Simon M Harrison

List of Publications by Year
in descending order

24 papers	690 citations	643344 15 h-index	759306 22 g-index
24 all docs	24 docs citations	24 times ranked	675 citing authors

#	Article	IF	Citations
1	A Coupled Biomechanical-Smoothed Particle Hydrodynamics Model for Horse Racing Tracks. Frontiers in Bioengineering and Biotechnology, 2022, 10, 766748.	2.0	2
2	Soft Pneumatic Actuators: A Review of Design, Fabrication, Modeling, Sensing, Control and Applications. IEEE Access, 2022, 10, 59442-59485.	2.6	72
3	Application of SPH to Single and Multiphase Geophysical, Biophysical and Industrial Fluid Flows. International Journal of Computational Fluid Dynamics, 2021, 35, 22-78.	0.5	15
4	A particle-based modelling approach to food processing operations. Food and Bioproducts Processing, 2021, 127, 14-57.	1.8	9
5	Dive Mechanic: Bringing 3D virtual experimentation using biomechanical modelling to elite level diving with the Workspace workflow engine. Mathematics and Computers in Simulation, 2020, 175, 202-217.	2.4	3
6	Dynamic simulation of flat water kayaking using a coupled biomechanical-smoothed particle hydrodynamics model. Human Movement Science, 2019, 64, 252-273.	0.6	15
7	Investigating mixing and emptying for aqueous liquid content from the stomach using a coupled biomechanical-SPH model. Food and Function, 2018, 9, 3202-3219.	2.1	32
8	Peristaltic transport of a particulate suspension in the small intestine. Applied Mathematical Modelling, 2017, 44, 143-159.	2.2	62
9	Modeling Food Digestion in the Oral Cavity. , 2016, , .		2
10	A coupled biomechanical-Smoothed Particle Hydrodynamics model for predicting the loading on the body during elite platform diving. Applied Mathematical Modelling, 2016, 40, 3812-3831.	2.2	17
11	How arterial pressures affect the consideration of internal carotid artery angle as a risk factor for carotid artherosclerotic disease. Progress in Computational Fluid Dynamics, 2015, 15, 87.	0.1	3
12	Computational Modeling of Food Oral Breakdown Using Smoothed Particle Hydrodynamics. Journal of Texture Studies, 2014, 45, 97-109.	1.1	40
13	Evaluation of a subject-specific finite-element model of the equine metacarpophalangeal joint under physiological load. Journal of Biomechanics, 2014, 47, 65-73.	0.9	85
14	Challenges in computational modelling of food breakdown and flavour release. Food and Function, 2014, 5, 2792-2805.	2.1	40
15	Towards modelling of fluid flow and food breakage by the teeth in the oral cavity using smoothed particle hydrodynamics (SPH). European Food Research and Technology, 2014, 238, 185-215.	1.6	41
16	Pitching Effects of Buoyancy During Four Competitive Swimming Strokes. Journal of Applied Biomechanics, 2014, 30, 609-618.	0.3	17
17	Anatomical and mechanical relationship between the proximal attachment of adductor longus and the distal rectus sheath. Clinical Anatomy, 2013, 26, 522-530.	1.5	54
18	Prediction of industrial, biophysical and extreme geophysical flows using particle methods. Engineering Computations, 2013, 30, 157-196.	0.7	30

#	Article	IF	Citations
19	Forelimb muscle activity during equine locomotion. Journal of Experimental Biology, 2012, 215, 2980-2991.	0.8	45
20	People with PFJ OA ambulate with altered muscle forces. Journal of Science and Medicine in Sport, 2010, 13, e23-e24.	0.6	0
21	Can the adductor longus transmit force across the pubic symphysis? Implications for the pathophysiology of athletic groin pain. Journal of Science and Medicine in Sport, 2010, 13, e58.	0.6	1
22	Relationship between muscle forces, joint loading and utilization of elastic strain energy in equine locomotion. Journal of Experimental Biology, 2010, 213, 3998-4009.	0.8	88
23	Towards a novel tensile elastometer for soft tissue. International Journal of Mechanical Sciences, 2008, 50, 626-640.	3.6	5
24	A pinch elastometer for soft tissue. Medical Engineering and Physics, 2007, 29, 307-315.	0.8	12