Elisa Donati

List of Publications by Year
in descending order

33	1,174	567281	610901
papers	citations	15	24
		h-index	g-index

34	34	34	901
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	2022 roadmap on neuromorphic computing and engineering. Neuromorphic Computing and Engineering, 2022, 2, 022501.	5.9	217
2	A review on animal–robot interaction: from bio-hybrid organisms to mixed societies. Biological Cybernetics, 2019, 113, 201-225.	1.3	130
3	Hardware Implementation of Deep Network Accelerators Towards Healthcare and Biomedical Applications. IEEE Transactions on Biomedical Circuits and Systems, 2020, 14, 1138-1159.	4.0	93
4	Hand-Gesture Recognition Based on EMG and Event-Based Camera Sensor Fusion: A Benchmark in Neuromorphic Computing. Frontiers in Neuroscience, 2020, 14, 637.	2.8	87
5	Discrimination of EMG Signals Using a Neuromorphic Implementation of a Spiking Neural Network. IEEE Transactions on Biomedical Circuits and Systems, 2019, 13, 795-803.	4.0	79
6	Adaptive Extreme Edge Computing for Wearable Devices. Frontiers in Neuroscience, 2021, 15, 611300.	2.8	67
7	Multiple cues produced by a robotic fish modulate aggressive behaviour in Siamese fighting fishes. Scientific Reports, 2017, 7, 4667.	3.3	57
8	Lateralisation of aggressive displays in a tephritid fly. Die Naturwissenschaften, 2015, 102, 1251.	1.6	50
9	Optimal solid state neurons. Nature Communications, 2019, 10, 5309.	12.8	47
10	Embodied neuromorphic intelligence. Nature Communications, 2022, 13, 1024.	12.8	40
11	Lateralized courtship in a parasitic wasp. Laterality, 2016, 21, 243-254.	1.0	33
12	Investigation of Collective Behaviour and Electrocommunication in the Weakly Electric Fish,<i>Mormyrus rume</i>, through a biomimetic Robotic Dummy Fish. Bioinspiration and Biomimetics, 2016, 11, 066009.	2.9	31
13	Processing EMG signals using reservoir computing on an event-based neuromorphic system. , 2018, , .		26
14	Novel universal system for 3-dimensional orthodontic force-moment measurements and its clinical use. American Journal of Orthodontics and Dentofacial Orthopedics, 2015, 148, 174-183.	1.7	25
15	EMG-Based Gestures Classification Using a Mixed-Signal Neuromorphic Processing System. IEEE Journal on Emerging and Selected Topics in Circuits and Systems, 2020, 10, 578-587.	3.6	24
16	Open-Loop Neuromorphic Controller Implemented on VLSI Devices. , 2018, , .		18
17	Closed-Loop Spiking Control on a Neuromorphic Processor Implemented on the iCub. IEEE Journal on Emerging and Selected Topics in Circuits and Systems, 2020, 10, 546-556.	3.6	17
18	subCULTron - Cultural Development as a Tool in Underwater Robotics. Communications in Computer and Information Science, 2018, , 27-41.	0.5	16

#	Article	IF	Citations
19	Organic electronics Axon-Hillock neuromorphic circuit: towards biologically compatible, and physically flexible, integrate-and-fire spiking neural networks. Journal Physics D: Applied Physics, 2021, 54, 104004.	2.8	16
20	Modelling jumping in Locusta migratoria and the influence of substrate roughness. Entomologia Generalis, 2019, 38, 317-332.	3.1	15
21	Is bigger better? Male body size affects wingâ€borne courtship signals and mating success in the olive fruit fly, <i>Bactrocera oleae</i> (Diptera: Tephritidae). Insect Science, 2016, 23, 869-880.	3.0	14
22	Neuromorphic Implementation of Spiking Relational Neural Network for Motor Control. , 2020, , .		12
23	Neuromorphic Implementation of a Recurrent Neural Network for EMG Classification. , 2020, , .		9
24	May the wild male loose? Male wing fanning performances and mating success in wild and mass-reared strains of the aphid parasitoid Aphidius colemani Viereck (Hymenoptera: Braconidae: Aphidiinae). BioControl, 2014, 59, 487-500.	2.0	8
25	A novel spiking CPG-based implementation system to control a lamprey robot. , 2016, , .		8
26	Sensor fusion using EMG and vision for hand gesture classification in mobile applications. , 2019, , .		6
27	Neuromorphic Pattern Generation Circuits for Bioelectronic Medicine. , 2021, , .		6
28	aMussels: Diving and Anchoring in a New Bio-inspired Under-Actuated Robot Class for Long-Term Environmental Exploration and Monitoring. Lecture Notes in Computer Science, 2017, , 300-314.	1.3	5
29	Singing on the wings! Male wing fanning performances affect female willingness to copulate in the aphid parasitoid <i>Lysiphlebus testaceipes</i> (Hymenoptera: Braconidae: Aphidiinae). Insect Science, 2016, 23, 603-611.	3.0	4
30	Deriving optimal silicon neuron circuit specifications using Data Assimilation. , 2018, , .		4
31	Organic Logâ€Domain Integrator Synapse. Advanced Electronic Materials, 2022, 8, 2100724.	5.1	4
32	Measuring 3D-orthodontic actions to guide clinical treatments involving coil springs and miniscrews. Biomedical Microdevices, 2017, 19, 14.	2.8	3
33	Live Demostration: Sensor fusion using EMG and vision for hand gesture classification in mobile applications. , 2019, , .		3