

Andrea Prosperetti

List of Publications by Year in Descending Order

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

278
papers

13,475
citations

60
h-index

107
g-index

322
ext. papers

14,882
ext. citations

3.7
avg, IF

6.74
L-index

#	Paper	IF	Citations
278	Dynamics, heat and mass transfer of a plasmonic bubble on a solid surface. <i>International Journal of Heat and Mass Transfer</i> , 2021 , 167, 120814	4.9	0
277	Marangoni Instability of a Drop in a Stably Stratified Liquid. <i>Physical Review Letters</i> , 2021 , 126, 124502	7.4	7
276	Faster Taylor bubbles. <i>Journal of Fluid Mechanics</i> , 2021 , 920,	3.7	2
275	How ambient conditions affect the Leidenfrost temperature. <i>Soft Matter</i> , 2021 , 17, 3207-3215	3.6	6
274	Crown formation from a cavitating bubble close to a free surface. <i>Journal of Fluid Mechanics</i> , 2021 , 926,	3.7	6
273	Dynamics of a toroidal bubble on a cylinder surface with an application to geophysical exploration. <i>International Journal of Multiphase Flow</i> , 2020 , 129, 103335	3.6	7
272	Laminar flow past an infinite planar array of fixed particles: point-particle approximation, Oseen equations and resolved simulations. <i>Journal of Engineering Mathematics</i> , 2020 , 122, 139-157	1.2	0
271	Gas-Vapor Interplay in Plasmonic Bubble Shrinkage. <i>Journal of Physical Chemistry C</i> , 2020 , 124, 5861-5869	3.8	16
270	Capillary waves on a falling film. <i>Physical Review Fluids</i> , 2020 , 5,	2.8	2
269	Modelling large scale airgun-bubble dynamics with highly non-spherical features. <i>International Journal of Multiphase Flow</i> , 2020 , 122, 103143	3.6	25
268	A numerical study of mass transfer from laminar liquid films. <i>Journal of Fluid Mechanics</i> , 2020 , 902,	3.7	3
267	Plasmonic Microbubble Dynamics in Binary Liquids. <i>Journal of Physical Chemistry Letters</i> , 2020 , 11, 8631-8637	3.7	3
266	Modelling the thermal behaviour of gas bubbles. <i>Journal of Fluid Mechanics</i> , 2020 , 901,	3.7	10
265	Lamb's solution and the stress moments for a sphere in Stokes flow. <i>European Journal of Mechanics, B/Fluids</i> , 2020 , 79, 270-282	2.4	4
264	Transition to convection in single bubble diffusive growth. <i>Journal of Fluid Mechanics</i> , 2019 , 871, 332-349	3.7	2
263	Bouncing Oil Droplet in a Stratified Liquid and its Sudden Death. <i>Physical Review Letters</i> , 2019 , 122, 154502	7.4	25
262	Resolved simulations of sedimenting suspensions of spheres. <i>Physical Review Fluids</i> , 2019 , 4,	2.8	7

261	Rotational dynamics of a particle in a turbulent stream. <i>Physical Review Fluids</i> , 2019 , 4,	2.8	1
260	Violent expansion of a rising Taylor bubble. <i>Physical Review Fluids</i> , 2019 , 4,	2.8	5
259	Multiphase buoyant plumes with soluble drops or bubbles. <i>Physical Review Fluids</i> , 2019 , 4,	2.8	1
258	Differential formulation of the viscous history force on a particle for efficient and accurate computation. <i>Journal of Fluid Mechanics</i> , 2018 , 844, 970-993	3.7	9
257	Dynamics of Formation of a Vapor Nanobubble Around a Heated Nanoparticle. <i>Journal of Physical Chemistry C</i> , 2018 , 122, 20571-20580	3.8	16
256	Heat transfer from an array of resolved particles in turbulent flow. <i>Physical Review Fluids</i> , 2018 , 3,	2.8	2
255	Fully-resolved simulation of particulate flows with particles fluid heat transfer. <i>Journal of Computational Physics</i> , 2017 , 350, 638-656	4.1	8
254	Gas depletion through single gas bubble diffusive growth and its effect on subsequent bubbles. <i>Journal of Fluid Mechanics</i> , 2017 , 831, 474-490	3.7	15
253	Molecular dynamics study of multicomponent droplet dissolution in a sparingly miscible liquid. <i>Journal of Fluid Mechanics</i> , 2017 , 833, 54-69	3.7	5
252	Vapor Bubbles. <i>Annual Review of Fluid Mechanics</i> , 2017 , 49, 221-248	2.2	127
251	Mechanics of gas-vapor bubbles. <i>Physical Review Fluids</i> , 2017 , 2,	2.8	13
250	Bubble plumes in a stratified environment: Source parameters, scaling, intrusion height, and neutral height. <i>Physical Review Fluids</i> , 2017 , 2,	2.8	5
249	Continuity waves in resolved-particle simulations of fluidized beds. <i>Physical Review Fluids</i> , 2017 , 2,	2.8	5
248	Homogeneous nucleation: Patching the way from the macroscopic to the nanoscopic description. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016 , 113, 13549-13550 ^{11.5}	11.5	8
247	Dynamic Leidenfrost Effect: Relevant Time and Length Scales. <i>Physical Review Letters</i> , 2016 , 116, 064501 ^{7.4}	7.4	109
246	Resolved-particle simulation by the Physalis method: Enhancements and new capabilities. <i>Journal of Computational Physics</i> , 2016 , 309, 164-184	4.1	27
245	Vapour cooling of poorly conducting hot substrates increases the dynamic Leidenfrost temperature. <i>International Journal of Heat and Mass Transfer</i> , 2016 , 97, 101-109	4.9	54
244	Reduced cellular immune response in social insect lineages. <i>Biology Letters</i> , 2016 , 12, 20150984	3.6	33

243	On flux terms in volume averaging. <i>International Journal of Multiphase Flow</i> , 2016 , 80, 176-180	3.6	3
242	History effects on the gas exchange between a bubble and a liquid. <i>Physical Review Fluids</i> , 2016 , 1,	2.8	7
241	Dissolution and growth of a multicomponent drop in an immiscible liquid. <i>Journal of Fluid Mechanics</i> , 2016 , 798, 787-811	3.7	19
240	Life and death by boundary conditions. <i>Journal of Fluid Mechanics</i> , 2015 , 768, 1-4	3.7	28
239	The speed of sound in a gas-vapour bubbly liquid. <i>Interface Focus</i> , 2015 , 5, 20150024	3.9	38
238	Local interfacial stability near a zero vorticity point. <i>Journal of Fluid Mechanics</i> , 2015 , 776, 5-36	3.7	16
237	The Leidenfrost temperature increase for impacting droplets on carbon-nanofiber surfaces. <i>Soft Matter</i> , 2014 , 10, 2102-9	3.6	63
236	On skirted drops in an immiscible liquid. <i>Chemical Engineering Science</i> , 2014 , 108, 213-222	4.4	5
235	Multiphase Rayleigh-BBard convection. <i>Mechanical Engineering Reviews</i> , 2014 , 1, FE0003-FE0003	4.7	1
234	The quasi-static growth of CO ₂ bubbles. <i>Journal of Fluid Mechanics</i> , 2014 , 741,	3.7	47
233	Tribonucleation of bubbles. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2014 , 111, 10089-94	11.5	5
232	Dynamics of cavitation clouds within a high-intensity focused ultrasonic beam. <i>Physics of Fluids</i> , 2013 , 25, 073301	4.4	12
231	Highly focused supersonic microjets: numerical simulations. <i>Journal of Fluid Mechanics</i> , 2013 , 719, 587-605	3.7	48
230	Ultrasound artificially nucleated bubbles and their sonochemical radical production. <i>Ultrasonics Sonochemistry</i> , 2013 , 20, 510-24	8.9	47
229	Drop fragmentation at impact onto a bath of an immiscible liquid. <i>Physical Review Letters</i> , 2013 , 110, 264503	7.4	44
228	Droplet impact on superheated micro-structured surfaces. <i>Soft Matter</i> , 2013 , 9, 3272	3.6	166
227	Improved procedure for the computation of Lamb coefficients in the physalis method for particle simulation. <i>Journal of Computational Physics</i> , 2013 , 234, 44-59	4.1	9
226	A general derivation of the subharmonic threshold for non-linear bubble oscillations. <i>Journal of the Acoustical Society of America</i> , 2013 , 133, 3719-26	2.2	29

225	Heat transport in bubbling turbulent convection. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2013 , 110, 9237-42	11.5	38
224	Response to [Comment on [The effect of rotation on the Rayleigh-Bénard stability threshold]] [Phys. Fluids 25, 059101 (2013)]. <i>Physics of Fluids</i> , 2013 , 25, 059102	4.4	
223	Growing bubbles in a slightly supersaturated liquid solution. <i>Review of Scientific Instruments</i> , 2013 , 84, 065111	1.7	39
222	Effects of particle settling on Rayleigh-Bénard convection. <i>Physical Review E</i> , 2013 , 87, 063014	2.4	12
221	A level set method for vapor bubble dynamics. <i>Journal of Computational Physics</i> , 2012 , 231, 1533-1552	4.1	27
220	Spatial distribution of heat flux and fluctuations in turbulent Rayleigh-Bénard convection. <i>Physical Review E</i> , 2012 , 86, 056315	2.4	17
219	Drop impact on superheated surfaces. <i>Physical Review Letters</i> , 2012 , 108, 036101	7.4	293
218	Linear oscillations of constrained drops, bubbles, and plane liquid surfaces. <i>Physics of Fluids</i> , 2012 , 24, 032109	4.4	36
217	A fully resolved numerical simulation of turbulent flow past one or several spherical particles. <i>Physics of Fluids</i> , 2012 , 24, 013303	4.4	28
216	The effect of rotation on the Rayleigh-Bénard stability threshold. <i>Physics of Fluids</i> , 2012 , 24, 114101	4.4	7
215	Oscillations of a gas pocket on a liquid-covered solid surface. <i>Physics of Fluids</i> , 2012 , 24, 122101	4.4	15
214	Highly Focused Supersonic Microjets. <i>Physical Review X</i> , 2012 , 2,	9.1	37
213	Generation and Transport of Bubbles in Intense Ultrasonic Fields 2012 ,		1
212	Dynamics of a disturbed sessile drop measured by atomic force microscopy (AFM). <i>Langmuir</i> , 2011 , 27, 11966-72	4	19
211	Pressure-driven flow in a channel with porous walls*. <i>Journal of Fluid Mechanics</i> , 2011 , 679, 77-100	3.7	43
210	Modification of turbulence in Rayleigh-Bénard convection by phase change. <i>New Journal of Physics</i> , 2011 , 13, 025002	2.9	14
209	Effect of vapor bubbles on velocity fluctuations and dissipation rates in bubbly Rayleigh-Bénard convection. <i>Physical Review E</i> , 2011 , 84, 036312	2.4	16
208	Validation of an approximate model for the thermal behavior in acoustically driven bubbles. <i>Journal of the Acoustical Society of America</i> , 2011 , 130, 3243-51	2.2	37

207	A simple analytic approximation to the Rayleigh-BBard stability threshold. <i>Physics of Fluids</i> , 2011 , 23, 124101	4.4	6
206	The interaction between a solid particle and a turbulent flow. <i>New Journal of Physics</i> , 2010 , 12, 033040	2.9	64
205	Physics-based analysis of the hydrodynamic stress in a fluid-particle system. <i>Physics of Fluids</i> , 2010 , 22, 033306	4.4	22
204	Drag and lift forces on particles in a rotating flow. <i>Journal of Fluid Mechanics</i> , 2010 , 643, 1-31	3.7	28
203	Wall effects on a rotating sphere. <i>Journal of Fluid Mechanics</i> , 2010 , 657, 1-21	3.7	70
202	Enhancement of channel wall vibration due to acoustic excitation of an internal bubbly flow. <i>Journal of Fluids and Structures</i> , 2010 , 26, 994-1017	3.1	12
201	Efficient Sonochemistry through Microbubbles Generated with Micromachined Surfaces. <i>Angewandte Chemie</i> , 2010 , 122, 9893-9895	3.6	4
200	Efficient sonochemistry through microbubbles generated with micromachined surfaces. <i>Angewandte Chemie - International Edition</i> , 2010 , 49, 9699-701	16.4	59
199	Advanced Mathematics for Applications 2010 ,		20
198	History force on coated microbubbles propelled by ultrasound. <i>Physics of Fluids</i> , 2009 , 21, 092003	4.4	45
197	Nucleation threshold and deactivation mechanisms of nanoscopic cavitation nuclei. <i>Physics of Fluids</i> , 2009 , 21, 102003	4.4	108
196	Pressure-driven flow in a two-dimensional channel with porous walls. <i>Journal of Fluid Mechanics</i> , 2009 , 631, 1-21	3.7	29
195	A Numerical Study of Taylor Bubbles. <i>Industrial & Engineering Chemistry Research</i> , 2009 , 48, 242-252	3.9	37
194	Growth and collapse of a vapour bubble in a microtube: the role of thermal effects. <i>Journal of Fluid Mechanics</i> , 2009 , 632, 5-16	3.7	42
193	Heat transfer mechanisms in bubbly Rayleigh-BBard convection. <i>Physical Review E</i> , 2009 , 80, 026304	2.4	32
192	Electrolytically generated nanobubbles on highly orientated pyrolytic graphite surfaces. <i>Langmuir</i> , 2009 , 25, 1466-74	4	100
191	History force on coated microbubbles propelled by ultrasound 2009 ,		2
190	Heat transfer mechanisms in bubbly Rayleigh-BBard convection. <i>Springer Proceedings in Physics</i> , 2009 , 355-357	0.2	

189	Turbulence modification in the vicinity of a solid particle. <i>Springer Proceedings in Physics</i> , 2009 , 509-512	0.2	
188	A sphere in a uniformly rotating or shearing flow. <i>Journal of Fluid Mechanics</i> , 2008 , 600, 201-233	3.7	35
187	Vapour bubble collapse in isothermal and non-isothermal liquids. <i>Journal of Fluid Mechanics</i> , 2008 , 601, 253-279	3.7	24
186	Linear stability of the flow past a spheroidal bubble. <i>Journal of Fluid Mechanics</i> , 2007 , 582, 53-78	3.7	33
185	Effective velocity boundary condition at a mixed slip surface. <i>Journal of Fluid Mechanics</i> , 2007 , 578, 435-451	3.7	61
184	Drag and lift forces on bubbles in a rotating flow. <i>Journal of Fluid Mechanics</i> , 2007 , 571, 439-454	3.7	52
183	A note on the effective slip properties for microchannel flows with ultrahydrophobic surfaces. <i>Physics of Fluids</i> , 2007 , 19, 043603	4.4	154
182	Role of air in granular jet formation. <i>Physical Review Letters</i> , 2007 , 99, 018001	7.4	45
181	Entrapped air bubbles in piezo-driven inkjet printing: Their effect on the droplet velocity. <i>Physics of Fluids</i> , 2006 , 18, 121511	4.4	41
180	The "acoustic scallop" bubble-powered actuator. <i>Journal of Micromechanics and Microengineering</i> , 2006 , 16, 1653-1659	2	63
179	Giant bubble pinch-off. <i>Physical Review Letters</i> , 2006 , 96, 154505	7.4	95
178	Axial stability of Taylor bubbles. <i>Journal of Fluid Mechanics</i> , 2006 , 568, 173	3.7	15
177	The stress system in a suspension of heavy particles: antisymmetric contribution. <i>Journal of Fluid Mechanics</i> , 2006 , 554, 125	3.7	2
176	On the computation of ensemble averages for spatially non-uniform particle systems. <i>Journal of Computational Physics</i> , 2006 , 212, 247-267	4.1	2
175	A second-order boundary-fitted projection method for free-surface flow computations. <i>Journal of Computational Physics</i> , 2006 , 213, 574-590	4.1	25
174	Microstructural Effects in a Fully-Resolved Simulation of 1,024 Sedimenting Spheres 2006 , 197-206		2
173	A second-order method for three-dimensional particle simulation. <i>Journal of Computational Physics</i> , 2005 , 210, 292-324	4.1	119
172	Report on a symposium on "Computational approaches to disperse multiphase flow" <i>International Journal of Multiphase Flow</i> , 2005 , 31, 1337-1341	3.6	

171	Viscous forces on acoustically levitated gas bubbles. <i>Nonlinear Analysis: Theory, Methods & Applications</i> , 2005 , 63, e1517-e1527	1.3	1
170	Asymmetry-induced particle drift in a rotating flow. <i>Physics of Fluids</i> , 2005 , 17, 072106	4.4	9
169	Blinking bubble-micropump with microfabricated heaters. <i>Journal of Micromechanics and Microengineering</i> , 2005 , 15, 1683-1691	2	32
168	A microfluidic Blinking bubble-pump. <i>Journal of Micromechanics and Microengineering</i> , 2005 , 15, 643-651	2	45
167	Bubbles. <i>Physics of Fluids</i> , 2004 , 16, 1852-1865	4.4	104
166	Average stress in a Stokes suspension of disks. <i>International Journal of Multiphase Flow</i> , 2004 , 30, 1-26	3.6	2
165	Mechanism of mass-transfer enhancement in textiles by ultrasound. <i>AIChE Journal</i> , 2004 , 50, 58-64	3.6	61
164	The average stress in incompressible disperse flow. <i>International Journal of Multiphase Flow</i> , 2004 , 30, 1011-1036	3.6	9
163	Bubble growth on an impulsively powered microheater. <i>International Journal of Heat and Mass Transfer</i> , 2004 , 47, 1053-1067	4.9	45
162	A numerical method for three-dimensional gas-liquid flow computations. <i>Journal of Computational Physics</i> , 2004 , 196, 126-144	4.1	41
161	Fax-like relations for a nonuniform suspension. <i>Physics of Fluids</i> , 2004 , 16, 2483-2496	4.4	6
160	Dynamic Simulation of the Acoustic Characteristics of Bubble Clouds (2nd Report, On Validity of Continuum Mathematical Model). <i>880-02 Nihon Kikai Gakkai Ronbunshu-Transactions of the Japan Society of Mechanical Engineers Series B B-hen</i> , 2004 , 70, 636-643		
159	Controlling bubbles. <i>Journal of Physics Condensed Matter</i> , 2003 , 15, S415-S420	1.8	11
158	A Method for Particle Simulation. <i>Journal of Applied Mechanics, Transactions ASME</i> , 2003 , 70, 64-74	2.7	42
157	Transient impact of a liquid column on a miscible liquid surface. <i>Physics of Fluids</i> , 2003 , 15, 821-824	4.4	23
156	PHYSALIS: a new method for particle simulation. <i>Journal of Computational Physics</i> , 2003 , 187, 371-390	4.1	54
155	Workshop Findings. <i>International Journal of Multiphase Flow</i> , 2003 , 29, 1047-1059	3.6	12
154	Appendix 3: Report of study group on computational physics. <i>International Journal of Multiphase Flow</i> , 2003 , 29, 1089-1099	3.6	9

153	The added mass of an expanding bubble. <i>Journal of Fluid Mechanics</i> , 2003 , 482, 271-290	3.7	50
152	The transient rise of a bubble subject to shape or volume changes. <i>Physics of Fluids</i> , 2003 , 15, 2640-2648	4.4	28
151	Nonlinear wave interactions in bubble layers. <i>Journal of the Acoustical Society of America</i> , 2003 , 113, 1304-16	2.2	45
150	Harmonic enhancement of single-bubble sonoluminescence. <i>Physical Review E</i> , 2003 , 67, 056310	2.4	32
149	Vapor bubbles in flow and acoustic fields. <i>Annals of the New York Academy of Sciences</i> , 2002 , 974, 328-476	5	8
148	Rectified heat transfer into translating and pulsating vapor bubbles. <i>Journal of the Acoustical Society of America</i> , 2002 , 112, 1787-96	2.2	12
147	Drop-Liquid Impact Phenomena. <i>CISM International Centre for Mechanical Sciences, Courses and Lectures</i> , 2002 , 25-37	0.6	1
146	A nonlinear model of thermoacoustic devices. <i>Journal of the Acoustical Society of America</i> , 2002 , 112, 1431-44	2.2	37
145	Boundary Integral Methods. <i>CISM International Centre for Mechanical Sciences, Courses and Lectures</i> , 2002 , 219-235	0.6	1
144	Navier-Stokes Numerical Algorithms for Free-Surface Flow Computations: An Overview. <i>CISM International Centre for Mechanical Sciences, Courses and Lectures</i> , 2002 , 237-257	0.6	26
143	The action of pressure-radiation forces on pulsating vapor bubbles. <i>Physics of Fluids</i> , 2001 , 13, 1167-1177	4.4	19
142	Flow of spatially non-uniform suspensions. <i>International Journal of Multiphase Flow</i> , 2001 , 27, 237-276	3.6	15
141	Flow of spatially non-uniform suspensions. Part III: Closure relations for porous media and spinning particles. <i>International Journal of Multiphase Flow</i> , 2001 , 27, 1627-1653	3.6	10
140	Physalis: A New $o(N)$ Method for the Numerical Simulation of Disperse Systems: Potential Flow of Spheres. <i>Journal of Computational Physics</i> , 2001 , 167, 196-216	4.1	49
139	Average pressure and velocity fields in non-uniform suspensions of spheres in Stokes flow. <i>Journal of Engineering Mathematics</i> , 2001 , 41, 275-303	1.2	6
138	Bubble-based micropump for electrically conducting liquids. <i>Journal of Micromechanics and Microengineering</i> , 2001 , 11, 270-276	2	86
137	Spiraling bubbles: how acoustic and hydrodynamic forces compete. <i>Physical Review Letters</i> , 2001 , 86, 4819-22	7.4	28
136	Comments on Radial pulsations of a fluid sphere in a sound wave by S. Temkin. <i>Journal of Fluid Mechanics</i> , 2001 , 430, 401-405	3.7	0

135	Vapor Bubbles in Flow and Acoustic Fields. <i>Fluid Mechanics and Its Applications</i> , 2001 , 249-256	0.2	
134	Fundamental Acoustic Properties of Bubbly Liquids 2001 , 183-205		2
133	Mechanism of air entrainment by a disturbed liquid jet. <i>Physics of Fluids</i> , 2000 , 12, 1710-1714	4.4	29
132	The collapse of vapor bubbles in a spatially non-uniform flow. <i>International Journal of Heat and Mass Transfer</i> , 2000 , 43, 3539-3550	4.9	25
131	Flow of spatially non-uniform suspensions.: Part I: Phenomenology. <i>International Journal of Multiphase Flow</i> , 2000 , 26, 783-831	3.6	24
130	On the mechanism of air entrainment by liquid jets at a free surface. <i>Journal of Fluid Mechanics</i> , 2000 , 404, 151-177	3.7	87
129	Nonlinear saturation of the thermoacoustic instability. <i>Journal of the Acoustical Society of America</i> , 2000 , 107, 3130-47	2.2	29
128	Growth and collapse of a vapor bubble in a narrow tube. <i>Physics of Fluids</i> , 2000 , 12, 1268-1277	4.4	75
127	The pumping effect of growing and collapsing bubbles in a tube. <i>Journal of Micromechanics and Microengineering</i> , 1999 , 9, 402-413	2	54
126	The oscillation of gas bubbles in tubes: Experimental results. <i>Journal of the Acoustical Society of America</i> , 1999 , 106, 674-681	2.2	17
125	The underwater sounds produced by impacting snowflakes. <i>Journal of the Acoustical Society of America</i> , 1999 , 106, 1765-1770	2.2	6
124	Mixture pressure and stress in disperse two-phase flow. <i>International Journal of Multiphase Flow</i> , 1999 , 25, 1395-1429	3.6	27
123	Growth and collapse of a vapor bubble in a small tube. <i>International Journal of Heat and Mass Transfer</i> , 1999 , 42, 3643-3657	4.9	46
122	A Shape Decomposition Technique in Electrical Impedance Tomography. <i>Journal of Computational Physics</i> , 1999 , 155, 75-95	4.1	38
121	Heat conduction in a non-uniform composite with spherical inclusions. <i>Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences</i> , 1999 , 455, 1483-1508	2.4	6
120	The dynamics of vapor bubbles in acoustic pressure fields. <i>Physics of Fluids</i> , 1999 , 11, 2008-2019	4.4	104
119	The effect of viscosity on the spherical stability of oscillating gas bubbles. <i>Physics of Fluids</i> , 1999 , 11, 1309-1317	4.4	86
118	Modelling of spherical gas bubble oscillations and sonoluminescence. <i>Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences</i> , 1999 , 357, 203-223	3	72

117	Some Considerations on the Modeling of Disperse Multiphase Flows by Averaged Equations.. <i>JSME International Journal Series B</i> , 1999 , 42, 573-585		7
116	Old-Fashioned Bubble Dynamics 1999 , 39-62		6
115	The natural frequency of oscillation of gas bubbles in tubes. <i>Journal of the Acoustical Society of America</i> , 1998 , 103, 3301-3308	2.2	77
114	Linear thermoacoustic instability in the time domain. <i>Journal of the Acoustical Society of America</i> , 1998 , 103, 3309-3317	2.2	8
113	Thermal processes in the oscillations of gas bubbles in tubes. <i>Journal of the Acoustical Society of America</i> , 1998 , 104, 1389-1398	2.2	20
112	A Brief Summary of L. van Wijngaarden's Work Up Till His Retirement. <i>Fluid Mechanics and Its Applications</i> , 1998 , 13-32	0.2	
111	Ensemble Averaging Techniques for Disperse Flows. <i>The IMA Volumes in Mathematics and Its Applications</i> , 1998 , 99-136	0.5	7
110	Air entrainment upon liquid impact. <i>Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences</i> , 1997 , 355, 491-506	3	20
109	Gas-liquid heat transfer in a bubble collapsing near a wall. <i>Physics of Fluids</i> , 1997 , 9, 127-142	4.4	25
108	A simplified model for linear and nonlinear processes in thermoacoustic prime movers. Part I. Model and linear theory. <i>Journal of the Acoustical Society of America</i> , 1997 , 102, 3484-3496	2.2	34
107	A simplified model for linear and nonlinear processes in thermoacoustic prime movers. Part II. Nonlinear oscillations. <i>Journal of the Acoustical Society of America</i> , 1997 , 102, 3497-3506	2.2	35
106	A new mechanism for sonoluminescence. <i>Journal of the Acoustical Society of America</i> , 1997 , 101, 2003-2007		76
105	Fluid Mechanics. By Sir James Lighthill. In Twentieth Century Physics, Vol. II, Chap. 10, pp. 795-812. Edited by L. M. Brown, A. Pais & Sir Brian Pippard. Institute of Physics and American Institute of Physics, 1995.. <i>Journal of Fluid Mechanics</i> , 1997 , 350, 375-378	3.7	2
104	A Brief Summary of L. van Wijngaarden's Work Up Till His Retirement. <i>Flow, Turbulence and Combustion</i> , 1997 , 58, 13-32		2
103	Momentum and energy equations for disperse two-phase flows and their closure for dilute suspensions. <i>International Journal of Multiphase Flow</i> , 1997 , 23, 425-453	3.6	128
102	Effective boundary conditions for Stokes flow over a rough surface. <i>Journal of Fluid Mechanics</i> , 1996 , 316, 223-240	3.7	40
101	DISPERSE PHASE STRESS IN TWO-PHASE FLOW. <i>Chemical Engineering Communications</i> , 1996 , 141-142, 387-398	2.2	10
100	Low-frequency acoustic wave generation in a resonant bubble layer. <i>Journal of the Acoustical Society of America</i> , 1996 , 100, 3570-3580	2.2	22

99	Nonlinear forced oscillations of vapor bubbles. <i>Journal of the Acoustical Society of America</i> , 1996 , 100, 2652-2654	2.2	
98	Finite-particle-size effects in disperse two-phase flows. <i>Theoretical and Computational Fluid Dynamics</i> , 1995 , 7, 429-440	2.3	12
97	Linear pressure waves in fogs. <i>Journal of Fluid Mechanics</i> , 1995 , 299, 187-215	3.7	7
96	Particle stress in disperse two-phase potential flow. <i>Journal of Fluid Mechanics</i> , 1995 , 294, 1-16	3.7	25
95	Air entrapment by a falling water mass. <i>Journal of Fluid Mechanics</i> , 1995 , 294, 181-207	3.7	50
94	Linear Waves in Bubbly Liquids. <i>Fluid Mechanics and Its Applications</i> , 1995 , 55-65	0.2	1
93	EFFECT OF GRID ORTHOGONALITY ON THE SOLUTION ACCURACY OF THE TWO-DIMENSIONAL CONVECTION-DIFFUSION EQUATION. <i>Numerical Heat Transfer, Part B: Fundamentals</i> , 1994 , 26, 1-20	1.3	11
92	Sound emissions by a laboratory bubble cloud. <i>Journal of the Acoustical Society of America</i> , 1994 , 95, 3171-3182	2.2	49
91	Coherent and incoherent scattering by oceanic bubbles. <i>Journal of the Acoustical Society of America</i> , 1994 , 96, 332-341	2.2	20
90	Ensemble phase-averaged equations for bubbly flows. <i>Physics of Fluids</i> , 1994 , 6, 2956-2970	4.4	123
89	On the in-line motion of two spherical bubbles in a viscous fluid. <i>Journal of Fluid Mechanics</i> , 1994 , 278, 325-349	3.7	89
88	Shock waves in dilute bubbly liquids. <i>Journal of Fluid Mechanics</i> , 1994 , 274, 349-381	3.7	87
87	Drag coefficient of a gas bubble in an axisymmetric shear flow. <i>Physics of Fluids</i> , 1994 , 6, 3186-3188	4.4	29
86	Averaged equations for inviscid disperse two-phase flow. <i>Journal of Fluid Mechanics</i> , 1994 , 267, 185-219	3.7	218
85	Bubble dynamics: Some things we did not know 10 years ago. <i>Fluid Mechanics and Its Applications</i> , 1994 , 3-16	0.2	11
84	Active and passive acoustic behavior of bubble clouds at the ocean surface. <i>Journal of the Acoustical Society of America</i> , 1993 , 93, 3117-3127	2.2	29
83	The Impact of Drops on Liquid Surfaces and the Underwater Noise of Rain. <i>Annual Review of Fluid Mechanics</i> , 1993 , 25, 577-602	2.2	211
82	A theoretical study of sonoluminescence. <i>Journal of the Acoustical Society of America</i> , 1993 , 94, 248-260	2.2	205

81	Dynamics of bubble growth and detachment from a needle. <i>Journal of Fluid Mechanics</i> , 1993 , 257, 111	3.7	355
80	Backscattering of underwater noise by bubble clouds. <i>Journal of the Acoustical Society of America</i> , 1993 , 93, 3128-3138	2.2	9
79	Drop Impact and the Underwater Noise of Rain 1993 , 669-682		1
78	Bubble mechanics: luminescence, noise, and two-phase flow 1993 , 355-369		1
77	Collective Oscillations in a Bubble Column 1993 , 371-378		1
76	Bubble oscillations in the nearly adiabatic limit. <i>Journal of the Acoustical Society of America</i> , 1992 , 92, 2016-2023	2.2	18
75	Examples of air-entraining flows. <i>Physics of Fluids A, Fluid Dynamics</i> , 1992 , 4, 649-651		14
74	Numerical Simulation of the Motion of Rigid Spheres in Potential Flow. <i>SIAM Journal on Applied Mathematics</i> , 1992 , 52, 1533-1562	1.8	8
73	Orthogonal mapping in two dimensions. <i>Journal of Computational Physics</i> , 1992 , 98, 254-268	4.1	41
72	Orthogonal mapping in two dimensions. <i>Journal of Computational Physics</i> , 1992 , 98, 179	4.1	3
71	The added mass, Basset, and viscous drag coefficients in nondilute bubbly liquids undergoing small-amplitude oscillatory motion. <i>Physics of Fluids A, Fluid Dynamics</i> , 1991 , 3, 2955-2970		71
70	Numerical calculation of the underwater noise of rain. <i>Journal of Fluid Mechanics Digital Archive</i> , 1991 , 228, 417		3
69	The stability of an air film in a liquid flow. <i>Journal of Fluid Mechanics</i> , 1991 , 226, 319-347	3.7	15
68	The thermal behaviour of oscillating gas bubbles. <i>Journal of Fluid Mechanics</i> , 1991 , 222, 587	3.7	221
67	An investigation of the collective oscillations of a bubble cloud. <i>Journal of the Acoustical Society of America</i> , 1991 , 89, 700-706	2.2	77
66	Bubble oscillations in the vicinity of a nearly plane free surface. <i>Journal of the Acoustical Society of America</i> , 1990 , 87, 2085-2092	2.2	31
65	Stability of Two-Phase Flow Models. <i>The IMA Volumes in Mathematics and Its Applications</i> , 1990 , 98-117	0.5	5
64	Bubble entrainment by the impact of drops on liquid surfaces. <i>Journal of Fluid Mechanics</i> , 1990 , 219, 143	3.7	244

63	A generalization of the impulse and virial theorems with an application to bubble oscillations. <i>Journal of Fluid Mechanics</i> , 1990 , 218, 143	3.7	78
62	. <i>IEEE Journal of Oceanic Engineering</i> , 1990 , 15, 275-281	3.3	48
61	The hydrodynamic interaction of two slowly evaporating spheres. <i>Physics of Fluids A, Fluid Dynamics</i> , 1989 , 1, 1656-1665		5
60	The oscillations of a small floating bubble. <i>Physics of Fluids A, Fluid Dynamics</i> , 1989 , 1, 252-260		11
59	Rayleigh-Taylor instability for adiabatically stratified fluids. <i>Physics of Fluids A, Fluid Dynamics</i> , 1989 , 1, 1784-1795		17
58	Surface-tension effects in the contact of liquid surfaces. <i>Journal of Fluid Mechanics</i> , 1989 , 203, 149-171	3.7	89
57	Numerical integration methods in gas-bubble dynamics. <i>Journal of the Acoustical Society of America</i> , 1989 , 85, 1538-1548	2.2	93
56	The underwater noise of rain. <i>Journal of Geophysical Research</i> , 1989 , 94, 3255		61
55	The crevice model of bubble nucleation. <i>Journal of the Acoustical Society of America</i> , 1989 , 86, 1065-1084	2.2	205
54	Linear pressure waves in bubbly liquids: Comparison between theory and experiments. <i>Journal of the Acoustical Society of America</i> , 1989 , 85, 732-746	2.2	510
53	Nonlinear bubble dynamics. <i>Journal of the Acoustical Society of America</i> , 1988 , 83, 502-514	2.2	331
52	Cavitation and bubble bursting as sources of oceanic ambient noise. <i>Journal of the Acoustical Society of America</i> , 1988 , 84, 1037-1041	2.2	17
51	Bubble-related ambient noise in the ocean. <i>Journal of the Acoustical Society of America</i> , 1988 , 84, 1042-1054		95
50	Bubble Dynamics in Oceanic Ambient Noise 1988 , 151-171		25
49	Bubble dynamics in a compressible liquid. Part 2. Second-order theory. <i>Journal of Fluid Mechanics</i> , 1987 , 185, 289-321	3.7	123
48	The equation of bubble dynamics in a compressible liquid. <i>Physics of Fluids</i> , 1987 , 30, 3626		66
47	The linear stability of general two-phase flow models. <i>International Journal of Multiphase Flow</i> , 1987 , 13, 161-171	3.6	29
46	Bubble dynamics in a compressible liquid. Part 1. First-order theory. <i>Journal of Fluid Mechanics</i> , 1986 , 168, 457	3.7	464

45	On the suitability of first-order differential models for two-phase flow prediction. <i>International Journal of Multiphase Flow</i> , 1985 , 11, 133-148	3.6	55
44	The stability of an evaporating liquid surface. <i>Physics of Fluids</i> , 1984 , 27, 1590		74
43	Pressure forces in disperse two-phase flow. <i>International Journal of Multiphase Flow</i> , 1984 , 10, 425-440	3.6	60
42	Bubble phenomena in sound fields: part two. <i>Ultrasonics</i> , 1984 , 22, 115-124	3.5	91
41	Bubble phenomena in sound fields: part one. <i>Ultrasonics</i> , 1984 , 22, 69-77	3.5	140
40	A numerical method for potential flows with a free surface. <i>Journal of Computational Physics</i> , 1983 , 51, 365-386	4.1	9
39	Nonlinear oscillations of gas bubbles in liquids: An interpretation of some experimental results. <i>Journal of the Acoustical Society of America</i> , 1983 , 73, 121-127	2.2	57
38	Small-amplitude waves produced by a submerged vorticity distribution on the surface of a viscous liquid. <i>Physics of Fluids</i> , 1982 , 25, 2188		3
37	Reply to comments on "General analysis of the stability of superposed fluids" <i>Physics of Fluids</i> , 1982 , 25, 911		12
36	A generalization of the Rayleigh-Plesset equation of bubble dynamics. <i>Physics of Fluids</i> , 1982 , 25, 409		74
35	A method for the solution of a class of singular volterra integro-differential equations. <i>Journal of Computational Physics</i> , 1982 , 46, 462-468	4.1	4
34	Bubble dynamics: a review and some recent results. <i>Flow, Turbulence and Combustion</i> , 1982 , 38, 145-164		33
33	Bubble dynamics: a review and some recent results 1982 , 145-164		2
32	Motion of two superposed viscous fluids. <i>Physics of Fluids</i> , 1981 , 24, 1217		114
31	Small-amplitude waves on the surface of a layer of a viscous liquid. <i>Quarterly of Applied Mathematics</i> , 1981 , 38, 375-389	0.7	9
30	On numerical differentiation on a nonuniform grid. <i>Journal of Computational Physics</i> , 1981 , 39, 481-483	4.1	2
29	The motion of a charged particle in a uniform magnetic field. <i>Societa Italiana Di Fisica Nuovo Cimento B-General Physics, Relativity Astronomy and Mathematical Physics and Methods</i> , 1980 , 57, 253-268		5
28	Free oscillations of drops and bubbles: the initial-value problem. <i>Journal of Fluid Mechanics</i> , 1980 , 100, 333	3.7	177

27	On the Dynamics of Non-Spherical Bubbles 1980 , 13-22		1
26	Boundary conditions at a liquid-vapor interface. <i>Meccanica</i> , 1979 , 14, 34-47	2.1	33
25	On the classical theory of the electron 1978 , 43, 127-142		16
24	The contribution of latent heat transport in subcooled nucleate boiling. <i>International Journal of Heat and Mass Transfer</i> , 1978 , 21, 725-734	4.9	17
23	Vapour-bubble growth in a superheated liquid. <i>Journal of Fluid Mechanics</i> , 1978 , 85, 349	3.7	150
22	Linear stability of a growing or collapsing bubble in a slightly viscous liquid. <i>Physics of Fluids</i> , 1978 , 21, 1465		22
21	Application of the subharmonic threshold to the measurement of the damping of oscillating gas bubbles. <i>Journal of the Acoustical Society of America</i> , 1977 , 61, 11-16	2.2	46
20	Thermal effects and damping mechanisms in the forced radial oscillations of gas bubbles in liquids. <i>Journal of the Acoustical Society of America</i> , 1977 , 61, 17-27	2.2	337
19	Viscous effects on perturbed spherical flows. <i>Quarterly of Applied Mathematics</i> , 1977 , 34, 339-352	0.7	172
18	Bubble Dynamics and Cavitation. <i>Annual Review of Fluid Mechanics</i> , 1977 , 9, 145-185	2.2	1286
17	A numerical method for the solution of certain classes of nonlinear Volterra integro-differential and integral equations. <i>International Journal for Numerical Methods in Engineering</i> , 1977 , 11, 431-438	2.4	5
16	Current topics in the dynamics of gas and vapor bubbles. <i>Meccanica</i> , 1977 , 12, 214-235	2.1	8
15	Flow of vapour in a liquid enclosure. <i>Journal of Fluid Mechanics</i> , 1976 , 78, 433-444	3.7	47
14	On the characteristics of the equations of motion for a bubbly flow and the related problem of critical flow. <i>Journal of Engineering Mathematics</i> , 1976 , 10, 153-162	1.2	21
13	Subharmonics and ultraharmonics in the forced oscillations of weakly nonlinear systems. <i>American Journal of Physics</i> , 1976 , 44, 548-554	0.7	20
12	Viscous effects on small-amplitude surface waves. <i>Physics of Fluids</i> , 1976 , 19, 195		44
11	Mathematical model of a LTV evaporator. <i>International Journal of Multiphase Flow</i> , 1975 , 2, 357-361	3.6	3
10	Nonlinear oscillations of gas bubbles in liquids. Transient solutions and the connection between subharmonic signal and cavitation. <i>Journal of the Acoustical Society of America</i> , 1975 , 57, 810-821	2.2	78

9	Nonlinear oscillations of gas bubbles in liquids: steady-state solutions. <i>Journal of the Acoustical Society of America</i> , 1974 , 56, 878-885	2.2	110
8	Collapse of One-Dimensional Cavities in Compressible Liquids. <i>Physics of Fluids</i> , 1972 , 15, 1848		3
7	Collapse of a condensing bubble in compressible liquids. <i>Chemical Engineering Science</i> , 1972 , 27, 815-822	4.4	5
6	T violation in hyperon decay. <i>Lettere Al Nuovo Cimento Rivista Internazionale Della Societ� Italiana Di Fisica</i> , 1969 , 1, 473-478		2
5	Introduction: A computational approach to multiphase flow		1-18 2
4	Averaged equations for multiphase flow		237-281 1
3	Coupled methods for multifluid models		386-435
2	Segregated methods for two-fluid models		320-385 2
1	Bubble Activity Induced By High-power Marine Sources		5