Yan Fang

List of Publications by Year
in descending order

		1163117	1281871
23 papers	270 citations	8 h-index	11 g-index
24 all docs	24 docs citations	24 times ranked	404 citing authors

#	Article	IF	Citations
1	An End-to-End Spiking Neural Network Platform for Edge Robotics: From Event-Cameras to Central Pattern Generation. IEEE Transactions on Cognitive and Developmental Systems, 2022, 14, 1092-1103.	3.8	8
2	Merged Logic and Memory Fabrics for Accelerating Machine Learning Workloads. IEEE Design and Test, 2021, 38, 39-68.	1.2	10
3	Bio-inspired Gait Imitation of Hexapod Robot Using Event-Based Vision Sensor and Spiking Neural Network. , 2020, , .		3
4	<i>Learning to Walk</i>: Bio-Mimetic Hexapod Locomotion via Reinforcement-Based Spiking Central Pattern Generation. IEEE Journal on Emerging and Selected Topics in Circuits and Systems, 2020, 10, 536-545.	3.6	11
5	Learning to Walk: Spike Based Reinforcement Learning for Hexapod Robot Central Pattern Generation. , 2020, , .		19
6	Online Reward-Based Training of Spiking Central Pattern Generator for Hexapod Locomotion. , 2020, , .		1
7	A Swarm Optimization Solver Based on Ferroelectric Spiking Neural Networks. Frontiers in Neuroscience, 2019, 13, 855.	2.8	18
8	Neuro-Mimetic Dynamics of a Ferroelectric FET-Based Spiking Neuron. IEEE Electron Device Letters, 2019, 40, 1213-1216.	3.9	39
9	Tuning the synchronization of a network of weakly coupled self-oscillating gels via capacitors. Chaos, 2018, 28, 053106.	2.5	2
10	Detecting spatial defects in colored patterns using self-oscillating gels. Journal of Applied Physics, 2018, 123, 215107.	2.5	3
11	Designing self-powered materials systems that perform pattern recognition. Chemical Communications, 2017, 53, 7692-7706.	4.1	12
12	A Simplified Phase Model for Simulation of Oscillator-Based Computing Systems. ACM Journal on Emerging Technologies in Computing Systems, 2017, 13, 1-20.	2.3	2
13	Achieving Swarm Intelligence with Spiking Neural Oscillators. , 2017, , .		3
14	Pattern recognition with â€œmaterials that computeâ€. Science Advances, 2016, 2, e1601114.	10.3	42
15	Non-Boolean Associative Processing: Circuits, System Architecture, and Algorithms. IEEE Journal on Exploratory Solid-State Computational Devices and Circuits, 2015, 1, 94-102.	1.5	11
16	A Simplified Phase Model for Oscillator Based Computing. , 2015, , .		1
17	A Computational Primitive for Convolution based on Coupled Oscillator Arrays. , 2015, , .		4
18	Modeling oscillator arrays for video analytic applications. , 2014, , .		3

#	Article	IF	Citations
19	HMAX image processing pipeline with coupled oscillator acceleration. , 2014, , .		4
20	An image processing pipeline using coupled oscillators. , 2014, , .		3
21	Computational Architectures Based on Coupled Oscillators. , 2014, , .		22
22	Image segmentation using frequency locking of coupled oscillators. , 2014, , .		4
23	Non-Boolean associative architectures based on nano-oscillators. , 2012, , .		42