Ali Tehranchi

List of Publications by Year
in descending order

13	557	758635 12	1125271 13
papers	citations	h-index	g-index

13	13	13	471
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Mechanism and Prediction of Hydrogen Embrittlement in fcc Stainless Steels and High Entropy Alloys. Physical Review Letters, 2021, 127, 175501.	2.9	20
2	A decohesion pathway for hydrogen embrittlement in nickel: Mechanism and quantitative prediction. Acta Materialia, 2020, 185, 98-109.	3.8	55
3	The role of atomistic simulations in probing hydrogen effects on plasticity and embrittlement in metals. Engineering Fracture Mechanics, 2019, 216, 106502.	2.0	51
4	Solute strengthening of basal slip in Mg alloys. Acta Materialia, 2018, 151, 56-66.	3.8	87
5	Multiscale Modelling of Hydrogen Transport and Segregation in Polycrystalline Steels. Metals, 2018, 8, 430.	1.0	21
6	Atomistic study of hydrogen embrittlement of grain boundaries in nickel: I. Fracture. Journal of the Mechanics and Physics of Solids, 2017, 101, 150-165.	2.3	84
7	Softening and hardening of yield stress by hydrogenâ€“solute interactions. Philosophical Magazine, 2017, 97, 400-418.	0.7	34
8	Hydrogenâ€“vacancyâ€“dislocation interactions inÎ±-Fe. Modelling and Simulation in Materials Science and Engineering, 2017, 25, 025001.	0.8	28
9	Atomistic study of hydrogen embrittlement of grain boundaries in nickel: II. Decohesion. Modelling and Simulation in Materials Science and Engineering, 2017, 25, 075013.	0.8	21
10	Ab initio calculations of characteristic lengths of crystalline materials in first strain gradient elasticity. Mechanics of Materials, 2013, 61, 73-78.	1.7	52
11	Calculation of the Additional Constants for fcc Materials in Second Strain Gradient Elasticity: Behavior of a Nano-Size Bernoulli-Euler Beam With Surface Effects. Journal of Applied Mechanics, Transactions ASME, 2012, 79, .	1.1	56
12	On the viscoelastic beam subjected to moving mass. Advances in Engineering Software, 2010, 41, 240-247.	1.8	12
13	A formulation for the characteristic lengths of fcc materials in first strain gradient elasticity via the Suttonâ€“Chen potential. Philosophical Magazine, 2010, 90, 1893-1913.	0.7	36