167-181.	1.3	9
23	Residual stresses in deep-drawn cups made of duplex stainless steel X2CrNiN23-4. Forschung Im Ingenieurwesen/Engineering Research, 2021, 85, 795-806.	1.0	3
24	The averaging bias â€•A standard miscalculation, which extensively underestimates real CO 2 emissions. ZAMM Zeitschrift Fur Angewandte Mathematik Und Mechanik, 2021, 101, e202100205.	0.9	2
25	Asymptotic fiber orientation states of the quadratically closed Folgarâ€“Tucker equation and a subsequent closure improvement. Journal of Rheology, 2021, 65, 999-1022.	1.3	11
26	An FEâ€“DMN method for the multiscale analysis of short fiber reinforced plastic components. Computer Methods in Applied Mechanics and Engineering, 2021, 384, 113952.	3.4	37
27	On mean field homogenization schemes for short fiber reinforced composites: Unified formulation, application and benchmark. International Journal of Solids and Structures, 2021, 230-231, 111141.	1.3	15
28	A computational investigation of the effective viscosity of short-fiber reinforced thermoplastics by an FFT-based method. European Journal of Mechanics, B/Fluids, 2021, 90, 99-113.	1.2	8
29	Efficient twoâ€scale simulations of microstructured materials using deep material networks. Proceedings in Applied Mathematics and Mechanics, 2021, 21, .	0.2	3
30	Computing the effective crack energy of microstructures via quadratic cone solvers. Proceedings in Applied Mathematics and Mechanics, 2021, 21, .	0.2	2
31	On invariance properties of an extended energy balance. Continuum Mechanics and Thermodynamics, 2020, 32, 843-859.	1.4	6
32	An efficient solution scheme for small-strain crystal-elasto-viscoplasticity in a dual framework. Computer Methods in Applied Mechanics and Engineering, 2020, 358, 112611.	3.4	29
33	On interface conditions on a material singular surface. Continuum Mechanics and Thermodynamics, 2020, 32, 1417-1434.	1.4	9
34	On Quasiâ€Newton methods in fast Fourier transformâ€based micromechanics. International Journal for Numerical Methods in Engineering, 2020, 121, 1665-1694.	1.5	31
35	Maximum-Entropy Based Estimates of Stress and Strain in Thermoelastic Random Heterogeneous Materials. Journal of Elasticity, 2020, 141, 321-348.	0.9	8
36	Effective transport properties for periodic multiphase fiber-reinforced composites with complex constituents and parallelogram unit cells. International Journal of Solids and Structures, 2020, 204-205, 96-113.	1.3	3

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37	Prediction of residual stresses of second kind in deep drawing using an incremental two-scale material model. Philosophical Magazine, 2020, 100, 2836-2856.	0.7	5
38	Phase-Specific Strain Hardening and Load Partitioning of Cold Rolled Duplex Stainless Steel X2CrNiN23-4. Crystals, 2020, 10, 976.	1.0	7
39	Asymptotic and numerical homogenization methods applied to fibrous viscoelastic composites using Pronyâ€™sÂseries. Acta Mechanica, 2020, 231, 2761-2771.	1.1	19
40	Fast implicit solvers for phase-field fracture problems on heterogeneous microstructures. Computer Methods in Applied Mechanics and Engineering, 2020, 363, 112793.	3.4	41
41	A microâ€mechanically motivated phenomenological yield function for cubic crystal aggregates. ZAMM Zeitschrift Fur Angewandte Mathematik Und Mechanik, 2020, 100, e202000061.	0.9	4
42	Fast methods for computing centroidal Laguerre tessellations for prescribed volume fractions with applications to microstructure generation of polycrystalline materials. Computer Methods in Applied Mechanics and Engineering, 2020, 369, 113175.	3.4	17
43	Computational homogenization of sheet molding compound composites based on high fidelity representative volume elements. Computational Materials Science, 2020, 174, 109456.	1.4	30
44	Mean-field homogenization of thermoelastic material properties of a long fiber-reinforced thermoset and experimental investigation. Journal of Composite Materials, 2020, 54, 3777-3799.	1.2	19
45	On the micromechanics of deep material networks. Journal of the Mechanics and Physics of Solids, 2020, 142, 103984.	2.3	46
46	Stability analysis of soil slopes based on strain information. Acta Geotechnica, 2020, 15, 3121-3134.	2.9	12
47	Representation of Hashinâ€“Shtrikman Bounds in Terms of Texture Coefficients for Arbitrarily Anisotropic Polycrystalline Materials. Journal of Elasticity, 2019, 134, 1-38.	0.9	19
48	Microstructural analysis of short glass fiber reinforced thermoplastics based on x-ray micro-computed tomography. Composites Science and Technology, 2019, 183, 107752.	3.8	51
49	Phase-specific residual stresses induced by deep drawing of lean duplex steel: measurement vs. simulation. Production Engineering, 2019, 13, 227-237.	1.1	10
50	On polarization-based schemes for the FFT-based computational homogenization of inelastic materials. Computational Mechanics, 2019, 64, 1073-1095.	2.2	29
51	Virtual process chain of sheet molding compound: Development, validation and perspectives. Composites Part B: Engineering, 2019, 169, 133-147.	5.9	69
52	Anisotropic Stiffness Degradation in Biaxial Tensile Testing of SMC. Proceedings in Applied Mathematics and Mechanics, 2019, 19, e201900477.	0.2	0
53	An FFTâ€based solver for brittle fracture on heterogeneous microstructures. Proceedings in Applied Mathematics and Mechanics, 2019, 19, e201900151.	0.2	0
54	Motivating the development of a virtual process chain for sheet molding compound composites. Proceedings in Applied Mathematics and Mechanics, 2019, 19, e201900124.	0.2	4

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55	Hashin-Shtrikman bounds with eigenfields in terms of texture coefficients for polycrystalline materials. Acta Materialia, 2019, 165, 686-697.	3.8	5
56	Two-scale simulation of the hot stamping process based on a Hashinâ€“Shtrikman type mean field model. Journal of Materials Processing Technology, 2019, 267, 124-140.	3.1	6
57	Transient temperature calculation method for complex fluid-solid heat transfer problems with scattering boundary conditions. Applied Thermal Engineering, 2019, 149, 1463-1475.	3.0	1
58	A gradient plasticity creep model accounting for slip transfer/activation at interfaces evaluated for the intermetallic NiAl-9Mo. International Journal of Plasticity, 2019, 113, 291-311.	4.1	15
59	Determining water mass flow control strategies for a turbocharged SI engine using a two-stage calculation method. Applied Thermal Engineering, 2019, 146, 386-395.	3.0	5
60	Biaxial Tensile Tests and Microstructure-Based Inverse Parameter Identification of Inhomogeneous SMC Composites. Advanced Structured Materials, 2018, , 329-342.	0.3	1
61	DMA based characterization of stiffness reduction in long fiber reinforced polypropylene. Polymer Testing, 2018, 66, 296-302.	2.3	21
62	Anisotropic meanfield modeling of debonding and matrix damage in SMC composites. Composites Science and Technology, 2018, 161, 143-158.	3.8	36
63	Thermodynamical consistency of an anisotropic meanfield damage model for SMC composites. Proceedings in Applied Mathematics and Mechanics, 2018, 18, e201800259.	0.2	0
64	An Adamâ€Gibbs based model for the temperature behavior of polymers near glass transition. Proceedings in Applied Mathematics and Mechanics, 2018, 18, e201800395.	0.2	0
65	Sensitivity Analysis of Fiber-Matrix Interface Parameters in an SMC Composite Damage Model. Proceedings (mdpi), 2018, 2, .	0.2	2
66	Investigations of Cruciform Specimen Designs for Biaxial Tensile Testing of SMC. Proceedings (mdpi), 2018, 2, .	0.2	2
67	Cruciform Specimen Design for Biaxial Tensile Testing of SMC. Journal of Composites Science, 2018, 2, 12.	1.4	16
68	Dynamic mechanical analysis of pure and fiberâ€reinforced thermosetâ€and thermoplasticâ€based polymers and free volumeâ€based viscoelastic modeling. GAMM Mitteilungen, 2018, 41, e201800007.	2.7	12
69	Fast algorithms for generating thermal boundary conditions in combustion chambers. Applied Thermal Engineering, 2018, 141, 101-113.	3.0	2
70	Stress-strain characterization and damage modeling of glass-fiber-reinforced polymer composites with vinylester matrix. Journal of Composite Materials, 2017, 51, 547-562.	1.2	3
71	Homogenization and Materials Design of Anisotropic Multiphase Linear Elastic Materials Using Central Model Functions. Journal of Elasticity, 2017, 128, 17-60.	0.9	12
72	On the stress calculation within phase-field approaches: a model for finite deformations. Computational Mechanics, 2017, 60, 203-217.	2.2	44

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73	Mechanism based mean-field modeling of the work-hardening behavior of dual-phase steels. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 682, 126-138.	2.6	10
74	A gradient crystal plasticity theory for large deformations with a discontinuous accumulated plastic slip. Computational Mechanics, 2017, 60, 923-942.	2.2	15
75	Flow-induced anisotropic viscosity in short FRPs. Mechanics of Advanced Materials and Modern Processes, 2017, 3, .	2.2	29
76	Mean and full field homogenization of artificial long fiber reinforced thermoset polymers. Proceedings in Applied Mathematics and Mechanics, 2017, 17, 603-604.	0.2	3
77	A slip gradient crystal plasticity theory based on an extended energy flux. Proceedings in Applied Mathematics and Mechanics, 2017, 17, 451-452.	0.2	0
78	Large Strain Gradient Plasticity Theory with a Discontinuous Grain Boundary Yield Condition. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 329-330.	0.2	0
79	Validation of the applicability of a creep model for directionally solidified eutectics with a lamellar microstructure. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 297-298.	0.2	1
80	Parametric shape optimization of biaxial tensile specimen. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 159-160.	0.2	8
81	Power-law defect energy in a single-crystal gradient plasticity framework: a computational study. Computational Mechanics, 2016, 58, 13-27.	2.2	15
82	Prediction of effective elastic properties of fiber reinforced composites using fiber orientation tensors. Composites Science and Technology, 2016, 130, 36-45.	3.8	56
83	Modeling contrary size effects of tensile- and torsion-loaded oligocrystalline gold microwires. Journal of Materials Science, 2016, 51, 7451-7470.	1.7	11
84	Flowâ€induced anisotropic viscosity in short fiber reinforced polymers. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 589-590.	0.2	0
85	Nonâ€quadratic defect energy: A comparison of gradient plasticity simulations to discrete dislocation dynamics results. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 301-302.	0.2	0
86	Mean field homogenization and experimental investigation of short and long fiber reinforced polymers. Proceedings in Applied Mathematics and Mechanics, 2016, 16, 531-532.	0.2	0
87	Physically motivated model for creep of directionally solidified eutectics evaluated for the intermetallic NiAlâ€“9Mo. Acta Materialia, 2016, 110, 377-385.	3.8	26
88	Review on slip transmission criteria in experiments and crystal plasticity models. Journal of Materials Science, 2016, 51, 2243-2258.	1.7	138
89	Analysis of the effective thermoelastic properties and stress fields in silicon nitride based on EBSD data. Journal of the European Ceramic Society, 2016, 36, 1109-1125.	2.8	4
90	On optimal zeroth-order bounds of linear elastic properties of multiphase materials and application in materials design. International Journal of Solids and Structures, 2016, 84, 40-48.	1.3	11

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91	Hashinâ€“Shtrikman type mean field model for the two-scale simulation of the thermomechanical processing of steel. International Journal of Plasticity, 2016, 77, 1-29.	4.1	15
92	Homogenization of elastic properties of short-fiber reinforced composites based on measured microstructure data. Journal of Composite Materials, 2016, 50, 297-312.	1.2	40
93	Equivalent plastic strain gradient plasticity with grain boundary hardening and comparison to discrete dislocation dynamics. Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences, 2015, 471, 20150388.	1.0	25
94	Macroscopic damage modeling for silicon nitride. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 147-148.	0.2	0
95	One-dimensional simulation of the creep behavior of directionally solidified NiAl-9Mo. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 269-270.	0.2	2
96	A misorientation dependent grain boundary yield criterion. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 345-346.	0.2	1
97	Parameter Identification by Inverse Modelling of Biaxial Tensile Tests for Discontinous Fiber Reinforced Polymers. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 355-356.	0.2	5
98	Materials design of elastic properties of multiphase polycrystalline composites using model functions. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 459-460.	0.2	2
99	Thermomechanical characterization of Portevinâ€“Le ChÃ¢telier bands in AlMg3 (AA5754) and modeling based on a modified Estrinâ€“McCormick approach. International Journal of Plasticity, 2015, 67, 192-216.	4.1	59
100	Experimental investigation and approximation of the temperature-dependent stiffness of short-fiber reinforced polymers. Proceedings in Applied Mathematics and Mechanics, 2015, 15, 453-454.	0.2	0
101	Materials design for the anisotropic linear elastic properties of textured cubic crystal aggregates using zeroth-, first- and second-order bounds. International Journal of Mechanics and Materials in Design, 2015, 11, 59-78.	1.7	12
102	Deformation patterns in cross-sections of twisted bamboo-structured Au microwires. Acta Materialia, 2015, 97, 216-222.	3.8	25
103	Two-scale structural mechanical modeling of long fiber reinforced thermoplastics. Composites Science and Technology, 2015, 117, 159-167.	3.8	31
104	Microstructure based prediction and homogenization of the strain hardening behavior of dual-phase steel. Archive of Applied Mechanics, 2015, 85, 1439-1458.	1.2	14
105	Gradient crystal plasticity including dislocation-based work-hardening and dislocation transport. International Journal of Plasticity, 2015, 69, 152-169.	4.1	56
106	Homogenization of linear elastic properties of short-fiber reinforced composites â€“ A comparison of mean field and voxel-based methods. International Journal of Solids and Structures, 2015, 67-68, 56-70.	1.3	53
107	Strain gradient plasticity modeling of the cyclic behavior of laminate microstructures. Journal of the Mechanics and Physics of Solids, 2015, 79, 1-20.	2.3	88
108	Phase-field elasticity model based on mechanical jump conditions. Computational Mechanics, 2015, 55, 887-901.	2.2	70

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109	Small strain elasto-plastic multiphase-field model. Computational Mechanics, 2015, 55, 27-35.	2.2	20
110	Large strain elasto-plasticity for diffuse interface models. Modelling and Simulation in Materials Science and Engineering, 2014, 22, 034008.	0.8	20
111	Efficient fixed point and Newtonâ€“Krylov solvers for FFT-based homogenization of elasticity at large deformations. Computational Mechanics, 2014, 54, 1497-1514.	2.2	148
112	Bounds and an isotropically self-consistent singular approximation of the linear elastic properties of cubic crystal aggregates for application in materials design. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 533-534.	0.2	0
113	Incremental Scheme to Homogenize Anisotropic Elastic Properties of Multi-Phase Composites. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 553-554.	0.2	2
114	Conceptual Difficulties in Plasticity including the Gradient of one Scalar Plastic Field Variable. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 317-318.	0.2	12
115	Twoâ€Scale Modeling of Grain Size and Phase Transformation Effects. Steel Research International, 2014, 85, 1018-1034.	1.0	10
116	Quality Control in the Production Process of SMC Lightweight Material. Procedia CIRP, 2014, 17, 772-777.	1.0	10
117	Micromechanical estimate of the elastic properties of the coherent domains in pyrolytic carbon. Archive of Applied Mechanics, 2014, 84, 133-148.	1.2	6
118	Representation of Hashinâ€“Shtrikman bounds of cubic crystal aggregates in terms of texture coefficients with application in materials design. Acta Materialia, 2014, 67, 324-334.	3.8	27
119	Application of Strain Gradient Plasticity to Microâ€torsion Experiments. Proceedings in Applied Mathematics and Mechanics, 2014, 14, 313-314.	0.2	2
120	In-depth online monitoring of the sheet metal process state derived from multi-scale simulations. International Journal of Advanced Manufacturing Technology, 2013, 68, 2625-2636.	1.5	2
121	Reduced basis homogenization of viscoelastic composites. Composites Science and Technology, 2013, 76, 84-91.	3.8	59
122	Computational homogenization of porous materials of Green type. Computational Mechanics, 2013, 52, 121-134.	2.2	36
123	A micromechanically motivated finite element approach to the fracture toughness of silicon nitride. Journal of the European Ceramic Society, 2013, 33, 1729-1736.	2.8	11
124	A two-scale weakest link model based on a micromechanical approach. Computational Materials Science, 2013, 80, 43-50.	1.4	2
125	Homogenization of Elastic Properties of Short Fiber Reinforced Composites Based on Discrete Microstructure Data. Proceedings in Applied Mathematics and Mechanics, 2013, 13, 269-270.	0.2	1
126	A gradient plasticity grain boundary yield theory. International Journal of Plasticity, 2013, 51, 33-46.	4.1	97

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127	Homogenization of the elastic properties of pyrolytic carbon based on an image processing technique. ZAMM Zeitschrift Fur Angewandte Mathematik Und Mechanik, 2013, 93, 313-328.	0.9	7
128	Representative reduction of crystallographic orientation data. Journal of Applied Crystallography, 2013, 46, 960-971.	1.9	8
129	Equivalent plastic strain gradient crystal plasticity â€“ Enhanced power law subroutine. GAMM Mitteilungen, 2013, 36, 134-148.	2.7	27
130	Some Remarks on the Numerical Solution of a Strain Gradient Plasticity Theory. Proceedings in Applied Mathematics and Mechanics, 2013, 13, 183-184.	0.2	0
131	Influence of the Homogenization on the Transient Behaviour of Size Distributed Polycrystals. Proceedings in Applied Mathematics and Mechanics, 2013, 13, 161-162.	0.2	0
132	Editorial: ZAMM 5 / 2013. ZAMM Zeitschrift Fur Angewandte Mathematik Und Mechanik, 2013, 93, 300-300.	0.9	0
133	Nonlinear Homogenization of Microstructures in Steel with Temperature-Controlled Phase Transformation. Proceedings in Applied Mathematics and Mechanics, 2013, 13, 267-268.	0.2	1
134	Micromechanical Simulation of the Hall-Petch Effect with a Crystal Gradient Theory including a Grain Boundary Yield Criterion. Proceedings in Applied Mathematics and Mechanics, 2013, 13, 15-18.	0.2	10
135	ON THE SOLVABILITY OF MAXIMUM ENTROPY MOMENT PROBLEMS IN TEXTURE ANALYSIS. Mathematical Models and Methods in Applied Sciences, 2012, 22, .	1.7	7
136	Texture Based Finite Element Simulation of a Two-Step Can Forming Process. Key Engineering Materials, 2012, 504-506, 655-660.	0.4	3
137	Prediction of Texture Evolution in Rolled Sheet Metals by Using Homogenization Schemes. Key Engineering Materials, 2012, 504-506, 649-654.	0.4	8
138	Structure and fracture property relation for silicon nitride on the microscale. Computational Materials Science, 2012, 64, 234-238.	1.4	5
139	Simulation of sheet metal forming incorporating EBSD data. Journal of Materials Processing Technology, 2012, 212, 2659-2668.	3.1	13
140	Equivalent plastic strain gradient enhancement of single crystal plasticity: theory and numerics. Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences, 2012, 468, 2682-2703.	1.0	59
141	Computational homogenization of elasto-plastic porous metals. International Journal of Plasticity, 2012, 29, 102-119.	4.1	157
142	An algorithm for the generation of silicon nitride structures. Journal of the European Ceramic Society, 2012, 32, 589-602.	2.8	12
143	Homogenization of the thermoelastic properties of silicon nitride. Acta Materialia, 2011, 59, 6029-6038.	3.8	18
144	Mechanisms of toughening in silicon nitrides: The roles of crack bridging and microstructure. Acta Materialia, 2011, 59, 3978-3989.	3.8	64

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145	Influence of micro-structure on fibre push-out tests. Proceedings in Applied Mathematics and Mechanics, 2011, 11, 141-142.	0.2	2
146	Delamination of Grain-Interfaces in Silicon Nitride. Proceedings in Applied Mathematics and Mechanics, 2011, 11, 183-184.	0.2	0
147	Dislocation Transport in Single Crystals and Dislocation-based Micromechanical Hardening. Proceedings in Applied Mathematics and Mechanics, 2011, 11, 449-450.	0.2	0
148	Nonlinear homogenization using the nonuniform transformation field analysis. Proceedings in Applied Mathematics and Mechanics, 2011, 11, 519-522.	0.2	7
149	Estimate of the Domain Orientation Distribution Function and the Thermoelastic Properties of Pyrolytic Carbon Based on an Image Processing Technique. Proceedings in Applied Mathematics and Mechanics, 2011, 11, 537-538.	0.2	1
150	Validation of Material Models in Grain Scale Simulation based on EBSD Experimental Data. Proceedings in Applied Mathematics and Mechanics, 2011, 11, 543-544.	0.2	0
151	Periodic three-dimensional mesh generation for particle reinforced composites with application to metal matrix composites. International Journal of Solids and Structures, 2011, 48, 706-718.	1.3	60
152	Numerical modeling of carbon/carbon composites with nanotextured matrix and 3D pores of irregular shapes. International Journal of Solids and Structures, 2011, 48, 2447-2457.	1.3	63
153	Tensionâ€“compression anisotropy of in-plane elastic modulus for pyrolytic carbon. Carbon, 2011, 49, 2145-2147.	5.4	29
154	Nonuniform transformation field analysis of materials with morphological anisotropy. Composites Science and Technology, 2011, 71, 433-442.	3.8	43
155	Micromechanical Modeling of Metal Forming Operations. , 2011, , .		0
156	Qualitative study on texture evolution in rolled sheet metals using homogenization methods. , 2011, , .		0
157	Partitioned Fluidâ€“Solid Coupling for Cardiovascular Blood Flow. Annals of Biomedical Engineering, 2010, 38, 1426-1441.	1.3	57
158	Threeâ€dimensional finite element implementation of the nonuniform transformation field analysis. International Journal for Numerical Methods in Engineering, 2010, 84, 803-829.	1.5	61
159	Elastic properties of polycrystalline microcomponents. Mechanics of Materials, 2010, 42, 11-23.	1.7	40
160	A pseudoelastic model for mechanical twinning on the microscale. ZAMM Zeitschrift Fur Angewandte Mathematik Und Mechanik, 2010, 90, 565-594.	0.9	9
161	Deep Drawing Simulations Based on Microstructural Data. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 69-70.	0.2	2
162	Study of Experimental Methods for Interface Problems Based on Virtual Testing. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 109-110.	0.2	2

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163	Thermal Residual Stresses and Triaxiality Measures. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 137-138.	0.2	2
164	Estimate of the Thermoelastic Properties of Pyrolytic Carbon based on an Image Segmentation Technique. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 281-282.	0.2	2
165	Gradient Plasticity for Single Crystals. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 351-352.	0.2	2
166	Influence of the number of grains in a polycrystal on the prediction of texture during rolling by using the Taylor approach. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 415-416.	0.2	1
167	Micromechanically based stress and strain-rate flow potentials for anisotropic polycrystals. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 433-434.	0.2	0
168	Mathematical Evaluation of EBSD Data. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 717-718.	0.2	0
169	Numerical Studies of the Influence of the Porosity on Macroscopic Elastic Properties of Carbon/Carbon Composites. Proceedings in Applied Mathematics and Mechanics, 2010, 10, 719-720.	0.2	2
170	Plastic deformation behaviour of Feâ€“Cu composites predicted by 3D finite element simulations. Computational Materials Science, 2010, 48, 456-465.	1.4	16
171	Prediction of the Elastic Properties of Polycrystalline Microcomponents by Numerical Homogenization. Advanced Engineering Materials, 2009, 11, 158-161.	1.6	1
172	Periodic three-dimensional mesh generation for crystalline aggregates based on Voronoi tessellations. Computational Mechanics, 2009, 43, 701-713.	2.2	162
173	Numerical methods for the quantification of the mechanical properties of crystal aggregateswith morphologic and crystallographic texture. International Journal of Material Forming, 2009, 2, 915-917.	0.9	5
174	Representation of effective flow potentials for polycrystals based on texture data. International Journal of Material Forming, 2009, 2, 451-454.	0.9	2
175	Effective Flow Potentials for Anisotropic Polycrystals. Proceedings in Applied Mathematics and Mechanics, 2009, 9, 315-316.	0.2	0
176	Analytical inversion of the Jacobian for a class of generalized standard materials. Proceedings in Applied Mathematics and Mechanics, 2009, 9, 407-408.	0.2	1
177	Incremental self-consistent approach for the estimation of nonlinear material behavior of metal matrix composites. Proceedings in Applied Mathematics and Mechanics, 2009, 9, 427-428.	0.2	0
178	Bounds for the Elastic Properties of Pyrolytic Carbon. Proceedings in Applied Mathematics and Mechanics, 2009, 9, 431-434.	0.2	3
179	Geometrically non-linear modeling of the Portevinâ€“Le Chatelier effect. Computational Materials Science, 2009, 44, 1076-1088.	1.4	73
180	Estimation of mechanical properties of polycrystalline microcomponents. International Journal of Material Forming, 2008, 1, 447-450.	0.9	3

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181	A micro-mechanically based quadratic yield condition for textured polycrystals. International Journal of Material Forming, 2008, 1, 209-212.	0.9	1
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