Simone Balatti

List of Publications by Year
in descending order

26	2,959	394421 19	610901 24
papers	citations	h-index	g-index

26	26	26	2108
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Scaling behavior of ferroelectric FET with reduction in number of domains in ferroelectric layer. Japanese Journal of Applied Physics, 2022, 61, SC1030.	1.5	4
2	Investigation of Gate-Length Scaling of Ferroelectric FET. IEEE Transactions on Electron Devices, 2021, 68, 1364-1368.	3.0	9
3	Postcycling Degradation in Metal-Oxide Bipolar Resistive Switching Memory. IEEE Transactions on Electron Devices, 2016, 63, 4279-4287.	3.0	34
4	Analytical Modeling of Current Overshoot in Oxide-Based Resistive Switching Memory (RRAM). IEEE Electron Device Letters, 2016, 37, 1268-1271.	3.9	21
5	Neuromorphic Learning and Recognition With One-Transistor-One-Resistor Synapses and Bistable Metal Oxide RRAM. IEEE Transactions on Electron Devices, 2016, 63, 1508-1515.	3.0	192
6	Physical Unbiased Generation of Random Numbers With Coupled Resistive Switching Devices. IEEE Transactions on Electron Devices, 2016, 63, 2029-2035.	3.0	95
7	Normally-off Logic Based on Resistive Switchesâ€”Part I: Logic Gates. IEEE Transactions on Electron Devices, 2015, 62, 1831-1838.	3.0	122
8	Data retention statistics and modelling in HfO<inf>2</inf> resistive switching memories. , 2015, , .		11
9	Normally-off Logic Based on Resistive Switchesâ€”Part II: Logic Circuits. IEEE Transactions on Electron Devices, 2015, 62, 1839-1847.	3.0	19
10	Noise-Induced Resistance Broadening in Resistive Switching Memoryâ€”Part II: Array Statistics. IEEE Transactions on Electron Devices, 2015, 62, 3812-3819.	3.0	114
11	True Random Number Generation by Variability of Resistive Switching in Oxide-Based Devices. IEEE Journal on Emerging and Selected Topics in Circuits and Systems, 2015, 5, 214-221.	3.6	200
12	Noise-Induced Resistance Broadening in Resistive Switching Memoryâ€”Part I: Intrinsic Cell Behavior. IEEE Transactions on Electron Devices, 2015, 62, 3805-3811.	3.0	42
13	Voltage-Controlled Cycling Endurance of HfO_{<italic>x</italic>}-Based Resistive-Switching Memory. IEEE Transactions on Electron Devices, 2015, 62, 3365-3372.	3.0	180
14	Impact of the Mechanical Stress on Switching Characteristics of Electrochemical Resistive Memory. Advanced Materials, 2014, 26, 3885-3892.	21.0	97
15	Statistical Fluctuations in HfO_x Resistive-Switching Memory: Part IIâ€”Random Telegraph Noise. IEEE Transactions on Electron Devices, 2014, 61, 2920-2927.	3.0	161
16	Statistical Fluctuations in HfO_{<italic><bold>x</bold></italic>} Resistive-Switching Memory: Part I - Set/Reset Variability. IEEE Transactions on Electron Devices, 2014, 61, 2912-2919.	3.0	336
17	Analytical Modeling of Oxide-Based Bipolar Resistive Memories and Complementary Resistive Switches. IEEE Transactions on Electron Devices, 2014, 61, 2378-2386.	3.0	171
18	A 2-transistor/1-resistor artificial synapse capable of communication and stochastic learning in neuromorphic systems. Frontiers in Neuroscience, 2014, 8, 438.	2.8	74

#	Article	IF	Citations
19	Complementary Switching in Oxide-Based Bipolar Resistive-Switching Random Memory. IEEE Transactions on Electron Devices, 2013, 60, 70-77.	3.0	145
20	Set Variability and Failure Induced by Complementary Switching in Bipolar RRAM. IEEE Electron Device Letters, 2013, 34, 861-863.	3.9	67
21	Filament Evolution during Set and Reset Transitions in Oxide Resistive Switching Memory. Japanese Journal of Applied Physics, 2013, 52, 04CD10.	1.5	8
22	Size-Dependent Drift of Resistance Due to Surface Defect Relaxation in Conductive-Bridge Memory. IEEE Electron Device Letters, 2012, 33, 1189-1191.	3.9	19
23	Physical modeling of voltage-driven resistive switching in oxide RRAM. , 2012, , .		6
24	Resistive Switching by Voltage-Driven Ion Migration in Bipolar RRAMâ€”Part II: Modeling. IEEE Transactions on Electron Devices, 2012, 59, 2468-2475.	3.0	504
25	Resistive Switching by Voltage-Driven Ion Migration in Bipolar RRAMâ€”Part I: Experimental Study. IEEE Transactions on Electron Devices, 2012, 59, 2461-2467.	3.0	215
26	Evidence for Voltage-Driven Set/Reset Processes in Bipolar Switching RRAM. IEEE Transactions on Electron Devices, 2012, 59, 2049-2056.	3.0	113