Gordon F Christopher

List of Publications by Year
in descending order

38	2,023	331259	344852
papers	citations	21 h-index	36 g-index

38	38	38	2615
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Microfluidic methods for generating continuous droplet streams. Journal Physics D: Applied Physics, 2007, 40, R319-R336.	1.3	677
2	Experimental observations of the squeezing-to-dripping transition in T-shaped microfluidic junctions. Physical Review E, 2008, 78, 036317.	0.8	291
3	Coalescence and splitting of confined droplets at microfluidic junctions. Lab on A Chip, 2009, 9, 1102.	3.1	176
4	3D printing of an extremely tough hydrogel. RSC Advances, 2015, 5, 81324-81329.	1.7	97
5	Characterizing the feasibility of processing wet granular materials to improve rheology for 3D printing. Journal of Materials Science, 2017, 52, 13040-13053.	1.7	68
6	Large Deborah number flows around confined microfluidic cylinders. Rheologica Acta, 2013, 52, 485-497.	1.1	59
7	Simultaneous Interfacial Rheology and Microstructure Measurement of Densely Aggregated Particle Laden Interfaces Using a Modified Double Wall Ring Interfacial Rheometer. Langmuir, 2014, 30, 9752-9760.	1.6	59
8	3D printed agar/ calcium alginate hydrogels with high shape fidelity and tailorable mechanical properties. Polymer, 2021, 214, 123238.	1.8	44
9	Combined interfacial shear rheology and microstructure visualization of asphaltenes at air-water and oil-water interfaces. Journal of Rheology, 2018, 62, 1-10.	1.3	43
10	The nonlinear viscoelasticity of hyaluronic acid and its role in joint lubrication. Soft Matter, 2015, 11, 2596-2603.	1.2	41
11	Growth of viscoelastic instabilities around linear cylinder arrays. Physics of Fluids, 2016, 28, .	1.6	41
12	Role of capillarity and microstructure on interfacial viscoelasticity of particle laden interfaces. Journal of Rheology, 2016, 60, 35-45.	1.3	40
13	Mechanisms of onset for moderate Mach number instabilities of viscoelastic flows around confined cylinders. Rheologica Acta, 2015, 54, 805-815.	1.1	38
14	Contact Angle Distribution of Particles at Fluid Interfaces. Langmuir, 2015, 31, 891-897.	1.6	36
15	Development of a MEMS based dynamic rheometer. Lab on A Chip, 2010, 10, 2749.	3.1	35
16	Ultrasensitive Wearable Strain Sensors of 3D Printing Tough and Conductive Hydrogels. Polymers, 2019, 11, 1873.	2.0	30
17	Spreading, encapsulation and transition to arrested shapes during drop impact onto hydrophobic powders. Journal of Colloid and Interface Science, 2016, 468, 10-20.	5.0	28
18	Role of Flagella, Type IV Pili, Biosurfactants, and Extracellular Polymeric Substance Polysaccharides on the Formation of Pellicles by Pseudomonas aeruginosa. Langmuir, 2019, 35, 5294-5304.	1.6	26

#	Article	IF	Citations
19	The role of protein content on the steady and oscillatory shear rheology of model synovial fluids. Soft Matter, 2014, 10, 5965-5973.	1.2	25
20	3D processing and characterization of acrylonitrile butadiene styrene (ABS) energetic thin films. Journal of Materials Science, 2017, 52, 993-1004.	1.7	25
21	Modifying interfacial interparticle forces to alter microstructure and viscoelasticity of densely packed particle laden interfaces. Journal of Colloid and Interface Science, 2019, 536, 30-41.	5.0	23
22	2D stokesian simulation of particle aggregation at quiescent air/oil-water interfaces. Journal of Colloid and Interface Science, 2019, 553, 259-268.	5.0	13
23	Effect of collagen and EPS components on the viscoelasticity of Pseudomonas aeruginosa biofilms. Soft Matter, 2021, 17, 6225-6237.	1.2	13
24	Microrheology of Pseudomonas aeruginosa biofilms grown in wound beds. Npj Biofilms and Microbiomes, 2022, 8, .	2.9	13
25	Effect of Particulate Contaminants on the Development of Biofilms at Air/Water Interfaces. Langmuir, 2016, 32, 2724-2730.	1.6	12
26	Interfacial Viscoelasticity of Self-Assembled Hydrophobic/Hydrophilic Particles at an Air/Water Interface. Langmuir, 2019, 35, 13116-13125.	1.6	12
27	Effect of interfacial viscoelasticity on the bulk linear viscoelastic moduli of globular protein solutions. Physical Review E, 2014, 89, 052306.	0.8	10
28	Correlation between valvular interstitial cell morphology and phenotypes: A novel way to detect activation. Tissue and Cell, 2018, 54, 38-46.	1.0	10
29	Rheological variability of Pseudomonas aeruginosa biofilms. Rheologica Acta, 2021, 60, 219-230.	1.1	9
30	Cavitation structures formed during the collision of a sphere with an ultra-viscous wetted surface. Journal of Fluid Mechanics, 2016, 796, 473-515.	1.4	7
31	2D Stokesian Approach to Modeling Flow Induced Deformation of Particle Laden Interfaces. Langmuir, 2018, 34, 904-916.	1.6	4
32	Effects of Shear Rate during Energetic Material Processing on Reactivity. Advanced Engineering Materials, 2019, 21, 1801324.	1.6	4
33	Synthesis and characterization of polymeric films with stress-altered aluminum particle fillers. Journal of Materials Science, 2020, 55, 14229-14242.	1.7	4
34	Effects of non-ionic surfactant on the formation of pellicles by Pseudomonas aeruginosa. Rheologica Acta, 2022, 61, 59-68.	1.1	4
35	Two component model oils for interfacial shear characterization. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2019, 583, 123780.	2.3	3
36	Rheological behavior of a low crystallinity polyolefin-modified asphalt binder for flexible pavements. Case Studies in Construction Materials, 2021, 15, e00640.	0.8	3

#	Article	IF	Citations
37	Droplet Breakup in Shear and Elongation Dominated Flows in Microfluidic Devices. , 2005, , 669.		0
38	Sub-Diffraction Limit Three Dimensional Particle Tracking Velocimetry. , 2013, , .		0