Sang Joon Lee

List of Publications by Citations

Source: https://exaly.com/author-pdf/8754015/sang-joon-lee-publications-by-citations.pdf

Version: 2024-04-19

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

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

334
papers

5,211
35
h-index

50
g-index

340
ext. papers

6,230
ext. citations

4.4
avg, IF

L-index

#	Paper	IF	Citations
334	Free end effects on the near wake flow structure behind a finite circular cylinder. <i>Journal of Wind Engineering and Industrial Aerodynamics</i> , 2000 , 88, 231-246	3.7	130
333	The effect of nozzle configuration on stagnation region heat transfer enhancement of axisymmetric jet impingement. <i>International Journal of Heat and Mass Transfer</i> , 2000 , 43, 3497-3509	4.9	120
332	Three-dimensional volumetric measurement of red blood cell motion using digital holographic microscopy. <i>Applied Optics</i> , 2009 , 48, 2983-90	0.2	95
331	Particle migration and single-line particle focusing in microscale pipe flow of viscoelastic fluids. <i>RSC Advances</i> , 2014 , 4, 3512-3520	3.7	89
330	Wind tunnel observations about the shelter effect of porous fences on the sand particle movements. <i>Atmospheric Environment</i> , 2002 , 36, 1453-1463	5.3	81
329	Quantitative visualization of flow inside an evaporating droplet using the ray tracing method. <i>Measurement Science and Technology</i> , 2004 , 15, 1104-1112	2	76
328	X-ray particle image velocimetry for measuring quantitative flow information inside opaque objects. <i>Journal of Applied Physics</i> , 2003 , 94, 3620-3623	2.5	76
327	Gold nanoparticle contrast agents in advanced X-ray imaging technologies. <i>Molecules</i> , 2013 , 18, 5858-9	0 4.8	70
326	Impact and wetting behaviors of impinging microdroplets on superhydrophobic textured surfaces. <i>Applied Physics Letters</i> , 2012 , 100, 171601	3.4	66
325	Lateral migration and focusing of microspheres in a microchannel flow of viscoelastic fluids. <i>Physics of Fluids</i> , 2014 , 26, 063301	4.4	63
324	Gold nanoparticle-incorporated human red blood cells (RBCs) for X-ray dynamic imaging. <i>Biomaterials</i> , 2011 , 32, 7191-9	15.6	60
323	PIV measurements of the near-wake behind a sinusoidal cylinder. Experiments in Fluids, 2005, 38, 824-8	32 .5	60
322	Evaporation-induced saline Rayleigh convection inside a colloidal droplet. <i>Physics of Fluids</i> , 2013 , 25, 042001	4.4	59
321	Nearly Perfect Durable Superhydrophobic Surfaces Fabricated by a Simple One-Step Plasma Treatment. <i>Scientific Reports</i> , 2017 , 7, 1981	4.9	56
32 0	In vivo visualization of the water-refilling process in xylem vessels using X-ray micro-imaging. <i>Annals of Botany</i> , 2008 , 101, 595-602	4.1	54
319	Controlled cellular uptake and drug efficacy of nanotherapeutics. Scientific Reports, 2013, 3, 1997	4.9	53
318	Micro-PIV measurements of blood flow in extraembryonic blood vessels of chicken embryos. <i>Physiological Measurement</i> , 2007 , 28, 1149-62	2.9	51

(2017-2010)

317	Holographic analysis of three-dimensional inertial migration of spherical particles in micro-scale pipe flow. <i>Microfluidics and Nanofluidics</i> , 2010 , 9, 819-829	2.8	50	
316	Electrowetting-induced droplet detachment from hydrophobic surfaces. <i>Langmuir</i> , 2014 , 30, 1805-11	4	48	
315	PIV analysis of near-wake behind a sphere at a subcritical Reynolds number. <i>Experiments in Fluids</i> , 2008 , 44, 905-914	2.5	48	
314	Changes in velocity profile according to blood viscosity in a microchannel. <i>Biomicrofluidics</i> , 2014 , 8, 034	1 <u>3.0</u>	45	
313	Simultaneous PIV and PTV measurements of wind and sand particle velocities. <i>Experiments in Fluids</i> , 2008 , 45, 241-256	2.5	45	
312	Label-free viscosity measurement of complex fluids using reversal flow switching manipulation in a microfluidic channel. <i>Biomicrofluidics</i> , 2013 , 7, 44106	3.2	44	
311	X-ray PIV measurements of blood flows without tracer particles. <i>Experiments in Fluids</i> , 2006 , 41, 195-20	02.5	43	
310	Measurement of Dean flow in a curved micro-tube using micro digital holographic particle tracking velocimetry. <i>Experiments in Fluids</i> , 2009 , 46, 255-264	2.5	42	
309	Heat transfer enhancement of impinging jets using mesh screens. <i>International Journal of Heat and Mass Transfer</i> , 2004 , 47, 2097-2108	4.9	42	
308	Three-component velocity field measurements of propeller wake using a stereoscopic PIV technique. <i>Experiments in Fluids</i> , 2004 , 36, 575-585	2.5	42	
307	Advanced particle-based velocimetry techniques for microscale flows. <i>Microfluidics and Nanofluidics</i> , 2009 , 6, 577-588	2.8	41	
306	Experimental analysis of the blood-sucking mechanism of female mosquitoes. <i>Journal of Experimental Biology</i> , 2011 , 214, 1163-9	3	41	
305	Multi-VENC acquisition of four-dimensional phase-contrast MRI to improve precision of velocity field measurement. <i>Magnetic Resonance in Medicine</i> , 2016 , 75, 1909-19	4.4	40	
304	Synchrotron X-ray imaging for nondestructive monitoring of sap flow dynamics through xylem vessel elements in rice leaves. <i>New Phytologist</i> , 2010 , 188, 1085-98	9.8	39	
303	PIV measurements of the wake behind a rotationally oscillating circular cylinder. <i>Journal of Fluids and Structures</i> , 2008 , 24, 2-17	3.1	39	
302	Advances in digital holographic micro-PTV for analyzing microscale flows. <i>Optics and Lasers in Engineering</i> , 2012 , 50, 39-45	4.6	37	
301	Tracking of saltating sand trajectories over a flat surface embedded in an atmospheric boundary layer. <i>Geomorphology</i> , 2007 , 86, 320-331	4.3	37	
300	Effective method for drug injection into subcutaneous tissue. <i>Scientific Reports</i> , 2017 , 7, 9613	4.9	36	

299	Three-dimensional digital microfluidic manipulation of droplets in oil medium. <i>Scientific Reports</i> , 2015 , 5, 10685	4.9	35
298	Blood viscoelasticity measurement using steady and transient flow controls of blood in a microfluidic analogue of Wheastone-bridge channel. <i>Biomicrofluidics</i> , 2013 , 7, 54122	3.2	35
297	Quantitative visualization of temporal water evolution in an operating polymer electrolyte fuel cell. <i>International Journal of Hydrogen Energy</i> , 2010 , 35, 10457-10463	6.7	35
296	Microfluidic-based speckle analysis for sensitive measurement of erythrocyte aggregation: A comparison of four methods for detection of elevated erythrocyte aggregation in diabetic rat blood. <i>Biomicrofluidics</i> , 2015 , 9, 024110	3.2	34
295	Improvement of natural ventilation in a large factory building using a louver ventilator. <i>Building and Environment</i> , 2008 , 43, 2132-2141	6.5	34
294	Removal of fine particulate matter (PM) via atmospheric humidity caused by evapotranspiration. <i>Environmental Pollution</i> , 2019 , 245, 253-259	9.3	33
293	Pristine graphene induces cardiovascular defects in zebrafish (Danio rerio) embryogenesis. <i>Environmental Pollution</i> , 2018 , 243, 246-254	9.3	33
292	A review on experimental evaluation of water management in a polymer electrolyte fuel cell using X-ray imaging technique. <i>Journal of Power Sources</i> , 2013 , 230, 101-108	8.9	32
291	Simultaneous measurement of size and velocity of microbubbles moving in an opaque tube using an X-ray particle tracking velocimetry technique. <i>Experiments in Fluids</i> , 2005 , 39, 492-497	2.5	32
290	Role of polymer concentration and molecular weight on the rebounding behaviors of polymer solution droplet impacting on hydrophobic surfaces. <i>Microfluidics and Nanofluidics</i> , 2015 , 18, 1221-1232	2.8	31
289	A microfluidic device for simultaneous measurement of viscosity and flow rate of blood in a complex fluidic network. <i>Biomicrofluidics</i> , 2013 , 7, 54111	3.2	31
288	Determination of the swimming trajectory and speed of chain-forming dinoflagellate Cochlodinium polykrikoides with digital holographic particle tracking velocimetry. <i>Marine Biology</i> , 2011 , 158, 561-570	2.5	31
287	Gold nanoparticle flow sensors designed for dynamic X-ray imaging in biofluids. ACS Nano, 2010, 4, 375	3 162 7	31
286	SuperhydrophilicBuperhydrophobic Water Harvester Inspired by Wetting Property of Cactus Stem. <i>ACS Sustainable Chemistry and Engineering</i> , 2019 , 7, 10561-10569	8.3	30
285	Vertical focusing and cell ordering in a microchannel via viscoelasticity: Applications for cell monitoring using a digital holographic microscopy. <i>Applied Physics Letters</i> , 2014 , 104, 213702	3.4	30
284	Effect of particle number density in in-line digital holographic particle velocimetry. <i>Experiments in Fluids</i> , 2008 , 44, 623-631	2.5	29
283	3D reconstruction of a carotid bifurcation from 2D transversal ultrasound images. <i>Ultrasonics</i> , 2014 , 54, 2184-92	3.5	28
282	Measurement of 3D laminar flow inside a micro tube using micro digital holographic particle tracking velocimetry. <i>Journal of Micromechanics and Microengineering</i> , 2007 , 17, 2157-2162	2	28

281	A nature-inspired lubricant-infused surface for sustainable drag reduction. Soft Matter, 2019, 15, 8459-	84,667	28
280	Salient drag reduction of a heavy vehicle using modified cab-roof fairings. <i>Journal of Wind Engineering and Industrial Aerodynamics</i> , 2017 , 164, 138-151	3.7	27
279	Graphene oxide induces cardiovascular defects in developing zebrafish (Danio rerio) embryo model: In-vivo toxicity assessment. <i>Science of the Total Environment</i> , 2019 , 673, 810-820	10.2	27
278	Effect of swirling inlet condition on the flow field in a stenosed arterial vessel model. <i>Medical Engineering and Physics</i> , 2014 , 36, 119-28	2.4	27
277	Wind tunnel observation on the effect of a porous wind fence on shelter of saltating sand particles. <i>Geomorphology</i> , 2010 , 120, 224-232	4.3	27
276	Turbulent Kinetic Energy Measurement Using Phase Contrast MRI for Estimating the Post-Stenotic Pressure Drop: In Vitro Validation and Clinical Application. <i>PLoS ONE</i> , 2016 , 11, e0151540	3.7	27
275	Seawater Desalination Using MOF-Incorporated Cu-Based Alginate Beads without Energy Consumption. <i>ACS Applied Materials & Amp; Interfaces</i> , 2020 , 12, 16319-16326	9.5	26
274	Machine learning-based in-line holographic sensing of unstained malaria-infected red blood cells. Journal of Biophotonics, 2018, 11, e201800101	3.1	26
273	Hemodynamic features and platelet aggregation in a stenosed microchannel. <i>Microvascular Research</i> , 2013 , 90, 96-105	3.7	26
272	Detaching droplets in immiscible fluids from a solid substrate with the help of electrowetting. <i>Lab on A Chip</i> , 2015 , 15, 900-7	7.2	26
271	Experimental study on the fluid mechanics of blood sucking in the proboscis of a female mosquito. Journal of Biomechanics, 2009 , 42, 857-64	2.9	26
270	Microfluidics for simultaneous quantification of platelet adhesion and blood viscosity. <i>Scientific Reports</i> , 2016 , 6, 24994	4.9	26
269	Nature-inspired thermo-responsive multifunctional membrane adaptively hybridized with PNIPAm and PPy. <i>NPG Asia Materials</i> , 2017 , 9, e445-e445	10.3	25
268	High-Throughput and Label-Free Blood-on-a-Chip for Malaria Diagnosis. <i>Analytical Chemistry</i> , 2016 , 88, 2912-22	7.8	25
267	Improvement of ultrasound speckle image velocimetry using image enhancement techniques. <i>Ultrasonics</i> , 2014 , 54, 205-16	3.5	25
266	Journey of water in pine cones. <i>Scientific Reports</i> , 2015 , 5, 9963	4.9	25
265	Selective lithium and magnesium adsorption by phosphonate metal-organic framework-incorporated alginate hydrogel inspired from lithium adsorption characteristics of brown algae. <i>Separation and Purification Technology</i> , 2019 , 212, 611-618	8.3	25
264	Real-time imaging of pulvinus bending in Mimosa pudica. <i>Scientific Reports</i> , 2014 , 4, 6466	4.9	24

263	Investigation of water seepage through porous media using X-ray imaging technique. <i>Journal of Hydrology</i> , 2012 , 452-453, 83-89	6	24
262	Velocity field measurements of valvular blood flow in a human superficial vein using high-frequency ultrasound speckle image velocimetry. <i>International Journal of Cardiovascular Imaging</i> , 2012 , 28, 69-77	2.5	24
261	PIV measurements of hull wake behind a container ship model with varying loading condition. <i>Ocean Engineering</i> , 2009 , 36, 377-385	3.9	24
260	Flow structure of wake behind a rotationally oscillating circular cylinder. <i>Journal of Fluids and Structures</i> , 2006 , 22, 1097-1112	3.1	24
259	Microfluidic system for monitoring temporal variations of hemorheological properties and platelet adhesion in LPS-injected rats. <i>Scientific Reports</i> , 2017 , 7, 1801	4.9	23
258	Fluid-dynamic optimal design of helical vascular graft for stenotic disturbed flow. <i>PLoS ONE</i> , 2014 , 9, e111047	3.7	23
257	Reduction of drag in heavy vehicles with two different types of advanced side skirts. <i>Journal of Wind Engineering and Industrial Aerodynamics</i> , 2016 , 155, 36-46	3.7	23
256	Mechanism of autorotation flight of maple samaras (Acer palmatum). <i>Experiments in Fluids</i> , 2014 , 55, 1	2.5	22
255	Flow tracing microparticle sensors designed for enhanced X-ray contrast. <i>Biosensors and Bioelectronics</i> , 2010 , 25, 1571-8	11.8	22
254	Whole-body imaging of a hypercholesterolemic female zebrafish by using synchrotron X-ray micro-CT. <i>Zebrafish</i> , 2015 , 12, 11-20	2	21
253	Novel water filtration of saline water in the outermost layer of mangrove roots. <i>Scientific Reports</i> , 2016 , 6, 20426	4.9	21
252	Evaporation-induced flows inside a confined droplet of diluted saline solution. <i>Langmuir</i> , 2014 , 30, 7710	0-₄5	21
251	Hydraulic Strategy of Cactus Trichome for Absorption and Storage of Water under Arid Environment. <i>Frontiers in Plant Science</i> , 2017 , 8, 1777	6.2	21
250	Hemodynamic Measurement Using Four-Dimensional Phase-Contrast MRI: Quantification of Hemodynamic Parameters and Clinical Applications. <i>Korean Journal of Radiology</i> , 2016 , 17, 445-62	6.9	21
249	The performance of bioinspired valveless piezoelectric micropump with respect to viscosity change. <i>Bioinspiration and Biomimetics</i> , 2016 , 11, 036006	2.6	21
248	Effect of diabetic duration on hemorheological properties and platelet aggregation in streptozotocin-induced diabetic rats. <i>Scientific Reports</i> , 2016 , 6, 21913	4.9	21
247	Synchrotron X-ray microscopic computed tomography of the pump system of a female mosquito. <i>Microscopy Research and Technique</i> , 2012 , 75, 1051-8	2.8	20
246	Microfluidic biosensor for monitoring temporal variations of hemorheological and hemodynamic properties using an extracorporeal rat bypass loop. <i>Analytical Chemistry</i> , 2013 , 85, 10503-11	7.8	20

(2011-2015)

245	Stomata-Inspired Membrane Produced Through Photopolymerization Patterning. <i>Advanced Functional Materials</i> , 2015 , 25, 4496-4505	15.6	20
244	Microfluidic-based measurement of erythrocyte sedimentation rate for biophysical assessment of blood in an in vivo malaria-infected mouse. <i>Biomicrofluidics</i> , 2014 , 8, 044114	3.2	20
243	X-ray imaging of various biological samples using a phase-contrast hard X-ray microscope. <i>Microscopy Research and Technique</i> , 2008 , 71, 639-43	2.8	20
242	Stereoscopic PIV measurements of flow behind an isolated low-speed axial-fan. <i>Experimental Thermal and Fluid Science</i> , 2004 , 28, 791-802	3	20
241	Development of a Desalination Membrane Bioinspired by Mangrove Roots for Spontaneous Filtration of Sodium Ions. <i>ACS Nano</i> , 2016 , 10, 11428-11433	16.7	20
240	Flow characteristics around a deformable stenosis under pulsatile flow condition. <i>Physics of Fluids</i> , 2018 , 30, 011902	4.4	19
239	Compact and Thermosensitive Nature-inspired Micropump. Scientific Reports, 2016, 6, 36085	4.9	19
238	PIV analysis of flow around a container ship model with a rotating propeller. <i>Experiments in Fluids</i> , 2004 , 36, 833-846	2.5	19
237	Deformability measurement of red blood cells using a microfluidic channel array and an air cavity in a driving syringe with high throughput and precise detection of subpopulations. <i>Analyst, The</i> , 2016 , 141, 319-30	5	18
236	Shelter effect of a fir tree with different porosities. <i>Journal of Mechanical Science and Technology</i> , 2014 , 28, 565-572	1.6	18
235	Effects of drop viscosity on oscillation dynamics induced by AC electrowetting. <i>Sensors and Actuators B: Chemical</i> , 2014 , 190, 48-54	8.5	18
234	The Effect of Umbilical Cord Blood Derived Mesenchymal Stem Cells in Monocrotaline-induced Pulmonary Artery Hypertension Rats. <i>Journal of Korean Medical Science</i> , 2015 , 30, 576-85	4.7	18
233	In vitro and ex vivo measurement of the biophysical properties of blood using microfluidic platforms and animal models. <i>Analyst, The</i> , 2018 , 143, 2723-2749	5	17
232	Cytochrome b5 Reductase 1 Triggers Serial Reactions that Lead to Iron Uptake in Plants. <i>Molecular Plant</i> , 2016 , 9, 501-13	14.4	17
231	Wettability and impact dynamics of water droplets on rice (Oryza sativa L.) leaves. <i>Experiments in Fluids</i> , 2014 , 55, 1	2.5	17
230	Wetting state and maximum spreading factor of microdroplets impacting on superhydrophobic textured surfaces with anisotropic arrays of pillars. <i>Experiments in Fluids</i> , 2013 , 54, 1	2.5	17
229	Development of a compact x-ray particle image velocimetry for measuring opaque flows. <i>Review of Scientific Instruments</i> , 2009 , 80, 033706	1.7	17
228	Chitosan microparticles incorporating gold as an enhanced contrast flow tracer in dynamic X-ray imaging. <i>Acta Biomaterialia</i> , 2011 , 7, 2139-47	10.8	17

227	Focusing and alignment of erythrocytes in a viscoelastic medium. Scientific Reports, 2017, 7, 41162	4.9	16
226	Effect of flow and humidity on indoor deposition of particulate matter. <i>Environmental Pollution</i> , 2019 , 255, 113263	9.3	16
225	Spreading dynamics and oil film entrapment of sessile drops submerged in oil driven by DC electrowetting. <i>Sensors and Actuators B: Chemical</i> , 2014 , 196, 292-297	8.5	16
224	PIV velocity field measurements of flow around a KRISO 3600TEU container ship model. <i>Journal of Marine Science and Technology</i> , 2003 , 8, 76-87	1.7	16
223	X-ray PIV measurement of blood flow in deep vessels of a rat: An in vivo feasibility study. <i>Scientific Reports</i> , 2016 , 6, 19194	4.9	16
222	Effects of pressure gradient on stability and drag reduction of superhydrophobic surfaces. <i>Applied Physics Letters</i> , 2019 , 114, 101603	3.4	15
221	Water transport in porous hydrogel structures analogous to leaf mesophyll cells. <i>Microfluidics and Nanofluidics</i> , 2015 , 18, 775-784	2.8	15
220	In vivo toxicity evaluation of pristine graphene in developing zebrafish (Danio rerio) embryos. <i>Environmental Science and Pollution Research</i> , 2018 , 25, 12821-12829	5.1	15
219	Label-free sensor for automatic identification of erythrocytes using digital in-line holographic microscopy and machine learning. <i>Biosensors and Bioelectronics</i> , 2018 , 103, 12-18	11.8	15
218	Effect of pulsatile swirling flow on stenosed arterial blood flow. <i>Medical Engineering and Physics</i> , 2014 , 36, 1106-14	2.4	15
217	Hydraulic characteristics of water-refilling process in excised roots of Arabidopsis. <i>Planta</i> , 2013 , 238, 307-15	4.7	15
216	High-accuracy three-dimensional position measurement of tens of micrometers size transparent microspheres using digital in-line holographic microscopy. <i>Optics Letters</i> , 2011 , 36, 4167-9	3	15
215	Simultaneous solar-driven seawater desalination and spontaneous power generation using polyvalent crosslinked polypyrrole/alginate hydrogels. <i>Desalination</i> , 2021 , 500, 114900	10.3	15
214	Undulatory topographical waves for flow-induced foulant sweeping. Science Advances, 2019, 5, eaax893	354.3	15
213	Hybrid System for Ex Vivo Hemorheological and Hemodynamic Analysis: A Feasibility Study. <i>Scientific Reports</i> , 2015 , 5, 11064	4.9	14
212	Direct observation of local xylem embolisms induced by soil drying in intact Zea mays leaves. Journal of Experimental Botany, 2016 , 67, 2617-26	7	14
211	Dean-coupled inertial migration and transient focusing of particles in a curved microscale pipe flow. <i>Experiments in Fluids</i> , 2012 , 53, 1867-1877	2.5	14
210	Deep learning-based digital in-line holographic microscopy for high resolution with extended field of view. <i>Optics and Laser Technology</i> , 2019 , 113, 77-86	4.2	14

209	Trajectories of saltating sand particles behind a porous fence. <i>Geomorphology</i> , 2015 , 228, 608-616	4.3	13
208	Liquid-intake flow around the tip of butterfly proboscis. <i>Journal of Theoretical Biology</i> , 2014 , 348, 113-2	212.3	13
207	Bubble-free and pulse-free fluid delivery into microfluidic devices. <i>Biomicrofluidics</i> , 2014 , 8, 014102	3.2	13
206	Effect of phase shift on optimal operation of serial-connected valveless micropumps. <i>Sensors and Actuators A: Physical</i> , 2014 , 209, 133-139	3.9	13
205	Uptake of liquid from wet surfaces by the brush-tipped proboscis of a butterfly. <i>Scientific Reports</i> , 2014 , 4, 6934	4.9	13
204	In vivo measurements of blood flow in a rat using X-ray imaging technique. <i>International Journal of Cardiovascular Imaging</i> , 2012 , 28, 1853-8	2.5	13
203	Hybrid PIV-PTV technique for measuring blood flow in rat mesenteric vessels. <i>Microvascular Research</i> , 2012 , 84, 242-8	3.7	13
202	Properties of iopamidol-incorporated poly(vinyl alcohol) microparticle as an X-ray imaging flow tracer. <i>Journal of Physical Chemistry B</i> , 2011 , 115, 889-901	3.4	13
201	Murray law and the bifurcation angle in the arterial micro-circulation system and their application to the design of microfluidics. <i>Microfluidics and Nanofluidics</i> , 2010 , 8, 85-95	2.8	13
200	Verification of the shelter effect of a windbreak on coal piles in the POSCO open storage yards at the Kwang-Yang works. <i>Atmospheric Environment</i> , 2002 , 36, 2171-2185	5.3	13
199	A lubricant-infused slip surface for drag reduction. <i>Physics of Fluids</i> , 2020 , 32, 091901	4.4	13
198	Comparison of flow structures behind rigid and flexible finite cylinders. <i>International Journal of Mechanical Sciences</i> , 2018 , 142-143, 480-490	5.5	13
197	Flapping dynamics of a flexible plate with Navier slip. <i>Physics of Fluids</i> , 2019 , 31, 091901	4.4	12
196	Effects of red blood cell aggregates dissociation on the estimation of ultrasound speckle image velocimetry. <i>Ultrasonics</i> , 2014 , 54, 1480-7	3.5	12
195	Decrement of spanwise vortices by a drag-reducing riblet surface. <i>Journal of Turbulence</i> , 2008 , 9, N23	2.1	12
194	Vulnerability of Protoxylem and Metaxylem Vessels to Embolisms and Radial Refilling in a Vascular Bundle of Maize Leaves. <i>Frontiers in Plant Science</i> , 2016 , 7, 941	6.2	12
193	Effect of non-Newtonian viscosity on the fluid-dynamic characteristics in stenotic vessels. <i>Experiments in Fluids</i> , 2015 , 56, 1	2.5	11
192	Versatile Amorphous Structures of Phosphonate Metal Organic Framework/Alginate Composite for Tunable Sieving of Ions. <i>Advanced Functional Materials</i> , 2019 , 29, 1904016	15.6	11

191	Effect of ambient medium viscosity on the motility and flagella motion of Prorocentrum minimum (Dinophyceae). <i>Journal of Plankton Research</i> , 2013 , 35, 1294-1304	2.2	11
190	Bio-inspired cab-roof fairing of heavy vehicles for enhancing drag reduction and driving stability. <i>International Journal of Mechanical Sciences</i> , 2017 , 131-132, 868-879	5.5	11
189	Extracorporeal bypass model of blood circulation for the study of microvascular hemodynamics. <i>Microvascular Research</i> , 2012 , 83, 372-5	3.7	11
188	Quantitative analysis of flow inside the accumulator of a rotary compressor. <i>International Journal of Refrigeration</i> , 2003 , 26, 321-327	3.8	11
187	Effect of pannus formation on the prosthetic heart valve: In vitro demonstration using particle image velocimetry. <i>PLoS ONE</i> , 2018 , 13, e0199792	3.7	11
186	Shelter effects of porous multi-scale fractal fences. <i>Journal of Wind Engineering and Industrial Aerodynamics</i> , 2017 , 163, 6-14	3.7	10
185	Anti-Biofouling Features of Eco-Friendly Oleamide-PDMS Copolymers. ACS Omega, 2020, 5, 11515-1152	23.9	10
184	Herbul black henna (hair dye) causes cardiovascular defects in zebrafish (Danio rerio) embryo model. <i>Environmental Science and Pollution Research</i> , 2020 , 27, 14150-14159	5.1	10
183	Fast and Efficient Water Absorption Material Inspired by Cactus Root. ACS Macro Letters, 2018, 7, 387-3	96 16	10
182	Effects of oil-film layer and surfactant on the siphonal respiration and survivorship in the fourth instar larvae of Aedes togoi mosquito in laboratory conditions. <i>Scientific Reports</i> , 2018 , 8, 5694	4.9	10
181	Electrically Controllable Microparticle Synthesis and Digital Microfluidic Manipulation by Electric-Field-Induced Droplet Dispensing into Immiscible Fluids. <i>Scientific Reports</i> , 2016 , 6, 31901	4.9	10
180	Three-dimensional swimming motility of microorganism in the near-wall region. <i>Experiments in Fluids</i> , 2016 , 57, 1	2.5	10
179	Effect of initial attitude on autorotation flight of maple samaras (Acer palmatum). <i>Journal of Mechanical Science and Technology</i> , 2016 , 30, 741-747	1.6	10
178	Post-stenotic plug-like jet with a vortex ring demonstrated by 4D flow MRI. <i>Magnetic Resonance Imaging</i> , 2016 , 34, 371-5	3.3	10
177	High-accuracy measurement of depth-displacement using a focus function and its cross- correlation in holographic PTV. <i>Optics Express</i> , 2014 , 22, 15542-53	3.3	10
176	Time-resolved X-ray PIV technique for diagnosing opaque biofluid flow with insufficient X-ray fluxes. <i>Journal of Synchrotron Radiation</i> , 2013 , 20, 498-503	2.4	10
175	Cardiac outflow and wall motion in hypothermic chick embryos. <i>Microvascular Research</i> , 2011 , 82, 296-3	0337	10
174	Hybrid bright-field and hologram imaging of cell dynamics. <i>Scientific Reports</i> , 2016 , 6, 33750	4.9	10

173	Precise measurement of orientations of transparent ellipsoidal particles through digital holographic microscopy. <i>Optics Express</i> , 2016 , 24, 598-610	3.3	10
172	Variation in wall shear stress in channel networks of zebrafish models. <i>Journal of the Royal Society Interface</i> , 2017 , 14,	4.1	9
171	Floating of the lobes of mosquito (Aedes togoi) larva for respiration. Scientific Reports, 2017, 7, 43050	4.9	9
170	Beneficial fluid-dynamic features of pulsatile swirling flow in 45½ end-to-side anastomosis. <i>Medical Engineering and Physics</i> , 2015 , 37, 272-9	2.4	9
169	Efficient removal of indoor particulate matter using water microdroplets generated by a MHz-frequency ultrasonic atomizer. <i>Building and Environment</i> , 2020 , 175, 106797	6.5	9
168	Digital stereo-holographic microscopy for studying three-dimensional particle dynamics. <i>Optics and Lasers in Engineering</i> , 2018 , 105, 6-13	4.6	9
167	Drag reduction of a heavy vehicle using a modified boat tail with lower inclined air deflector. <i>Journal of Visualization</i> , 2017 , 20, 743-752	1.6	9
166	In vivo study on splenomegaly inhibition by genistein in Plasmodium berghei-infected mice. <i>Parasitology International</i> , 2015 , 64, 369-76	2.1	9
165	Large-scale PIV measurements of ventilation flow inside the passenger compartment of a real car. Journal of Visualization, 2011 , 14, 321-329	1.6	9
164	Effect of fluid viscosity on the liquid-feeding flow phenomena of a female mosquito. <i>Journal of Experimental Biology</i> , 2013 , 216, 952-9	3	9
163	Comparative measurements on the flow structure of a marine propeller wake between an open free surface and closed surface flows. <i>Journal of Marine Science and Technology</i> , 2005 , 10, 123-130	1.7	9
162	Usage of CO2 microbubbles as flow-tracing contrast media in X-ray dynamic imaging of blood flows. <i>Journal of Synchrotron Radiation</i> , 2014 , 21, 1160-6	2.4	9
161	Morphological features of mucous secretory organ and mucous secretion of loach Misgurnus anguillicaudatus skin for friction drag reduction. <i>Journal of Fish Biology</i> , 2020 , 96, 83-91	1.9	9
160	Estimation of turbulent kinetic energy using 4D phase-contrast MRI: Effect of scan parameters and target vessel size. <i>Magnetic Resonance Imaging</i> , 2016 , 34, 715-723	3.3	9
159	Developmental toxicity triggered by benzyl alcohol in the early stage of zebrafish embryos: Cardiovascular defects with inhibited liver formation and degenerated neurogenesis. <i>Science of the Total Environment</i> , 2021 , 752, 141631	10.2	9
158	Penetration of a bubble through porous membranes with different wettabilities. <i>Soft Matter</i> , 2019 , 15, 5819-5826	3.6	8
157	Deep learning-based hologram generation using a white light source. Scientific Reports, 2020, 10, 8977	4.9	8
156	Deep learning-based accurate and rapid tracking of 3D positional information of microparticles using digital holographic microscopy. <i>Experiments in Fluids</i> , 2019 , 60, 1	2.5	8

155	Energy dissipation of graphene colloidal suspension droplets impacting on solid substrates. <i>RSC Advances</i> , 2014 , 4, 7216	3.7	8
154	Biophysiochemical properties of endothelial cells cultured on bio-inspired collagen films. <i>BMC Biotechnology</i> , 2014 , 14, 61	3.5	8
153	Association of Early Atherosclerosis with Vascular Wall Shear Stress in Hypercholesterolemic Zebrafish. <i>PLoS ONE</i> , 2015 , 10, e0142945	3.7	8
152	Use of gold nanoparticles to detect water uptake in vascular plants. <i>PLoS ONE</i> , 2014 , 9, e114902	3.7	8
151	Experimental analysis of the liquid-feeding mechanism of the butterfly Pieris rapae. <i>Journal of Experimental Biology</i> , 2014 , 217, 2013-9	3	8
150	Stereoscopic-PIV measurement of turbulent jets issuing from a sharp-edged circular nozzle with multiple triangular tabs. <i>Journal of Mechanical Science and Technology</i> , 2012 , 26, 2765-2771	1.6	8
149	Analysis of unstable vortical structure in a propeller wake affected by a simulated hull wake. <i>Experiments in Fluids</i> , 2010 , 48, 1121-1133	2.5	8
148	Characterization of a miniature thermal shear-stress sensor with backside connections. <i>Sensors and Actuators A: Physical</i> , 2006 , 128, 305-311	3.9	8
147	Phase-Averaged Velocity Field Measurements of Flow Around an Isolated Axial-Fan Model. <i>Journal of Fluids Engineering, Transactions of the ASME</i> , 2003 , 125, 1067-1072	2.1	8
146	Effect of Farnesyltransferase Inhibitor R115777 on Mitochondria of Plasmodium falciparum. <i>Korean Journal of Parasitology</i> , 2015 , 53, 421-30	1.7	8
145	Considerable drag reduction and fuel saving of a tractor ailer using additive aerodynamic devices. <i>Journal of Wind Engineering and Industrial Aerodynamics</i> , 2019 , 191, 54-62	3.7	7
144	Functional water flow pathways and hydraulic regulation in the xylem network of Arabidopsis. <i>Plant and Cell Physiology</i> , 2015 , 56, 520-31	4.9	7
143	Effect of trichome structure of Tillandsia usneoides on deposition of particulate matter under flow conditions. <i>Journal of Hazardous Materials</i> , 2020 , 393, 122401	12.8	7
142	In vivo dynamic analysis of water refilling in embolized xylem vessels of intact Zea mays leaves. <i>Annals of Botany</i> , 2016 , 118, 1033-1042	4.1	7
141	Proposal for a new therapy for drug-resistant malaria using Plasmodium synthetic lethality inference. <i>International Journal for Parasitology: Drugs and Drug Resistance</i> , 2013 , 3, 119-28	4	7
140	Fast Electrically Driven Capillary Rise Using Overdrive Voltage. <i>Langmuir</i> , 2015 , 31, 13718-24	4	7
139	Relationship between velocity profile and ultrasound echogenicity in pulsatile blood flows. <i>Clinical Hemorheology and Microcirculation</i> , 2015 , 59, 197-209	2.5	7
138	Deep Learning-Based Super-resolution Ultrasound Speckle Tracking Velocimetry. <i>Ultrasound in Medicine and Biology</i> , 2020 , 46, 598-609	3.5	7

(2015-2021)

137	Enhanced air stability of superhydrophobic surfaces with flexible overhangs of re-entrant structures. <i>Physics of Fluids</i> , 2021 , 33, 022001	4.4	7	
136	Substantial drag reduction of a tractor-trailer vehicle using gap fairings. <i>Journal of Wind Engineering and Industrial Aerodynamics</i> , 2017 , 171, 93-100	3.7	6	
135	Air spreading through wetted cellulose membranes: Implications for the safety function of hydraulic valves in plants. <i>Physical Review E</i> , 2019 , 100, 032409	2.4	6	
134	Measurement of real pulsatile blood flow using X-ray PIV technique with CO2 microbubbles. <i>Scientific Reports</i> , 2015 , 5, 8840	4.9	6	
133	Nanoparticle role on the repeatability of stimuli-responsive nanocomposites. <i>Scientific Reports</i> , 2014 , 4, 6624	4.9	6	
132	Quantitative Analysis of Helical Flow with Accuracy Using Ultrasound Speckle Image Velocimetry: In Vitro and in Vivo Feasibility Studies. <i>Ultrasound in Medicine and Biology</i> , 2018 , 44, 657-669	3.5	6	
131	Hydraulic Strategy of Cactus Root-Stem Junction for Effective Water Transport. <i>Frontiers in Plant Science</i> , 2018 , 9, 799	6.2	6	
130	Simultaneous measurement of bubble size, velocity and void fraction in two-phase bubbly flows with time-resolved X-ray imaging. <i>Journal of Synchrotron Radiation</i> , 2014 , 21, 424-9	2.4	6	
129	Label-Free Sensing and Classification of Old Stored Blood. <i>Annals of Biomedical Engineering</i> , 2017 , 45, 2563-2573	4.7	6	
128	Interactive ion-mediated sap flow regulation in olive and laurel stems: physicochemical characteristics of water transport via the pit structure. <i>PLoS ONE</i> , 2014 , 9, e98484	3.7	6	
127	Nonlinear oscillations of a sessile drop on a hydrophobic surface induced by ac electrowetting. <i>Physical Review E</i> , 2014 , 90, 033017	2.4	6	
126	Hemodynamics of the omphalo-mesenteric arteries in stage 18 chicken embryos and "flow-structure" relations for the microcirculation. <i>Microvascular Research</i> , 2010 , 80, 402-11	3.7	6	
125	Post-stenotic Recirculating Flow May Cause Hemodynamic Perforator Infarction. <i>Journal of Stroke</i> , 2016 , 18, 66-72	5.6	6	
124	Pristine graphene and graphene oxide induce multi-organ defects in zebrafish (Danio rerio) larvae/juvenile: an in vivo study. <i>Environmental Science and Pollution Research</i> , 2021 , 28, 34664-34675	5.1	6	
123	Flow characteristics around proximal and distal stenoses in a series of tandem stenosed vessels. Journal of Biomechanics, 2016 , 49, 2960-2967	2.9	6	
122	Adsorptive seawater desalination using MOF-incorporated Cu-alginate/PVA beads: Ion removal efficiency and durability. <i>Chemosphere</i> , 2021 , 268, 128797	8.4	6	
121	Learning-based automatic sensing and size classification of microparticles using smartphone holographic microscopy. <i>Analyst, The</i> , 2019 , 144, 1751-1760	5	5	
120	Effect of swirling blood flow on vortex formation at post-stenosis. <i>Proceedings of the Institution of Mechanical Engineers, Part H: Journal of Engineering in Medicine</i> , 2015 , 229, 175-83	1.7	5	

119	Peculiar liquid-feeding and pathogen transmission behavior of Aedes togoi and comparison with Anopheles sinensis. <i>Scientific Reports</i> , 2016 , 6, 20464	4.9	5
118	Advantageous swirling flow in 45lend-to-side anastomosis. <i>Experiments in Fluids</i> , 2014 , 55, 1	2.5	5
117	Cellular imaging using phase holographic microscopy: for the study of pathophysiology of red blood cells and human umbilical vein endothelial cells. <i>Journal of Visualization</i> , 2014 , 17, 235-244	1.6	5
116	Hemodynamic characteristics of flow around a deformable stenosis. <i>Journal of Biomechanics</i> , 2017 , 61, 216-223	2.9	5
115	Holographic analysis on deformation and restoration of malaria-infected red blood cells by antimalarial drug. <i>Journal of Biomedical Optics</i> , 2015 , 20, 115003	3.5	5
114	Detection of circulating tumor cells via an X-ray imaging technique. <i>Journal of Synchrotron Radiation</i> , 2013 , 20, 324-31	2.4	5
113	Self-Assembly Change by Gold Nanoparticle Growth. <i>Journal of Physical Chemistry C</i> , 2011 , 115, 22301-2	23,3308	5
112	Critical role of plectin in anti-migration potential of curcumin. <i>Food Science and Biotechnology</i> , 2011 , 20, 1615-1624	3	5
111	Hollow microcapsules for sensing micro-scale flow motion in X-ray imaging method. <i>Microfluidics and Nanofluidics</i> , 2009 , 6, 419-424	2.8	5
110	Contrast enhancement of speckle patterns from blood in synchrotron X-ray imaging. <i>Journal of Biomechanics</i> , 2009 , 42, 449-54	2.9	5
109	Evaluation of recursive PIV algorithm with correlation based correction method using various flow images. <i>Journal of Mechanical Science and Technology</i> , 2003 , 17, 409-421		5
108	Homocysteine-induced peripheral microcirculation dysfunction in zebrafish and its attenuation by L-arginine. <i>Oncotarget</i> , 2017 , 8, 58264-58271	3.3	5
107	Detection of heparin in the salivary gland and midgut of Aedes togoi. <i>Korean Journal of Parasitology</i> , 2014 , 52, 183-8	1.7	5
106	Effect of water microdroplet size on the removal of indoor particulate matter. <i>Building and Environment</i> , 2020 , 181, 107097	6.5	5
105	Acoustically Excited Oscillating Bubble on a Flexible Structure and Its Energy-Harvesting Capability. <i>International Journal of Precision Engineering and Manufacturing - Green Technology</i> , 2019 , 6, 531-537	3.8	5
104	Accurate real-time monitoring of high particulate matter concentration based on holographic speckles and deep learning. <i>Journal of Hazardous Materials</i> , 2021 , 409, 124637	12.8	5
103	Eco-friendly erucamide-polydimethylsiloxane coatings for marine anti-biofouling. <i>Colloids and Surfaces B: Biointerfaces</i> , 2021 , 207, 112003	6	5
102	Comparison of the tracheal systems of Anopheles sinensis and Aedes togoi larvae using synchrotron X-ray microscopic computed tomography (respiratory system of mosquito larvae using SR-IIT). <i>Microscopy Research and Technique</i> , 2017 , 80, 985-993	2.8	4

(2020-2017)

101	How the pine seeds attach to/detach from the pine cone scale?. Frontiers in Life Science: Frontiers of Interdisciplinary Research in the Life Sciences, 2017 , 10, 38-47	0.7	4
100	Advanced molecular interaction in Cu2+-alginate beads with high M/G ratio for the intercalation of Li+ and Mg2+ ions. <i>Journal of Molecular Structure</i> , 2019 , 1187, 172-178	3.4	4
99	A novel approach to investigate hypoxic microenvironment during rice colonization by Magnaporthe oryzae. <i>Environmental Microbiology</i> , 2019 , 21, 1151-1169	5.2	4
98	Ultrasound Deep Learning for Wall Segmentation and Near-Wall Blood Flow Measurement. <i>IEEE Transactions on Ultrasonics, Ferroelectrics, and Frequency Control</i> , 2020 , 67, 2022-2032	3.2	4
97	Wind tunnel tests on drag reduction of heavy vehicles using sinusoidal boat tails. <i>Journal of Mechanical Science and Technology</i> , 2020 , 34, 201-208	1.6	4
96	A Biologically-Inspired Symmetric Bidirectional Switch. <i>PLoS ONE</i> , 2017 , 12, e0169856	3.7	4
95	Fabrication of Triple-parted Stomata-inspired Membrane with Stimulus-responsive Functions. Scientific Reports, 2016 , 6, 21258	4.9	4
94	Pressure-driven spontaneous ion concentration polarization using an ion-selective membrane. Analytical Biochemistry, 2018 , 557, 13-17	3.1	4
93	Hierarchical nanoparticle clusters induced by block copolymer self-assembly. Soft Matter, 2014, 10, 3897	39 05	4
92	Polymeric self-assembly changes by surface-modified and in-situ-grown nanoparticles. <i>Polymer</i> , 2013 , 54, 1004-1009	3.9	4
91	In vivo measurement of blood flow in a micro-scale stenosis model generated by laser photothermal blood coagulation. <i>IET Systems Biology</i> , 2013 , 7, 50-5	1.4	4
90	Measurement of red blood cell aggregation using X-ray phase contrast imaging. <i>Optics Express</i> , 2010 , 18, 26052-61	3.3	4
89	Evaluation of wind environment around a residential complex using a PIV velocity field measurement technique. <i>Environmental Fluid Mechanics</i> , 2009 , 9, 655-668	2.2	4
88	POD analysis on the sphere wake at a subcritical Reynolds number. <i>Journal of Visualization</i> , 2010 , 13, 311-318	1.6	4
87	Thermal effect on heart rate and hemodynamics in vitelline arteries of stage 18 chicken embryos. Journal of Biomechanics, 2010 , 43, 3217-21	2.9	4
86	Experimental analysis of flow fields inside intake heads of a vacuum cleaner. <i>Journal of Mechanical Science and Technology</i> , 2005 , 19, 894-904	1.6	4
85	Flow structure of the wake behind an elliptic cylinder close to a free surface. <i>Journal of Mechanical Science and Technology</i> , 2001 , 15, 1784-1793		4
84	Effects of surface morphological structure of a brown alga miyeok (Undaria pinnatifida) on sustainable drag reduction. <i>AIP Advances</i> , 2020 , 10, 125123	1.5	4

83	Domino-like water transport on Tillandsia through flexible trichome wings. <i>New Phytologist</i> , 2021 , 231, 1906-1922	9.8	4
82	Solar Evaporation-Based Energy Harvesting Using a Leaf-Inspired Energy-Harvesting Foam. <i>ACS Sustainable Chemistry and Engineering</i> , 2021 , 9, 5027-5037	8.3	4
81	Adsorption of nanoparticles suspended in a drop on a leaf surface of Perilla frutescens and their infiltration through stomatal pathway. <i>Scientific Reports</i> , 2021 , 11, 11556	4.9	4
80	In vivo measurement of hemodynamic information in stenosed rat blood vessels using X-ray PIV. <i>Scientific Reports</i> , 2016 , 6, 37985	4.9	4
79	In-vivo analysis of the uptake process of heavy metals through maize roots by using synchrotron X-ray fluorescence spectroscopy. <i>Journal of the Korean Physical Society</i> , 2016 , 69, 1824-1829	0.6	4
78	The Relationship between Turgor Pressure Change and Cell Hydraulics of Midrib Parenchyma Cells in the Leaves of Zea mays. <i>Cells</i> , 2018 , 7,	7.9	4
77	Volumetric monitoring of airborne particulate matter concentration using smartphone-based digital holographic microscopy and deep learning. <i>Journal of Hazardous Materials</i> , 2021 , 418, 126351	12.8	4
76	Pine cone scale-inspired motile origami. NPG Asia Materials, 2017, 9, e389-e389	10.3	3
75	Effect of material stiffness on the motion and flow near the free end of a finite cylinder surface. <i>Experimental Thermal and Fluid Science</i> , 2019 , 102, 548-558	3	3
74	Optimal Design of Needle Array for Effective Drug Delivery. <i>Annals of Biomedical Engineering</i> , 2018 , 46, 2012-2022	4.7	3
73	The Internal Structure of Macroporous Membranes and Transport of Surface-Modified Nanoparticles. <i>Microscopy and Microanalysis</i> , 2015 , 21, 936-45	0.5	3
72	X-ray CT and histological imaging of xylem vessels organization in Mimosa pudica. <i>Microscopy Research and Technique</i> , 2013 , 76, 1204-12	2.8	3
71	Jet flow characteristics of sinusoidal wavy nozzles. <i>Journal of Mechanical Science and Technology</i> , 2012 , 26, 4007-4016	1.6	3
70	Effect of arsenic absorption on the water-refilling speed of Pteris cretica. <i>Microscopy Research and Technique</i> , 2011 , 74, 517-22	2.8	3
69	Imaging efficiency of an X-ray contrast agent-incorporated polymeric microparticle. <i>Contrast Media and Molecular Imaging</i> , 2011 , 6, 437-48	3.2	3
68	Dynamic PIV measurement of a compressible flow issuing from an airbag inflator nozzle. <i>Journal of Thermal Science</i> , 2006 , 15, 377-381	1.9	3
67	THE FEASIBILITY OF FLUORESCENT NANO-PARTICLE FOR BIOLOGICAL FLOW ANALYSIS IN A MICROCHANNEL. <i>International Journal of Modern Physics B</i> , 2006 , 20, 4505-4510	1.1	3
66	POD analysis of near-wake structures of an elliptic cylinder adjacent to a free surface. <i>Journal of Visualization</i> , 2004 , 7, 179-186	1.6	3

65	Effect of suction nozzle modification on the performance and aero-acoustic noise of a vacuum cleaner. <i>Journal of Mechanical Science and Technology</i> , 2004 , 18, 1648-1660		3
64	Near-wake flow structure of elliptic cylinders close to a free surface: effect of cylinder aspect ratio. <i>Experiments in Fluids</i> , 2004 , 36, 748-758	2.5	3
63	Fabrication of a micro-riblet film and drag reduction effects on curved objects		3
62	A review on carbonized natural green flora for solar desalination. <i>Renewable and Sustainable Energy Reviews</i> , 2022 , 158, 112121	16.2	3
61	Flow induced stress on vulnerable stenosis in tandem stenosed vessels. <i>Physics of Fluids</i> , 2020 , 32, 1019	0 44	3
60	Three-dimensional volumetric monitoring of settling particulate matters on a leaf using digital in-line holographic microscopy. <i>Journal of Hazardous Materials</i> , 2021 , 404, 124116	12.8	3
59	Synchrotron x-ray imaging of acoustic cavitation bubbles induced by acoustic excitation. <i>Measurement Science and Technology</i> , 2017 , 28, 045301	2	2
58	Hydrodynamic Study on the "Stop-and-Acceleration" Pattern of Refilling Flow at Perforation Plates by Using a Xylem-Inspired Channel. <i>Frontiers in Plant Science</i> , 2018 , 9, 1931	6.2	2
57	Structural design of a double-layered porous hydrogel for effective mass transport. <i>Biomicrofluidics</i> , 2015 , 9, 024104	3.2	2
56	Study on the deformation of endothelial cells using a bio-inspired in vitro disease model. <i>Microvascular Research</i> , 2015 , 98, 172-82	3.7	2
55	Nano/Micro Natural Patterns of Hydrogels against Water Loss ACS Applied Bio Materials, 2020, 3, 1293	-4,3:04	2
54	Adaptive hybrid flow measurement of color Doppler and speckle image velocimetry. <i>Ultrasonics</i> , 2020 , 104, 106093	3.5	2
53	Enhancement of plant leaf transpiration with effective use of surface acoustic waves: effect of wave frequency <i>RSC Advances</i> , 2018 , 8, 15141-15148	3.7	2
52	Three-dimensional rotational dynamics of prolate particles in a circular tube. <i>Experiments in Fluids</i> , 2018 , 59, 1	2.5	2
51	Drag-reducing underbody flow of a heavy vehicle with side skirts. <i>Journal of Visualization</i> , 2017 , 20, 369	-3.78	2
50	Adhesion and Suction Functions of the Tip Region of a Nectar-drinking Butterfly Proboscis. <i>Journal of Bionic Engineering</i> , 2017 , 14, 600-606	2.7	2
49	Optimum periodicity of repeated contractile actions applied in mass transport. <i>Scientific Reports</i> , 2015 , 5, 7800	4.9	2
48	Experimental investigation of flow characteristics of a magnetohydrodynamic (MHD) duct of fan-shaped cross section. <i>Journal of Mechanical Science and Technology</i> , 1997 , 11, 547-555		2

47	Experimental study on wind breakage of kiwifruit shoots (Actinidia deliciosa Planch.). <i>Journal of Horticultural Science and Biotechnology</i> , 2008 , 83, 309-312	1.9	2
46	Investigation of the effectiveness of tandem oil fences under currents. <i>Journal of Marine Science and Technology</i> , 2004 , 8, 117-125	1.7	2
45	Bioinspired Fatty Acid Amide-Based Slippery Oleogels for Shear-Stable Lubrication <i>Advanced Science</i> , 2022 , e2105528	13.6	2
44	Solar distillation meets the real world: a review of solar stills purifying real wastewater and seawater <i>Environmental Science and Pollution Research</i> , 2022 , 1	5.1	2
43	NO-dependent attenuation of TPA-induced immunoinflammatory skin changes in Balb/c mice by pindolol, heptaminol or ATRA, but not by verapamil. <i>Oncotarget</i> , 2016 , 7, 47576-47585	3.3	2
42	Ultrasound deep learning for monitoring of flow-vessel dynamics in murine carotid artery. <i>Ultrasonics</i> , 2021 , 120, 106636	3.5	2
41	Double-insulated porous PDMS sponge for heat-localized solar evaporative seawater desalination. <i>Desalination</i> , 2022 , 526, 115540	10.3	2
40	Effects of solar geometry and operation period on stability of solar desalination systems: a review. <i>Environmental Science and Pollution Research</i> , 2021 , 28, 65014-65032	5.1	2
39	Investigation of water transport around the root for a plant using X-ray imaging technique. <i>Measurement: Journal of the International Measurement Confederation</i> , 2020 , 151, 107159	4.6	2
38	SPECT/CT analysis of splenic function in genistein-treated malaria-infected mice. <i>Experimental Parasitology</i> , 2016 , 170, 10-15	2.1	2
37	Depletion of lubricant impregnated in a cavity of lubricant-infused surface. <i>Physics of Fluids</i> , 2021 , 33, 022005	4.4	2
36	Shear-driven drainage of lubricant in a spherical cavity of lubricant-infused surface. <i>Physics of Fluids</i> , 2021 , 33, 122011	4.4	2
35	Thermoresponsive Al3+-crosslinked poly(N-isopropylacrylamide)/alginate composite for green recovery of lithium from Li-spiked seawater. <i>Green Energy and Environment</i> , 2020 , 7, 334-334	5.7	1
34	Superb feeding behavior of Aedes albopictus transmitting Zika virus. <i>PLoS ONE</i> , 2017 , 12, e0184871	3.7	1
33	Enhancement of measurement accuracy of X-ray PIV in comparison with the micro-PIV technique. <i>Journal of Synchrotron Radiation</i> , 2018 , 25, 552-559	2.4	1
32	Capillary waves in a sharp-edged slit driven by vertical vibration. <i>Experimental Thermal and Fluid Science</i> , 2016 , 71, 52-56	3	1
31	Endothelial cell monolayer-based microfluidic systems mimicking complex in vivo microenvironments for the study of leukocyte dynamics in inflamed blood vessels. <i>Methods in Cell Biology</i> , 2018 , 146, 23-42	1.8	1
30	Inertial migration of spherical elastic phytoplankton in pipe flow. <i>Experiments in Fluids</i> , 2014 , 55, 1	2.5	1

(2021-2013)

29	Dynamic motion of a butterfly Argyronome laodice in ground take-off flight. <i>Journal of Mechanical Science and Technology</i> , 2013 , 27, 1763-1769	1.6	1
28	Wind tunnel experiment for wind breakage of Actinidia deliciosa P. shoots. <i>Journal of Mechanical Science and Technology</i> , 2013 , 27, 3113-3121	1.6	1
27	Dehydration-mediated cluster formation of nanoparticles. <i>Scientific Reports</i> , 2015 , 5, 11383	4.9	1
26	Surface-Activated Nanoparticles for Controlled Light-Responsiveness. <i>Advanced Functional Materials</i> , 2013 , 23, 2212-2217	15.6	1
25	Fabrication of Compound Refractive X-ray Lenses Using LIGA Process and Performance Tests. <i>AIP Conference Proceedings</i> , 2007 ,	О	1
24	Spectrochemical analysis of slippery loach skin and kelp using FTIR imaging. <i>Vibrational Spectroscopy</i> , 2022 , 118, 103338	2.1	1
23	Flow induced deformation of vulnerable stenosis under pulsatile flow condition. <i>Physical Review Fluids</i> , 2020 , 5,	2.8	1
22	Medical X-ray PIV technique for visualizing quantitative velocity field distributions of blood flows 2007 , 742-745		1
21	Smart self-cleaning cover glass for automotive miniature cameras 2016,		1
20	Reply to letter by Dyverfeldt and Ebbers regarding the article "Estimation of turbulent kinetic energy using 4D phase-contrast MRI: Effect of scan parameters and target vessel size". <i>Magnetic Resonance Imaging</i> , 2016 , 34, 1338-1340	3.3	1
19	Accuracy evaluation of blood flow distribution in the Fontan circulation: effects of resolution and velocity noise. <i>Journal of Visualization</i> , 2019 , 22, 245-257	1.6	1
18	Flattened-Top Domical Droplet Formed by a Poly(pyrrole) Membrane. <i>Macromolecular Materials and Engineering</i> , 2019 , 304, 1800707	3.9	1
17	Measurement of pressure around porous membranes using a cell pressure probe. <i>Measurement:</i> Journal of the International Measurement Confederation, 2018 , 128, 214-219	4.6	1
16	Developmental toxicity induced by particulate matter (PM) in zebrafish (Danio rerio) model. <i>Aquatic Toxicology</i> , 2021 , 238, 105928	5.1	1
15	Multifunctional biopolymer coatings inspired by loach skin. <i>Progress in Organic Coatings</i> , 2021 , 158, 106	53 .β.8	1
14	Effect of the flow structure on the indoor deposition of particulate matter. Journal of Visualization,1	1.6	O
13	Rapid and selective adsorption of Li+ from concentrated seawater using repulsive force of Al3+Brosslinked alginate composite incorporated with hydrogen manganese oxide. <i>Hydrometallurgy</i> , 2022 , 208, 105812	4	0
12	Enhanced air stability of ridged superhydrophobic surface with nanostructure. <i>AIP Advances</i> , 2021 , 11, 105209	1.5	O

11	Air spread through a wetted deformable membrane: Implications for the mechanism of soft valves in plants. <i>Physical Review E</i> , 2021 , 103, 062407	2.4	О
10	Effectual removal of indoor ultrafine PM using submicron water droplets. <i>Journal of Environmental Management</i> , 2021 , 296, 113166	7.9	0
9	Crossly charged microfluidic device for spontaneous filtration without an external power supply. <i>Analytical Biochemistry</i> , 2019 , 577, 21-25	3.1	
8	A novel fibrous duct structure discovered in the brain meninges by using polarized light microscopy. <i>Journal of the Korean Physical Society</i> , 2016 , 68, 1246-1253	0.6	
7	Collective ordering of microscale matters in natural analogy. Scientific Reports, 2015, 5, 10790	4.9	
6	Protection of vessel permeability by genistein against lipopolysaccharide induced acute inflammation in a chick embryo chorioallantoic membrane model. <i>Food Science and Biotechnology</i> , 2013 , 22, 1-8	3	
5	Vibrational characteristics of sphere model installed in wind tunnel test section. <i>Journal of Mechanical Science and Technology</i> , 2010 , 24, 2461-2465	1.6	
4	Nanoscale element behavior in a continuum. <i>Journal of Synchrotron Radiation</i> , 2020 , 27, 1033-1041	2.4	
3	Immunological consequences of ageing microvascular hemodynamic changes in view of cancer development and treatment. <i>Oncotarget</i> , 2017 , 8, 69047-69061	3.3	
2	Visualization of Wetting Phenomena of Microdroplets Impinging on Superhydrophobic Textured Surfaces with anisotropically arrayed pillars. <i>Journal of the Korean Society of Visualization</i> , 2012 , 10, 39-	-40	
1	Fluid-dynamic effect of pannus formation around the prosthetic heart valve: in vitro demonstration using a heart-mimic pulsatile pump and particle image velocimetry. <i>Journal of Mechanical Science and Technology</i> , 2021 , 35, 209-220	1.6	