Corey S O'Hern

List of Publications by Year
in descending order

37 papers	1,323 citations	567281 15 h-index	361022 35 g-index
38 all docs	38 docs citations	38 times ranked	1918 citing authors

#	Article	IF	Citations
1	Glass-forming ability of binary Lennard-Jones systems. Physical Review Materials, 2022, 6, .	2.4	3
2	Using delaunay triangularization to characterize non-affine displacement fields during athermal, quasistatic deformation of amorphous solids. Soft Matter, 2021, 17, 8612-8623.	2.7	5
3	Shear response of granular packings compressed above jamming onset. Physical Review E, 2021, 103, 022902.	2.1	10
4	Bridging particle deformability and collective response in soft solids. Physical Review Materials, 2021, 5, .	2.4	17
5	Static-state particle fabrication via rapid vitrification of a thixotropic medium. Nature Communications, 2021, 12, 3768.	12.8	4
6	Mechanical response of packings of nonspherical particles: A case study of two-dimensional packings of circulo-lines. Physical Review E, 2021, 104, 014901.	2.1	2
7	The structural, vibrational, and mechanical properties of jammed packings of deformable particles in three dimensions. Soft Matter, 2021, 17, 9901-9915.	2.7	14
8	Contact network changes in ordered and disordered disk packings. Soft Matter, 2020, 16, 9443-9455.	2.7	11
9	Cover Image, Volume 88, Issue 9. Proteins: Structure, Function and Bioinformatics, 2020, 88, C1.	2.6	2
10	Analyses of protein cores reveal fundamental differences between solution and crystal structures. Proteins: Structure, Function and Bioinformatics, 2020, 88, 1154-1161.	2.6	13
11	Pressure Dependent Shear Response of Jammed Packings of Frictionless Spherical Particles. Physical Review Letters, 2020, 124, 038004.	7.8	20
12	Homogeneous Crystallization in Cyclically Sheared Frictionless Grains. Physical Review Letters, 2020, 125, 258003.	7.8	6
13	Intrinsic dissipation mechanisms in metallic glass resonators. Journal of Chemical Physics, 2019, 151, 144506.	3.0	7
14	Comparison of shear and compression jammed packings of frictional disks. Granular Matter, 2019, 21, 1.	2.2	8
15	The role of deformability in determining the structural and mechanical properties of bubbles and emulsions. Soft Matter, 2019, 15, 5854-5865.	2.7	30
16	Supercluster-coupled crystal growth in metallic glass forming liquids. Nature Communications, 2019, 10, 915.	12.8	30
17	Jammed packings of 3D superellipsoids with tunable packing fraction, coordination number, and ordering. Soft Matter, 2019, 15, 9751-9761.	2.7	15
18	Jamming of Deformable Polygons. Physical Review Letters, 2018, 121, 248003.	7.8	81

#	Article	IF	Citations
19	Mechanical glass transition revealed by the fracture toughness of metallic glasses. Nature Communications, 2018, 9, 3271.	12.8	103
20	Stable small bubble clusters in two-dimensional foams. Soft Matter, 2017, 13, 4370-4380.	2.7	1
21	Anomaly Detection in Host Signaling Pathways for the Early Prognosis of Acute Infection. PLoS ONE, 2016, 11, e0160919.	2.5	13
22	Beyond packing of hard spheres: The effects of core softness, non-additivity, intermediate-range repulsion, and many-body interactions on the glass-forming ability of bulk metallic glasses. Journal of Chemical Physics, 2015, 143, 184502.	3.0	18
23	The glass-forming ability of model metal-metalloid alloys. Journal of Chemical Physics, 2015, 142, 104504.	3.0	15
24	On the origin of multi-component bulk metallic glasses: Atomic size mismatches and de-mixing. Journal of Chemical Physics, 2015, 143, 054501.	3.0	25
25	Outcome Prediction in Mathematical Models of Immune Response to Infection. PLoS ONE, 2015, 10, e0135861.	2.5	9
26	Vibrations of jammed disk packings with Hertzian interactions. Granular Matter, 2014, 16, 209-216.	2.2	17
27	The Bacterial Cytoplasm Has Glass-like Properties and Is Fluidized by Metabolic Activity. Cell, 2014, 156, 183-194.	28.9	643
28	Intrinsic Î±â€helical and Î²â€sheet conformational preferences: A computational case study of alanine. Protein Science, 2014, 23, 970-980.	7.6	18
29	Flows and patterns: The physics of fluids, granular materials, and soft matter. Granular Matter, 2014, 16, 163-164.	2.2	0
30	Angiopoietin-1, Angiopoietin-2 and Bicarbonate as Diagnostic Biomarkers in Children with Severe Sepsis. PLoS ONE, 2014, 9, e108461.	2.5	17
31	New Insights into the Interdependence between Amino Acid Stereochemistry and Protein Structure. Biophysical Journal, 2013, 105, 2403-2411.	0.5	13
32	Iterative feature removal yields highly discriminative pathways. BMC Genomics, 2013, 14, 832.	2.8	16
33	Computational studies of the glass-forming ability of model bulk metallic glasses. Journal of Chemical Physics, 2013, 139, 124503.	3.0	29
34	Highly evolved grains. Nature Materials, 2013, 12, 287-288.	27.5	3
35	Isostaticity at Frictional Jamming. Physical Review Letters, 2013, 110, 198002.	7.8	63
36	Which Biomarkers Reveal Neonatal Sepsis?. PLoS ONE, 2013, 8, e82700.	2.5	33

#	Article	IF	Citations
37	Molecular simulations of the fluctuating conformational dynamics of intrinsically disordered proteins. Physical Review E, 2012, 86, 041910.	2.1	8