William D Ristenpart

List of Publications by Year
in descending order

64 papers	4,250 citations	218677 26 h-index	144013 57 g-index
66 all docs	66 docs citations	66 times ranked	5939 citing authors

#	Article	IF	Citations
1	Acids in coffee: A review of sensory measurements and meta-analysis of chemical composition. Critical Reviews in Food Science and Nutrition, 2023, 63, 1010-1036.	10.3	31
2	A highly efficient cloth facemask design. Aerosol Science and Technology, 2022, 56, 12-28.	3.1	9
3	Roast level and brew temperature significantly affect the color of brewed coffee. Journal of Food Science, 2022, 87, 1837-1850.	3.1	12
4	Net motion induced by nonantiperiodic vibratory or electrophoretic excitations with zero time average. Physical Review E, 2022, 105, .	2.1	4
5	Consumer preferences for black coffee are spread over a wide range of brew strengths and extraction yields. Journal of Food Science, 2021, 86, 194-205.	3.1	19
6	Titratable Acidity, Perceived Sourness, and Liking of Acidity in Drip Brewed Coffee. ACS Food Science & Technology, 2021, 1, 559-569.	2.7	11
7	An equilibrium desorption model for the strength and extraction yield of full immersion brewed coffee. Scientific Reports, 2021, 11, 6904.	3.3	7
8	Expiratory aerosol particle escape from surgical masks due to imperfect sealing. Scientific Reports, 2021, 11, 12110.	3.3	47
9	A comprehensive analysis of operations and mass flows in postharvest processing of washed coffee. Resources, Conservation and Recycling, 2021, 170, 105554.	10.8	11
10	Non-respiratory particles emitted by guinea pigs in airborne disease transmission experiments. Scientific Reports, 2021, 11, 17490.	3.3	7
11	Brew temperature, at fixed brew strength and extraction, has little impact on the sensory profile of drip brew coffee. Scientific Reports, 2020, 10, 16450.	3.3	18
12	Effects of brew strength, brew yield, and roast on the sensory quality of drip brewed coffee. Journal of Food Science, 2020, 85, 2530-2543.	3.1	31
13	Efficacy of masks and face coverings in controlling outward aerosol particle emission from expiratory activities. Scientific Reports, 2020, 10, 15665.	3.3	284
14	Influenza A virus is transmissible via aerosolized fomites. Nature Communications, 2020, 11, 4062.	12.8	83
15	A perturbation solution to the full Poissonâ€“Nernstâ€“Planck equations yields an asymmetric rectified electric field. Soft Matter, 2020, 16, 7052-7062.	2.7	15
16	The coronavirus pandemic and aerosols: Does COVID-19 transmit via expiratory particles?. Aerosol Science and Technology, 2020, 54, 635-638.	3.1	522
17	Effect of voicing and articulation manner on aerosol particle emission during human speech. PLoS ONE, 2020, 15, e0227699.	2.5	138
18	Sensory and monosaccharide analysis of drip brew coffee fractions versus brewing time. Journal of the Science of Food and Agriculture, 2020, 100, 2953-2962.	3.5	20

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19	Asymmetric rectified electric fields generate flows that can dominate induced-charge electrokinetics. Physical Review Fluids, 2020, 5, .	2.5	20
20	Correlating dynamic microstructure to observed color in electrophoretic displays via in situ small-angle x-ray scattering. Physical Review Materials, 2020, 4, .	2.4	6
21	Splashing during impact on heated granular beds. Physical Review Fluids, 2020, 5, .	2.5	0
22	Effect of voicing and articulation manner on aerosol particle emission during human speech. , 2020, 15, e0227699.		0
23	Effect of voicing and articulation manner on aerosol particle emission during human speech. , 2020, 15, e0227699.		0
24	Effect of voicing and articulation manner on aerosol particle emission during human speech. , 2020, 15, e0227699.		0
25	Effect of voicing and articulation manner on aerosol particle emission during human speech. , 2020, 15, e0227699.		0
26	Effect of Basket Geometry on the Sensory Quality and Consumer Acceptance of Drip Brewed Coffee. Journal of Food Science, 2019, 84, 2297-2312.	3.1	24
27	Asymmetric rectified electric fields between parallel electrodes: Numerical and scaling analyses. Physical Review E, 2019, 99, 062603.	2.1	12
28	Extreme Levitation of Colloidal Particles in Response to Oscillatory Electric Fields. Langmuir, 2019, 35, 6971-6980.	3.5	17
29	Aerosol emission and superemission during human speech increase with voice loudness. Scientific Reports, 2019, 9, 2348.	3.3	709
30	Statistical Analysis of Droplet Charge Acquired during Contact with Electrodes in Strong Electric Fields. Langmuir, 2019, 35, 3937-3948.	3.5	8
31	A spike in mechanotransductive adenosine triphosphate release from red blood cells in microfluidic constrictions only occurs with rare donors. Microcirculation, 2018, 25, e12439.	1.8	4
32	Centrifugation-induced release of ATP from red blood cells. PLoS ONE, 2018, 13, e0203270.	2.5	11
33	Oscillating Electric Fields in Liquids Create a Long-Range Steady Field. Physical Review Letters, 2018, 121, 185504.	7.8	40
34	Low-Voltage Electrical Demulsification of Oily Wastewater. Industrial & Engineering Chemistry Research, 2018, 57, 8341-8347.	3.7	26
35	Droplet Conductivity Strongly Influences Bump and Crater Formation on Electrodes during Charge Transfer. Langmuir, 2018, 34, 7284-7293.	3.5	4
36	Quantitative Differentiation of Bloodstain Patterns Resulting from Gunshot and Blunt Force Impacts. Journal of Forensic Sciences, 2017, 62, 1166-1179.	1.6	13

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37	Measurement of Charge Transfer to Aqueous Droplets in High Voltage Electric Fields. Langmuir, 2017, 33, 13945-13954.	3.5	10
38	Influence of Electrolyte Concentration on the Aggregation of Colloidal Particles near Electrodes in Oscillatory Fields. Langmuir, 2016, 32, 4210-4216.	3.5	17
39	Red Blood Cells from Individuals with Abdominal Obesity or Metabolic Abnormalities Exhibit Less Deformability upon Entering a Constriction. PLoS ONE, 2016, 11, e0156070.	2.5	30
40	Quantitative bloodstain analysis: Differentiation of contact transfer patterns versus spatter patterns on fabric via microscopic inspection. Forensic Science International, 2015, 249, 233-240.	2.2	18
41	Simultaneous Aggregation and Height Bifurcation of Colloidal Particles near Electrodes in Oscillatory Electric Fields. Langmuir, 2015, 31, 9742-9747.	3.5	19
42	Turbulent dispersion via fan-generated flows. Physics of Fluids, 2014, 26, 055114.	4.0	4
43	Mechanical response of red blood cells entering a constriction. Biomicrofluidics, 2014, 8, 064123.	2.4	23
44	Direct Observation of Aggregative Nanoparticle Growth: Kinetic Modeling of the Size Distribution and Growth Rate. Nano Letters, 2014, 14, 373-378.	9.1	172
45	Electrolyte-Dependent Aggregation of Colloidal Particles near Electrodes in Oscillatory Electric Fields. Langmuir, 2014, 30, 4887-4894.	3.5	34
46	Direct Observation of Aggregative Nanoparticle Growth: Kinetic Modeling of the Size Distribution and Growth Rate. Microscopy and Microanalysis, 2014, 20, 1612-1613.	0.4	0
47	Experimental procedures to mitigate electron beam induced artifacts during in situ fluid imaging of nanomaterials. Ultramicroscopy, 2013, 127, 53-63.	1.9	176
48	Hexatic-to-Disorder Transition in Colloidal Crystals Near Electrodes: Rapid Annealing of Polycrystalline Domains. Physical Review Letters, 2013, 111, 128302.	7.8	32
49	Transient reduction of the drag coefficient of charged droplets via the convective reversal of stagnant caps. Physics of Fluids, 2012, 24, 012101.	4.0	27
50	Direct in Situ Observation of Nanoparticle Synthesis in a Liquid Crystal Surfactant Template. ACS Nano, 2012, 6, 3589-3596.	14.6	93
51	Direct in Situ Determination of the Mechanisms Controlling Nanoparticle Nucleation and Growth. ACS Nano, 2012, 6, 8599-8610.	14.6	378
52	Enhanced electroporation in plant tissues via low frequency pulsed electric fields: Influence of cytoplasmic streaming. Biotechnology Progress, 2012, 28, 445-453.	2.6	16
53	A Comprehensive Breath Plume Model for Disease Transmission via Expiratory Aerosols. PLoS ONE, 2012, 7, e37088.	2.5	43
54	Magnetically Induced Decrease in Droplet Contact Angle on Nanostructured Surfaces. Langmuir, 2011, 27, 11747-11751.	3.5	41

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55	Permeabilization of Plant Tissues by Monopolar Pulsed Electric Fields: Effect of Frequency. Journal of Food Science, 2011, 76, E98-111.	3.1	65
56	Critical Electric Field Strengths of Onion Tissues Treated by Pulsed Electric Fields. Journal of Food Science, 2010, 75, E433-43.	3.1	73
57	Bubble formation via multidrop impacts. Physics of Fluids, 2010, 22, .	4.0	13
58	Dynamic Angular Segregation of Vesicles in Electrohydrodynamic Flows. Langmuir, 2010, 26, 9429-9436.	3.5	6
59	The dynamic behavior of chemically â€œstiffenedâ€•red blood cells in microchannel flows. Microvascular Research, 2010, 80, 37-43.	2.5	143
60	10.1063/1.3397851.1. , 2010, , .		1
61	Critical Angle for Electrically Driven Coalescence of Two Conical Droplets. Physical Review Letters, 2009, 103, 164502.	7.8	118
62	Non-coalescence of oppositely charged drops. Nature, 2009, 461, 377-380.	27.8	235
63	Enzymatic Reactions in Microfluidic Devices:â€‰ Michaelisâ˜Menten Kinetics. Analytical Chemistry, 2008, 80, 3270-3276.	6.5	65
64	Dynamics of shear-induced ATP release from red blood cells. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 16432-16437.	7.1	235