Christophe Clanet

List of Publications by Year
in descending order

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90 papers	7,661 citations	87723 38 h-index	49773 87 g-index
91 all docs	91 docs citations	91 times ranked	5254 citing authors

#	Article	IF	Citations
1	Contact time of a bouncing drop. Nature, 2002, 417, 811-811.	13.7	959
2	Maximal deformation of an impacting drop. Journal of Fluid Mechanics, 2004, 517, 199-208.	1.4	867
3	Leidenfrost drops. Physics of Fluids, 2003, 15, 1632.	1.6	454
4	On the â€œtulip flameâ€•phenomenon. Combustion and Flame, 1996, 105, 225-238.	2.8	368
5	Making a splash with water repellency. Nature Physics, 2007, 3, 180-183.	6.5	335
6	Leidenfrost on a ratchet. Nature Physics, 2011, 7, 395-398.	6.5	301
7	Antifogging abilities of model nanotextures. Nature Materials, 2017, 16, 658-663.	13.3	288
8	Transition from dripping to jetting. Journal of Fluid Mechanics, 1999, 383, 307-326.	1.4	279
9	On the elasticity of an inertial liquid shock. Journal of Fluid Mechanics, 2006, 554, 47.	1.4	228
10	Water spring: A model for bouncing drops. Europhysics Letters, 2003, 62, 237-243.	0.7	227
11	Dynamics of transient cavities. Journal of Fluid Mechanics, 2007, 591, 1-19.	1.4	194
12	Pyramidal and toroidal water drops after impact on a solid surface. Journal of Fluid Mechanics, 2003, 484, 69-83.	1.4	183
13	A universal law for capillary rise in corners. Journal of Fluid Mechanics, 2011, 666, 146-154.	1.4	161
14	Leidenfrost wheels. Nature Physics, 2018, 14, 1188-1192.	6.5	144
15	Dynamical superhydrophobicity. Faraday Discussions, 2010, 146, 19.	1.6	142
16	Capturing drops with a thin fiber. Journal of Colloid and Interface Science, 2004, 279, 192-197.	5.0	128
17	First Experimental Study of the Darrieus-Landau Instability. Physical Review Letters, 1998, 80, 3867-3870.	2.9	124
18	Life of a flapping liquid sheet. Journal of Fluid Mechanics, 2002, 462, 341-363.	1.4	124

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19	Drop friction on liquid-infused materials. Soft Matter, 2017, 13, 6981-6987.	1.2	110
20	The force of impacting rain. Soft Matter, 2014, 10, 4929-4934.	1.2	100
21	Life of a smooth liquid sheet. Journal of Fluid Mechanics, 2002, 462, 307-340.	1.4	95
22	Onset of menisci. Journal of Fluid Mechanics, 2002, 460, 131-149.	1.4	90
23	Viscous mechanism for Leidenfrost propulsion on a ratchet. Europhysics Letters, 2011, 96, 58001.	0.7	87
24	Atomization of undulating liquid sheets. Journal of Fluid Mechanics, 2007, 585, 421-456.	1.4	86
25	Secrets of successful stone-skipping. Nature, 2004, 427, 29-29.	13.7	85
26	Coating of a textured solid. Journal of Fluid Mechanics, 2011, 669, 55-63.	1.4	84
27	Landauâ€“Levich menisci. Journal of Colloid and Interface Science, 2011, 354, 359-363.	5.0	84
28	Water ring-bouncing on repellent singularities. Soft Matter, 2018, 14, 2227-2233.	1.2	79
29	On the motion of bubbles in vertical tubes of arbitrary cross-sections: some complements to the Dumitrescuâ€“Taylor problem. Journal of Fluid Mechanics, 2004, 519, 359-376.	1.4	75
30	Primary acoustic instability of flames propagating in tubes: cases of spray and premixed gas combustion. Journal of Fluid Mechanics, 1999, 385, 157-197.	1.4	72
31	Skipping stones. Journal of Fluid Mechanics, 2005, 543, 137.	1.4	65
32	Trapping Leidenfrost Drops with Crenelations. Physical Review Letters, 2011, 107, 114503.	2.9	54
33	How merging droplets jump off a superhydrophobic surface: Measurements and model. Physical Review Fluids, 2017, 2, .	1.0	52
34	Waterbells and Liquid Sheets. Annual Review of Fluid Mechanics, 2007, 39, 469-496.	10.8	47
35	Osmotically driven pipe flows and their relation to sugar transport in plants. Journal of Fluid Mechanics, 2009, 636, 371-396.	1.4	45
36	Dynamics and stability of water bells. Journal of Fluid Mechanics, 2001, 430, 111-147.	1.4	44

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37	Drops impacting inclined fibers. Journal of Colloid and Interface Science, 2009, 334, 70-74.	5.0	40
38	Superhydrophobic frictions. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 8220-8223.	3.3	40
39	Grabbing water. Soft Matter, 2010, 6, 5705.	1.2	36
40	Capillary muscle. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 6301-6306.	3.3	35
41	Critical wind speed at which trees break. Physical Review E, 2016, 93, 023001.	0.8	34
42	The effects of gravity on the capillary instability in tubes. Journal of Fluid Mechanics, 2006, 556, 217.	1.4	33
43	Wicking in a Powder. Langmuir, 2013, 29, 3636-3644.	1.6	31
44	On the shape of giant soap bubbles. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 2515-2519.	3.3	27
45	Jumping dynamics of aquatic animals. Journal of the Royal Society Interface, 2019, 16, 20190014.	1.5	26
46	Wave drag on floating bodies. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 15064-15068.	3.3	25
47	Sports Ballistics. Annual Review of Fluid Mechanics, 2015, 47, 455-478.	10.8	25
48	On the glug-glug of ideal bottles. Journal of Fluid Mechanics, 2004, 510, 145-168.	1.4	23
49	The spinning ball spiral. New Journal of Physics, 2010, 12, 093004.	1.2	23
50	Transient Surface Tension of an Expanding Liquid Sheet. Journal of Colloid and Interface Science, 2000, 230, 29-40.	5.0	22
51	Drop trampoline. Europhysics Letters, 2018, 124, 24003.	0.7	22
52	Ballistics of self-jumping microdroplets. Physical Review Fluids, 2019, 4, .	1.0	22
53	Viscous bouncing. Soft Matter, 2020, 16, 7270-7273.	1.2	21
54	On large-amplitude pulsating fountains. Journal of Fluid Mechanics, 1998, 366, 333-350.	1.4	19

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55	Capillary Extraction. Langmuir, 2011, 27, 9396-9402.	1.6	18
56	Drainage on a rough surface. Europhysics Letters, 2011, 94, 16002.	0.7	17
57	Soft, elastic, water-repellent materials. Applied Physics Letters, 2017, 110, .	1.5	17
58	Self-propelling droplets on fibres subject to a crosswind. Nature Physics, 2019, 15, 1027-1032.	6.5	17
59	Detergency in a tube. Soft Matter, 2011, 7, 7498.	1.2	16
60	Self-excitation of Leidenfrost drops and consequences on their stability. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	15
61	Air entrainment in hairy surfaces. Physical Review Fluids, 2016, 1, .	1.0	15
62	Flexible scraping of viscous fluids. Journal of Fluid Mechanics, 2013, 715, 424-435.	1.4	13
63	Explosions at the water surface. Journal of Fluid Mechanics, 2014, 752, 123-139.	1.4	13
64	A fluid mechanical view on abdominal aortic aneurysms. Journal of Fluid Mechanics, 2010, 664, 5-32.	1.4	11
65	Stability of Water Bells Generated by Jet Impacts on a Disk. Physical Review Letters, 2000, 85, 5106-5109.	2.9	10
66	Capillary instability on an elastic helix. Soft Matter, 2014, 10, 3225.	1.2	10
67	Friction properties of superhydrophobic ridges. Journal of Fluid Mechanics, 2020, 890, .	1.4	10
68	Thermophobic Leidenfrost. Soft Matter, 2021, 17, 8805-8809.	1.2	9
69	Thin or bulky: Optimal aspect ratios for ship hulls. Physical Review Fluids, 2018, 3, .	1.0	9
70	Shapes of hanging viscous filaments. Europhysics Letters, 2008, 84, 56004.	0.7	8
71	Physics of ball sports. Europhysics News, 2016, 47, 13-16.	0.1	7
72	Air-levitated platelets: from take off to motion. Journal of Fluid Mechanics, 2017, 814, 535-546.	1.4	7

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73	Wave drag on asymmetric bodies. Journal of Fluid Mechanics, 2019, 878, 147-168.	1.4	7
74	How localized force spreads on elastic contour feathers. Journal of the Royal Society Interface, 2019, 16, 20190267.	1.5	7
75	Football curves. Journal of Fluids and Structures, 2011, 27, 659-667.	1.5	6
76	Capillary descent. Soft Matter, 2018, 14, 5364-5368.	1.2	6
77	Hysteretic wave drag in shallow water. Physical Review Fluids, 2020, 5, .	1.0	6
78	Plunging cavities. Journal of Fluid Mechanics, 2011, 680, 1-4.	1.4	5
79	Successive instabilities of confined Leidenfrost puddles. Europhysics Letters, 2015, 112, 26002.	0.7	5
80	Shooting in a foam. Soft Matter, 2014, 10, 6696-6704.	1.2	4
81	Tightrope bubbles. Applied Physics Letters, 2019, 114, .	1.5	4
82	Coordination changes in front-crawl swimming. Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences, 2020, 476, 20200071.	1.0	4
83	Physics of road cycling and the three jerseys problem. Journal of Fluid Mechanics, 2021, 914, .	1.4	4
84	Weightlifting and the actomyosin cycle. Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences, 2015, 471, 20150473.	1.0	3
85	Path instabilities of streamlined bodies. Journal of Fluid Mechanics, 2019, 864, 286-302.	1.4	3
86	The Hydrodynamics of High Diving. Proceedings (mdpi), 2020, 49, 73.	0.2	3
87	Droplet hurdles race. Applied Physics Letters, 2021, 118, .	1.5	3
88	Cycling speeds in crosswinds. Physical Review Fluids, 2021, 6, .	1.0	2
89	Bubble capture by a propeller. Journal of Fluid Mechanics, 2006, 560, 311.	1.4	1
90	Reply to â€œComment on â€˜Critical wind speed at which trees breakâ€™ â€• Physical Review E, 2016, 94, 067002	2.8	0