Joshua D Coe

List of Publications by Year
in descending order

34 papers	1,273 citations	566801 15 h-index	395343 33 g-index
35 all docs	35 docs citations	35 times ranked	1332 citing authors

#	Article	IF	Citations
1	Optimizing Conical Intersections without Derivative Coupling Vectors:â€‰Application to Multistate Multireference Second-Order Perturbation Theory (MS-CASPT2). Journal of Physical Chemistry B, 2008, 112, 405-413.	1.2	340
2	Implementation of ab initio multiple spawning in the Molpro quantum chemistry package. Chemical Physics, 2008, 347, 3-16.	0.9	190
3	Competitive Decay at Two- and Three-State Conical Intersections in Excited-State Intramolecular Proton Transfer. Journal of the American Chemical Society, 2005, 127, 4560-4561.	6.6	117
4	Ab Initio Molecular Dynamics of Excited-State Intramolecular Proton Transfer Using Multireference Perturbation Theory. Journal of Physical Chemistry A, 2007, 111, 11302-11310.	1.1	110
5	Ab Initio Molecular Dynamics of Excited-State Intramolecular Proton Transfer around a Three-State Conical Intersection in Malonaldehydeâ€. Journal of Physical Chemistry A, 2006, 110, 618-630.	1.1	92
6	An â€œoptimalâ€•spawning algorithm for adaptive basis set expansion in nonadiabatic dynamics. Journal of Chemical Physics, 2009, 130, 134113.	1.2	82
7	On the Extent and Connectivity of Conical Intersection Seams and the Effects of Three-State Intersections. Journal of Physical Chemistry A, 2008, 112, 12559-12567.	1.1	46
8	Ab initio multiple spawning dynamics of excited state intramolecular proton transfer: the role of spectroscopically dark states. Molecular Physics, 2008, 106, 537-545.	0.8	31
9	Shock-Driven Decomposition of Polymers and Polymeric Foams. Polymers, 2019, 11, 493.	2.0	30
10	Intermolecular Stabilization of 3,3â€²-Diamino-4,4â€²-azoxyfurazan (DAAF) Compressed to 20 GPa. Journal of Physical Chemistry A, 2014, 118, 5969-5982.	1.1	25
11	Shockwave response of two carbon fiber-polymer composites to 50â€‰GPa. Journal of Applied Physics, 2014, 116, .	1.1	24
12	Reactive, anomalous compression in shocked polyurethane foams. Journal of Applied Physics, 2014, 115, .	1.1	23
13	The influence of morphology on the low- and high-strain-rate compaction response of CeO2 powders. Journal of Applied Physics, 2014, 115, .	1.1	18
14	Nested Markov chain Monte Carlo sampling of a density functional theory potential: Equilibrium thermodynamics of dense fluid nitrogen. Journal of Chemical Physics, 2009, 131, 074105.	1.2	16
15	AWSD calibration for the HMX based explosive PBX 9501. AIP Conference Proceedings, 2020, , .	0.3	16
16	Modeling Deep Burn TRISO particle nuclear fuel. Journal of Nuclear Materials, 2012, 430, 181-189.	1.3	14
17	Chemical stability of molten 2,4,6-trinitrotoluene at high pressure. Applied Physics Letters, 2014, 104, .	1.5	13
18	Optimal sampling efficiency in Monte Carlo simulation with an approximate potential. Journal of Chemical Physics, 2009, 130, 164104.	1.2	12

#	Article	IF	Citations
19	Reactive Monte Carlo sampling with an ab initio potential. Journal of Chemical Physics, 2016, 144, 174109.	1.2	12
20	An efficient approach to ab initio Monte Carlo simulation. Journal of Chemical Physics, 2014, 140, 034106.	1.2	9
21	Shock-driven chemistry and reactive wave dynamics in liquid benzene. AIP Conference Proceedings, 2017, , .	0.3	9
22	Equations of state for polyethylene and its shock-driven decomposition products. Journal of Applied Physics, 2019, 126, .	1.1	9
23	Shock-induced chemistry of phenylacetylene. Journal of Physics: Conference Series, 2014, 500, 022004.	0.3	8
24	Polysulfone shock compressed above the decomposition threshold: Velocimetry and modeling of two-wave structures. Journal of Applied Physics, 2020, 127, 105902.	1.1	7
25	The equation of state and shock-driven decomposition of polymethylmethacrylate (PMMA). Journal of Applied Physics, 2022, 131, .	1.1	5
26	Multiphase equation of state and thermoelastic data for polycrystalline beryllium. AIP Conference Proceedings, 2020, , .	0.3	4
27	A reactive flow model for the 3,3â€²-diamino-4,4â€²-azoxyfurazan based plastic bonded explosive (PBX 9701). Journal of Applied Physics, 2021, 130, .	1.1	3
28	Equations of state and shock-driven chemistry in poly(dimethylsiloxane)-based foams. AIP Conference Proceedings, 2018, , .	0.3	2
29	Shockwave compression and dissociation of ammonia gas. Journal of Chemical Physics, 2019, 150, 024305.	1.2	2
30	A quantum chemical method for calculating vibrational line shifts in diatomic fluids. Chemical Physics Letters, 2008, 464, 265-270.	1.2	1
31	Deep-release of Epon 828 epoxy from the shock-driven reaction product phase. AIP Conference Proceedings, 2018, , .	0.3	1
32	Reshock analysis for PMMA driven above the threshold for chemical decomposition. AIP Conference Proceedings, 2020, , .	0.3	1
33	Hydrodynamic simulations of shock-driven chemistry in polyimide. AIP Conference Proceedings, 2020, , .	0.3	1
34	The Melt Enthalpy of Pu6Fe. Applied Sciences (Switzerland), 2021, 11, 10800.	1.3	0