Jian-Li Shao

List of Publications by Year
in descending order

36	546	567144 15	677027 22
papers	citations	h-index	g-index

36	36	36	219
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Sudden change of spall strength induced by shock defects based on atomistic simulation of single crystal aluminum. Scripta Materialia, 2022, 210, 114474.	2.6	19
2	Chemical reaction of Ni/Al interface associated with perturbation growth under shock compression. Physics of Fluids, 2022, 34, .	1.6	8
3	Evolution of Preset Void and Damage Characteristics in Aluminum during Shock Compression and Release. Nanomaterials, 2022, 12, 1853.	1.9	1
4	Deformation and damage characteristics of copper/honeycomb-graphene under shock loading. International Journal of Mechanical Sciences, 2022, 230, 107544.	3.6	6
5	Reversibility of the structural transition in single crystal iron driven by uniaxial and triaxial strains: Atomistic study. International Journal of Mechanical Sciences, 2021, 191, 106064.	3.6	10
6	Damage and self-healing characteristics of monolayer graphene enhanced Cu under ballistic impact. Mechanics of Materials, 2021, 155, 103736.	1.7	15
7	Molecular dynamics study on the nanovoid collapse and local deformation in shocked Cu50Zr50 metallic glasses. Journal of Non-Crystalline Solids, 2021, 559, 120703.	1.5	13
8	The effect of initial densification on the spallation damage of silica glass induced by planar impact. Mechanics of Materials, 2021, 160, 103931.	1.7	2
9	An improved model of damage depth of shock-melted metal in microspall under triangular wave loading*. Chinese Physics B, 2021, 30, 096202.	0.7	1
10	Collapse of stacking fault tetrahedron and dislocation evolution in copper under shock compression. Journal of Nuclear Materials, 2021, 554, 153081.	1.3	14
11	Microscopic and Macroscopic Fragmentation Characteristics under Hypervelocity Impact Based on MD and SPH Method. Nanomaterials, 2021, 11, 2953.	1.9	3
12	Atomistic Simulations on Metal Rod Penetrating Thin Target at Nanoscale Caused by High-Speed Collision. Nanomaterials, 2021, 11, 3160.	1.9	1
13	Damage characteristics of aluminum nanorod under hypervelocity impact. Computational Materials Science, 2020, 174, 109490.	1.4	12
14	Microscopic insight into the structural transition of single crystal iron under the ramp wave loading. Computational Materials Science, 2020, 182, 109772.	1.4	4
15	A boron-exposed TiB₃ monolayer with a lower electrostatic-potential surface as a higher-performance anode material for Li-ion and Na-ion batteries. Physical Chemistry Chemical Physics, 2020, 22, 22236-22243.	1.3	31
16	Atomistic study on the dynamic response of the void or helium bubble in aluminum under compression and tension. Journal of Applied Physics, 2020, 127, .	1.1	23
17	Molecular dynamics study on dynamic response of void-included aluminum under different loading patterns. International Journal of Mechanical Sciences, 2020, 181, 105707.	3.6	18
18	Atomistic insight into the thermodynamic properties and the surrounding deformation of high-pressurized He bubbles in Al. Computational Materials Science, 2020, 180, 109699.	1.4	9

#	Article	IF	Citations
19	Mechanical and microstructural response of densified silica glass under uniaxial compression: Atomistic simulations*. Chinese Physics B, 2020, 29, 108101.	0.7	5
20	Microjet formation from the grooved surface of aluminum under shock waves with different pulse durations. Modelling and Simulation in Materials Science and Engineering, 2020, 28, 065013.	0.8	3
21	Atomistic simulations and modeling analysis on the spall damage in lead induced by decaying shock. Mechanics of Materials, 2019, 131, 78-83.	1.7	22
22	Molecular dynamics study on nanoscale void collapse in single crystal aluminum under 1D and 3D compressions. Computational Materials Science, 2019, 161, 385-393.	1.4	9
23	Spall damage in single crystal Al with helium bubbles under decaying shock loading via molecular dynamics study. Computational Materials Science, 2019, 162, 255-267.	1.4	37
24	Effects of defects and microstructure on release melting of shock-loaded copper: Atomistic simulations. Journal of Applied Physics, 2018, 123, .	1.1	4
25	Hcp/fcc nucleation in bcc iron under different anisotropic compressions at high strain rate: Molecular dynamics study. Scientific Reports, 2018, 8, 7650.	1.6	21
26	Atomistic simulations on the dynamic properties of shock and release melting in single crystal Al. Computational Materials Science, 2018, 151, 240-245.	1.4	13
27	Effects of temperature and void on the dynamics and microstructure of structural transition in single crystal iron. Journal of Physics Condensed Matter, 2018, 30, 255401.	0.7	12
28	Influence of shock pressure and profile on the microjetting from a grooved Pb surface. Modelling and Simulation in Materials Science and Engineering, 2017, 25, 015011.	0.8	15
29	Molecular dynamics simulations of ejecta size distributions for shock-loaded Cu with a wedged surface groove. Computational Materials Science, 2015, 98, 271-277.	1.4	34
30	Compression-induced stacking fault tetrahedra around He bubbles in Al. Journal of Applied Physics, 2014, 116, .	1.1	13
31	Influence of voids or He bubbles on the spall damage in single crystal Al. Modelling and Simulation in Materials Science and Engineering, 2014, 22, 025012.	0.8	29
32	Spall strength of aluminium single crystals under high strain rates: Molecular dynamics study. Journal of Applied Physics, 2013, 114, 173501.	1.1	33
33	Molecular dynamics study on the failure modes of aluminium under decaying shock loading. Journal of Applied Physics, 2013, 113, .	1.1	27
34	Atomistic simulations of shock-induced microjet from a grooved aluminium surface. Journal of Applied Physics, 2013, 113, .	1.1	43
35	Atomistic simulations of shock induced melting of bicrystal copper with twist grain boundary. Journal of Applied Physics, 2012, 112, 103516.	1.1	8
36	Shock melting of single crystal copper with a nanovoid: Molecular dynamics simulations. Journal of Applied Physics, 2012, 112, .	1.1	28