

Tu-Pei Chen

List of Publications by Year in descending order

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all docs

344
docs citations

344
times ranked

8482
citing authors

#	ARTICLE	IF	CITATIONS
1	Epilepsy detection with artificial neural network based on as-fabricated neuromorphic chip platform. AIP Advances, 2022, 12, 035106.	1.3	3
2	Transparent electronic and photoelectric synaptic transistors based on the combination of an InGaZnO channel and a TaO _x gate dielectric. Nanoscale, 2022, 14, 10245-10254.	5.6	8
3	Stock Price Prediction Based on an Energy-Efficient Spiking-LSTM Hardware Accelerator. Journal of Physics: Conference Series, 2021, 1828, 012050.	0.4	0
4	Performance Enhancement of Transparent Amorphous IGZO Thin-Film Transistor Realized by Sputtered Amorphous AlO _x Passivation Layer. ECS Journal of Solid State Science and Technology, 2021, 10, 045006.	1.8	5
5	Design of a constant loop bandwidth phase-locked loop based on artificial neural network. IEICE Electronics Express, 2021, 18, 20210120-20210120.	0.8	0
6	Quantized STDP-based online-learning spiking neural network. Neural Computing and Applications, 2021, 33, 12317-12332.	5.6	17
7	Efficient and reconfigurable reservoir computing to realize alphabet pronunciation recognition based on processing-in-memory. Applied Physics Letters, 2021, 119, .	3.3	4
8	A Large-Size HfO ₂ Based RRAM Structure Suitable for Integration of One RRAM with One InGaZnO Thin Film Transistor for Large-Area Applications. ECS Journal of Solid State Science and Technology, 2021, 10, 115004.	1.8	1
9	Application of Deep Compression Technique in Spiking Neural Network Chip. IEEE Transactions on Biomedical Circuits and Systems, 2020, 14, 274-282.	4.0	10
10	Uncovering the Indium Filament Revolution in Transparent Bipolar ITO/SiO _x /ITO Resistive Switching Memories. ACS Applied Materials & Interfaces, 2020, 12, 4579-4585.	8.0	17
11	3D Geometric Engineering of the Double Wedge-Like Electrodes for Filament-Type RRAM Device Performance Improvement. IEEE Access, 2020, 8, 4924-4934.	4.2	2
12	Investigation of Electrical Noise Signal Triggered Resistive Switching and Its Implications. IEEE Transactions on Electron Devices, 2020, 67, 4178-4184.	3.0	5
13	HfO _x -Based RRAM Device With Sandwich-Like Electrode for Thermal Budget Requirement. IEEE Transactions on Electron Devices, 2020, 67, 4193-4200.	3.0	16
14	Design of AM Self-Capacitive Transparent Touch Panel Based on a-IGZO Thin-Film Transistors. IEEE Access, 2020, 8, 76929-76934.	4.2	6
15	STBNN: Hardware-friendly spatio-temporal binary neural network with high pattern recognition accuracy. Neurocomputing, 2020, 409, 351-360.	5.9	19
16	An energy-efficient deep convolutional neural networks coprocessor for multi-object detection. Microelectronics Journal, 2020, 98, 104737.	2.0	8
17	Spike-driven gated recurrent neural network processor for electrocardiogram arrhythmias detection realised in 55-nm CMOS technology. Electronics Letters, 2020, 56, 1230-1232.	1.0	7
18	A Neuromorphic-Hardware Oriented Bio-Plausible Online-Learning Spiking Neural Network Model. IEEE Access, 2019, 7, 71730-71740.	4.2	18

#	ARTICLE	IF	CITATIONS
19	Uniform and electroforming-free resistive memory devices based on solution-processed triple-layered NiO/Al ₂ O ₃ thin films. Applied Physics A: Materials Science and Processing, 2019, 125, 1.	2.3	4
20	Study of Recall Time of Associative Memory in a Memristive Hopfield Neural Network. IEEE Access, 2019, 7, 58876-58882.	4.2	11
21	Design of a Neural Network-Based VCO With High Linearity and Wide Tuning Range. IEEE Access, 2019, 7, 60120-60125.	4.2	7
22	Selective Scattering of Blue and Red Light Based on Silver and Gold Nanocubes. ECS Journal of Solid State Science and Technology, 2019, 8, R51-R57.	1.8	2
23	Implementation of a Low Noise Amplifier With Self-Recovery Capability. IEEE Access, 2019, 7, 43076-43083.	4.2	4
24	Surface modification of Na ₂ Ti ₃ O ₇ nanofibre arrays using N-doped graphene quantum dots as advanced anodes for sodium-ion batteries with ultra-stable and high-rate capability. Journal of Materials Chemistry A, 2019, 7, 12751-12762.	10.3	83
25	Winner-takes-all mechanism realized by memristive neural network. Applied Physics Letters, 2019, 115, .	3.3	15
26	Low energy consumption dual-ion electrochemical deionization system using NaTi ₂ (PO ₄) ₃ -AgNPs electrodes. Desalination, 2019, 451, 241-247.	8.2	99
27	Sharp selective scattering of red, green, and blue light achieved via gain material's loss compensation. Optics Express, 2019, 27, 9189.	3.4	4
28	Toward transparent projection display: recent progress in frequency-selective scattering of RGB light based on metallic nanoparticle's localized surface plasmon resonance. Opto-Electronic Advances, 2019, 2, 19002001-19002015.	13.3	11
29	Resonant scattering of green light enabled by Ag@TiO ₂ and its application in a green light projection screen. Nanoscale, 2018, 10, 2438-2446.	5.6	11
30	3D hierarchical defect-rich NiMo ₃ S ₄ nanosheet arrays grown on carbon textiles for high-performance sodium-ion batteries and hydrogen evolution reaction. Nano Energy, 2018, 49, 460-470.	16.0	107
31	Bifunctional porous iron phosphide/carbon nanostructure enabled high-performance sodium-ion battery and hydrogen evolution reaction. Energy Storage Materials, 2018, 15, 98-107.	18.0	102
32	Predicting House Price With a Memristor-Based Artificial Neural Network. IEEE Access, 2018, 6, 16523-16528.	4.2	39
33	Î³-Ray Radiation Effects on an HfO ₂ -Based Resistive Memory Device. IEEE Nanotechnology Magazine, 2018, 17, 61-64.	2.0	13
34	Effect of Surface Scattering of Electrons on Ratios of Optical Absorption and Scattering to Extinction of Gold Nanoshell. Nanoscale Research Letters, 2018, 13, 299.	5.7	13
35	Realization of a Power-Efficient Transmitter Based on Integrated Artificial Neural Network. IEEE Access, 2018, 6, 68773-68781.	4.2	10
36	Smart electronic skin having gesture recognition function by LSTM neural network. Applied Physics Letters, 2018, 113, .	3.3	20

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37	Thickness effect of nickel oxide thin films on associated solution-processed write-once-read-many-times memory devices. <i>Applied Physics A: Materials Science and Processing</i> , 2018, 124, 1.	2.3	12
38	A Deformable and Highly Robust Ethyl Cellulose Transparent Conductor with a Scalable Silver Nanowires Bundle Micromesh. <i>Advanced Materials</i> , 2018, 30, e1802803.	21.0	95
39	Handwritten-Digit Recognition by Hybrid Convolutional Neural Network based on HfO ₂ Memristive Spiking-Neuron. <i>Scientific Reports</i> , 2018, 8, 12546.	3.3	34
40	Study of electrochromic characteristics in the near-infrared region of electrochromic devices based on solution-processed amorphous WO ₃ films. <i>Materials Science in Semiconductor Processing</i> , 2018, 88, 73-78.	4.0	14
41	Optical-reconfigurable carbon nanotube and indium-tin-oxide complementary thin-film transistor logic gates. <i>Nanoscale</i> , 2018, 10, 13122-13129.	5.6	17
42	Unlocking the potential of SnS ₂ : Transition metal catalyzed utilization of reversible conversion and alloying reactions. <i>Scientific Reports</i> , 2017, 7, 41015.	3.3	26
43	Direct Observation of Indium Conductive Filaments in Transparent, Flexible, and Transferable Resistive Switching Memory. <i>ACS Nano</i> , 2017, 11, 1712-1718.	14.6	83
44	Modeling of a selective solar absorber thin film structure based on double TiN _x O _y layers for concentrated solar power applications. <i>Solar Energy</i> , 2017, 142, 33-38.	6.1	21
45	A MoS ₂ -based coplanar neuron transistor for logic applications. <i>Nanotechnology</i> , 2017, 28, 214001.	2.6	12
46	W/Cu thin film infrared reflector for TiN _x O _y based selective solar absorber with high thermal stability. <i>Journal of Applied Physics</i> , 2017, 121, .	2.5	6
47	Nanoparticle-assisted Frenkel-Poole emission in two-terminal charging-controlled memory devices based on Si-rich silicon nitride thin films. <i>Applied Physics A: Materials Science and Processing</i> , 2017, 123, 1.	2.3	1
48	Synthesis of IGZO ink and study of ink-jet printed IGZO thin films with different Ga concentrations. <i>Solid-State Electronics</i> , 2017, 138, 108-112.	1.4	5
49	Influences of water molecules on the electronic properties of atomically thin molybdenum disulfide. <i>Applied Physics Letters</i> , 2017, 111, .	3.3	7
50	Investigation of localized surface plasmon resonance of TiN nanoparticles in TiN _x O _y thin films. <i>Optical Materials Express</i> , 2016, 6, 2422.	3.0	20
51	Amorphous-Si-Based Resistive Switching Memories with Highly Reduced Electroforming Voltage and Enlarged Memory Window. <i>Advanced Electronic Materials</i> , 2016, 2, 1500370.	5.1	23
52	Hexagonal Boron Nitride Thin Film for Flexible Resistive Memory Applications. <i>Advanced Functional Materials</i> , 2016, 26, 2176-2184.	14.9	167
53	A light-stimulated synaptic transistor with synaptic plasticity and memory functions based on InGaZnO-Al ₂ O ₃ thin film structure. <i>Journal of Applied Physics</i> , 2016, 119, .	2.5	153
54	Design of a High Performance Selective Solar Absorber with the Structure of SiO ₂ -TiO ₂ -TiN _x O _y -Cu. <i>ECS Journal of Solid State Science and Technology</i> , 2016, 5, N43-N47.	1.8	9

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55	Novel concepts in functional resistive switching memories. Journal of Materials Chemistry C, 2016, 4, 9637-9645.	5.5	59
56	Direct Observation of Conducting Filaments in Tungsten Oxide Based Transparent Resistive Switching Memory. ACS Applied Materials & Interfaces, 2016, 8, 27885-27891.	8.0	80
57	Resistive Switching in p-Type Nickel Oxide/n-Type Indium Gallium Zinc Oxide Thin Film Heterojunction Structure. ECS Journal of Solid State Science and Technology, 2016, 5, Q239-Q243.	1.8	5
58	Two dimensional layered Co _{0.85} Se nanosheets as a high-capacity anode for lithium-ion batteries. Nanoscale, 2016, 8, 14992-15000.	5.6	90
59	Resistive switching characteristics of RRAM devices based on spin-coated a-IGZO thin films and ink-jet printed Ag electrodes. , 2016, , .		1
60	WS ₂ “3D graphene nano-architecture networks for high performance anode materials of lithium ion batteries. RSC Advances, 2016, 6, 107768-107775.	3.6	29
61	Ultrahigh Performance of Novel Capacitive Deionization Electrodes based on A Three-Dimensional Graphene Architecture with Nanopores. Scientific Reports, 2016, 6, 18966.	3.3	105
62	3D hierarchical Co ₃ O ₄ @Co ₃ S ₄ nanoarrays as cathode materials for asymmetric pseudocapacitors. Journal of Materials Chemistry A, 2016, 4, 3287-3296.	10.3	147
63	Hydrothermally synthesized graphene and Fe ₃ O ₄ nanocomposites for high performance capacitive deionization. RSC Advances, 2016, 6, 11967-11972.	3.6	52
64	InGaZnO Thin-Film Transistors With Coplanar Control Gates for Single-Device Logic Applications. IEEE Transactions on Electron Devices, 2016, 63, 1383-1387.	3.0	8
65	Electronic and Optical Properties of Si and Ge Nanocrystals. Advances in Materials Science and Engineering, 2016, , 215-254.	0.4	0
66	Light Emission Properties of Si Nanocrystals Embedded in a Dielectric Matrix. Advances in Materials Science and Engineering, 2016, , 255-282.	0.4	0
67	Thickness Dependence of Optical Properties of Amorphous Indium Gallium Zinc Oxide Thin Films: Effects of Free-Electrons and Quantum Confinement. ECS Solid State Letters, 2015, 4, P29-P32.	1.4	11
68	Dielectric engineering of Ge nanocrystal/SiO ₂ nanocomposite thin films with Ge ion implantation: Modeling and measurement. Materials and Design, 2015, 83, 713-718.	7.0	9
69	Associative memory realized by a reconfigurable memristive Hopfield neural network. Nature Communications, 2015, 6, 7522.	12.8	182
70	Evolution of the localized surface plasmon resonance and electron confinement effect with the film thickness in ultrathin Au films. Journal of Nanoparticle Research, 2015, 17, 1.	1.9	6
71	Highly spectrum-selective ultraviolet photodetector based on p-NiO/n-IGZO thin film heterojunction structure. Optics Express, 2015, 23, 27683.	3.4	37
72	Study of Multilevel High-Resistance States in HfO _x -Based Resistive Switching Random Access Memory by Impedance Spectroscopy. IEEE Transactions on Electron Devices, 2015, 62, 2684-2688.	3.0	11

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73	Synaptic long-term potentiation realized in Pavlov's dog model based on a NiOx-based memristor. Journal of Applied Physics, 2014, 116, .	2.5	52
74	An Experimental Study of Lateral Charge Transfer in Silicon Nanocrystal Layer Embedded in SiO ₂ Thin Film. Nanoscience and Nanotechnology Letters, 2014, 6, 798-804.	0.4	1
75	Low dimension structures and devices for new generation photonic technology. , 2014, , .		0
76	Influence of the Excess Al Content on Memory Behaviors of WORM Devices Based on Sputtered Al-Rich Aluminum Oxide Thin Films. Nanoscience and Nanotechnology Letters, 2014, 6, 845-848.	0.4	0
77	Influence of localized surface plasmon resonance and free electrons on the optical properties of ultrathin Au films: a study of the aggregation effect. Optics Express, 2014, 22, 5124.	3.4	32
78	A study on the evolution of dielectric function of ZnO thin films with decreasing film thickness. Journal of Applied Physics, 2014, 115, .	2.5	27
79	Lateral Conduction Switching in Sputtered Ni-Rich NiO Thin Films for Write-Once-Read-Many-Times Memory Applications. International Journal of Applied Ceramic Technology, 2014, 11, 732-737.	2.1	1
80	Evolution of dielectric function of Al-doped ZnO thin films with thermal annealing: effect of band gap expansion and free-electron absorption. Optics Express, 2014, 22, 23086.	3.4	20
81	Tunable long-distance light transportation along Au nanoparticle chains: promising for optical interconnect. Journal of Nanoparticle Research, 2014, 16, 1.	1.9	0
82	Realization of write-once-read-many-times memory device with O ₂ plasma-treated indium gallium zinc oxide thin film. Applied Physics Letters, 2014, 104, 033505.	3.3	13
83	Al Content-Dependent Resistive Switching in Al-Rich AlO _x N _y Thin Films. Nanoscience and Nanotechnology Letters, 2014, 6, 835-839.	0.4	2
84	Review of Nanostructured Resistive Switching Memristor and Its Applications. Nanoscience and Nanotechnology Letters, 2014, 6, 729-757.	0.4	76
85	<>A Special Issue on</> Nanoelectronics. Nanoscience and Nanotechnology Letters, 2014, 6, 727-728.	0.4	0
86	Development of optically transparent ZnS/poly(vinylpyrrolidone) nanocomposite films with high refractive indices and high Abbe numbers. Journal of Applied Polymer Science, 2013, 129, 1793-1798.	2.6	14
87	Effect of O ₂ plasma immersion on electrical properties and transistor performance of indium gallium zinc oxide thin films. Thin Solid Films, 2013, 545, 533-536.	1.8	19
88	Magnetron Sputtered Ni-Rich Nickel Oxide Nano-Films for Resistive Switching Memory Applications. International Journal of Applied Ceramic Technology, 2013, 10, 20-25.	2.1	13
89	Emulating the paired-pulse facilitation of a biological synapse with a NiOx-based memristor. Applied Physics Letters, 2013, 102, .	3.3	119
90	Electroluminescence from SiO ₂ Thin Film Embedded with Self-Assembled Gold Nanoparticles. Nanoscience and Nanotechnology Letters, 2013, 5, 857-860.	0.4	2

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91	Effects of free electrons and quantum confinement in ultrathin ZnO films: a comparison between undoped and Al-doped ZnO. Optics Express, 2013, 21, 14131.	3.4	35
92	Effect of Exposure to Ultraviolet-Activated Oxygen on the Electrical Characteristics of Amorphous Indium Gallium Zinc Oxide Thin Film Transistors. ECS Solid State Letters, 2013, 2, Q21-Q24.	1.4	28
93	Recovery from ultraviolet-induced threshold voltage shift in indium gallium zinc oxide thin film transistors by positive gate bias. Applied Physics Letters, 2013, 103, .	3.3	10
94	Design of an electronic synapse with spike time dependent plasticity based on resistive memory device. Journal of Applied Physics, 2013, 113, .	2.5	14
95	Si nanocrystal-based triple-layer anti-reflection coating for Si solar cells. Journal of Applied Physics, 2013, 114, 053109.	2.5	3
96	Ink-jet printed In-Ga-Zn oxide nonvolatile TFT memory utilizing silicon nanocrystals embedded in SiO ₂ gate dielectric. , 2013, , .		1
97	Emulating the Ebbinghaus forgetting curve of the human brain with a NiO-based memristor. Applied Physics Letters, 2013, 103, .	3.3	90
98	Temperature-Dependent Charge Transport in Al/Al Nanocrystal Embedded Al ₂ O ₃ Nanocomposite/p-Si Diodes. ECS Solid State Letters, 2012, 1, Q4-Q7.	1.4	11
99	Modeling of lateral charge transfer in Si nanocrystals in SiO ₂ thin film. Journal of Applied Physics, 2012, 111, 073707.	2.5	0
100	Influence of SiO ₂ Layer on the Dielectric Function of Gold Nanoparticles on Si Substrate. Electrochemical and Solid-State Letters, 2012, 15, K5.	2.2	2
101	Realization of transient memory-loss with NiO-based resistive switching device. Applied Physics A: Materials Science and Processing, 2012, 109, 349-352.	2.3	3
102	Size-suppressed dielectrics of Ge nanocrystals: skin-deep quantum entrapment. Nanoscale, 2012, 4, 1308.	5.6	7
103	Wavelength tunable electroluminescence from randomly assembled n-CdS _x Se _{1-x} nanowires/p-SiC heterojunction. Nanoscale, 2012, 4, 1467-1470.	5.6	7
104	Conduction mechanisms at low- and high-resistance states in aluminum/anodic aluminum oxide/aluminum thin film structure. Journal of Applied Physics, 2012, 112, .	2.5	35
105	Resistive Switching Behavior of Partially Anodized Aluminum Thin Film at Elevated Temperatures. IEEE Transactions on Electron Devices, 2012, 59, 2363-2367.	3.0	15
106	Controlled electroluminescence of n-ZnMgO/p-GaN light-emitting diodes. Applied Physics Letters, 2012, 101, .	3.3	13
107	Strong green emission in ZnO films after H ₂ surface treatment. Journal Physics D: Applied Physics, 2012, 45, 185102.	2.8	13
108	A quantitative modeling of the contributions of localized surface plasmon resonance and interband transitions to absorbance of gold nanoparticles. Journal of Nanoparticle Research, 2012, 14, 1.	1.9	14

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109	Flexible Write-Once-Read-Many-Times Memory Device Based on a Nickel Oxide Thin Film. IEEE Transactions on Electron Devices, 2012, 59, 858-862.	3.0	16
110	Effect of Heat Diffusion During State Transitions in Resistive Switching Memory Device Based on Nickel-Rich Nickel Oxide Film. IEEE Transactions on Electron Devices, 2012, 59, 1558-1562.	3.0	7
111	Flexible Nanoscale Memory Device Based on Resistive Switching in Nickel Oxide Thin Film. Nanoscience and Nanotechnology Letters, 2012, 4, 940-943.	0.4	4
112	Optical Properties of Gold Nanoparticles on Heavily-Doped Si Substrate Synthesized with an Electrochemical Process. Journal of the Electrochemical Society, 2011, 158, K152.	2.9	6
113	Ultraviolet Random Lasing Action from Highly Disordered n-AlN/p-GaN Heterojunction. ACS Applied Materials & Interfaces, 2011, 3, 1726-1730.	8.0	13
114	Laterally-current-injected light-emitting diodes based on nanocrystalline-Si/SiO ₂ superlattice. Optics Express, 2011, 19, 2729.	3.4	17
115	Profile Uniformity of Overlapped Oxide Dots Induced by Atomic Force Microscopy: (Journal of) Tj ETQq1 1 0.784314 rgBT /Overlock 107 Nanotechnology, 2011, 11, 899-899.	0.9	0
116	Bandgap expansion and dielectric suppression of self-assembled Ge nanocrystals. Journal of Applied Physics, 2011, 109, .	2.5	15
117	Annealing-Induced Changes in Electrical Characteristics of Al/Al-Rich $\text{Al}_{2}\text{O}_{3}/\text{Si}$ Diodes. IEEE Transactions on Electron Devices, 2011, 58, 33-38.	3.0	3
118	Two-Terminal Write-Once-Read-Many-Times Memory Device Based on Charging-Controlled Current Modulation in Al/Al-Rich $\text{Al}_{2}\text{O}_{3}/\text{p-Si}$ Diode. IEEE Transactions on Electron Devices, 2011, 58, 960-965.	3.0	12
119	Influence of implantation dose on electroluminescence from Si -implanted silicon nitride thin films. Applied Physics A: Materials Science and Processing, 2011, 104, 239-245.	2.3	12
120	Self-learning ability realized with a resistive switching device based on a Ni-rich nickel oxide thin film. Applied Physics A: Materials Science and Processing, 2011, 105, 855-860.	2.3	9
121	Temperature dependence of current transport in Al/Al ₂ O ₃ nanocomposite thin films. Journal of Applied Physics, 2011, 110, 096108.	2.5	3
122	Competition of Resistive-Switching Mechanisms in Nickel-Rich Nickel Oxide Thin Films. Electrochemical and Solid-State Letters, 2011, 14, H400.	2.2	4
123	Temperature Dependence of Resistive Switching in Aluminum/Anodized Aluminum Film Structure. Nanoscience and Nanotechnology Letters, 2011, 3, 222-225.	0.4	3
124	Resistive Switching in a Ni-Rich Nickel Oxide Thin Film. Nanoscience and Nanotechnology Letters, 2011, 3, 267-271.	0.4	1
125	Profile Uniformity of Overlapped Oxide Dots Induced by Atomic Force Microscopy. Journal of Nanoscience and Nanotechnology, 2010, 10, 4390-4399.	0.9	4
126	A Two-Terminal Write-Once-Read-Many-Times-Memory Device Based on an Aluminum Nitride Thin Film Containing Al Nanocrystals. Journal of Nanoscience and Nanotechnology, 2010, 10, 5796-5799.	0.9	4

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127	Si-Based Light-Emitting Structure Synthesized with Low-Energy Ion Implantation at a Low Dosage. Journal of Nanoscience and Nanotechnology, 2010, 10, 595-598.	0.9	0
128	Charging Effect of Aluminum Nitride Thin Films Containing Al Nanocrystals. Journal of Nanoscience and Nanotechnology, 2010, 10, 599-603.	0.9	6
129	Charge Storage Behaviors of Ge Nanocrystals Embedded in SiO ₂ for the Application in Non-Volatile Memory Devices. Journal of Nanoscience and Nanotechnology, 2010, 10, 4517-4521.	0.9	5
130	Improvement of Negative Bias Temperature Instability by Stress Proximity Technique. IEEE Transactions on Electron Devices, 2010, 57, 238-243.	3.0	5
131	Electroluminescence of as-sputtered silicon-rich SiO _x films. Vacuum, 2010, 84, 1043-1048.	3.5	18
132	Physics of electron mobility independent of channel orientation in n-channel transistors based on (100) silicon wafers and its experimental verification. Applied Physics Letters, 2010, 97, 133508.	3.3	1
133	Scratch properties of nickel thin films using atomic force microscopy. Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics, 2010, 28, 202-210.	1.2	28
134	Tunable Surface Plasmon Resonance of Gold Nanoparticles Self-Assembled on Fused Silica Substrate. Electrochemical and Solid-State Letters, 2010, 13, K96.	2.2	10
135	Comparison of Charge Storage Behavior of Electrons and Holes in a Continuous Ge Nanocrystal Layer. Nanoscience and Nanotechnology Letters, 2010, 2, 7-10.	0.4	4
136	Charging Effect on Conductance of Magnetron Sputtered Si Nanocrystals Embedded SiO ₂ Films. Nanoscience and Nanotechnology Letters, 2010, 2, 226-230.	0.4	1
137	The charge trapping and memory effect in SiO ₂ thin films containing Ge nanocrystals. Journal Physics D: Applied Physics, 2010, 43, 015102.	2.8	10
138	Charging effect on electroluminescence performance of nc-Si/a-SiO ₂ films. Journal of Applied Physics, 2010, 107, 043709.	2.5	2
139	Microstructure of Magnetron Sputtered Amorphous SiO _x Films: Formation of Amorphous Si Core-Shell Nanoclusters. Journal of Physical Chemistry C, 2010, 114, 2414-2420.	3.1	45
140	Collective Excitations and Dielectric Function of Self-Assembled Gold Nanoparticles on a Silicon Substrate. Electrochemical and Solid-State Letters, 2010, 13, K39.	2.2	6
141	Electroluminescence from n-In ₂ O ₃ :Sn randomly assembled nanorods/p-SiC heterojunction. Optics Express, 2010, 18, 15585.	3.4	11
142	Electrically tunable white-color electroluminescence from Si-implanted silicon nitride thin film. Optics Express, 2010, 18, 20439.	3.4	28
143	Split of surface plasmon resonance of gold nanoparticles on silicon substrate: a study of dielectric functions. Optics Express, 2010, 18, 21926.	3.4	24
144	Static dielectric constant of Al nanocrystal/Al ₂ O ₃ nanocomposite thin films determined by the capacitance-voltage reconstruction technique. Applied Physics Letters, 2010, 96, 173110.	3.3	6

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145	Thickness effect on the band gap and optical properties of germanium thin films. Journal of Applied Physics, 2010, 107, .	2.5	117
146	Evolution of electroluminescence from multiple Si-implanted silicon nitride films with thermal annealing. Journal of Applied Physics, 2009, 105, 123101.	2.5	16
147	Parasitic memory effect induced by high erasing pulses in metal-oxide-semiconductor field-effect transistor device containing silicon nanocrystals. Journal of Applied Physics, 2009, 105, 114501.	2.5	1
148	High temperature excitonic lasing characteristics of randomly assembled SnO ₂ nanowires. Applied Physics Letters, 2009, 95, .	3.3	16
149	Capacitance switching in SiO ₂ thin film embedded with Ge nanocrystals caused by ultraviolet illumination. Applied Physics Letters, 2009, 95, 091111.	3.3	1
150	Strong violet and green-yellow electroluminescence from silicon nitride thin films multiply implanted with Si ions. Applied Physics Letters, 2009, 94, .	3.3	35
151	Anomalous capacitance-voltage characteristics of Al/Al-rich Al ₂ O ₃ /p-Si capacitors and their reconstruction. Applied Physics Letters, 2009, 94, 243106.	3.3	4
152	Current conduction in Al/Si nanocrystal embedded SiO ₂ /p-Si diodes with various distributions of Si nanocrystals in the oxide. Journal of Applied Physics, 2009, 106, 013718.	2.5	7
153	Large magnetic moment obtained in Cu-doped ZnO nanoclusters. , 2009, , .		0
154	Charge Storage Mechanism of Si Nanocrystals Embedded SiO ₂ Films. Nanoscience and Nanotechnology Letters, 2009, 1, 176-181.	0.4	1
155	Design of a Near-Perfect Anti Reflective Layer for Si Photodetectors Based on a SiO ₂ Film Embedded with Si Nanocrystals. Japanese Journal of Applied Physics, 2009, 48, 060206.	1.5	4
156	Influence of thermal annealing on charge storage behaviour of Ge nanoclusters synthesized with low-energy Ge ion implantation. Journal Physics D: Applied Physics, 2009, 42, 035109.	2.8	9
157	Effect of annealing on charge transfer in Ge nanocrystal based nonvolatile memory structure. Journal of Applied Physics, 2009, 106, .	2.5	24
158	Formation of uniform nanoscale oxide layers assembled by overlapping oxide lines using atomic force microscopy. Journal of Micro/ Nanolithography, MEMS, and MOEMS, 2009, 8, 043050.	0.9	6
159	Implant Energy-Dependent Enhancement of Electroluminescence from Ge-Implanted SiO ₂ Thin Films. Electrochemical and Solid-State Letters, 2009, 12, H238.	2.2	5
160	Resistive switching in aluminum/anodized aluminum film structure without forming process. Journal of Applied Physics, 2009, 106, .	2.5	38
161	Charging-Induced Changes in Reverse Current–Voltage Characteristics of Al/Al-Rich $\text{Al}_2\text{O}_3/\text{p-Si}$ Diodes. IEEE Transactions on Electron Devices, 2009, 56, 2060-2064.	3.0	17
162	Relationship Between Current Transport and Electroluminescence in Si^+ -Implanted SiO_2 Thin Films. IEEE Transactions on Electron Devices, 2009, 56, 2785-2791.	3.0	8

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163	Quenching and Reactivation of Electroluminescence by Charge Trapping and Detrapping in Si-Implanted Silicon Nitride Thin Film. IEEE Transactions on Electron Devices, 2009, 56, 3212-3217.	3.0	7
164	CMOS-compatible light-emitting devices based on thin aluminum nitride film containing Al nanocrystals. Applied Physics A: Materials Science and Processing, 2009, 95, 753-756.	2.3	1
165	Evolution of Si suboxides into Si nanocrystals during rapid thermal annealing as revealed by XPS and Raman studies. Journal of Crystal Growth, 2009, 311, 1296-1301.	1.5	61
166	Optical Transmission and Photoluminescence of Silicon Nitride Thin Films Implanted with Si Ions. Electrochemical and Solid-State Letters, 2009, 12, H38.	2.2	9
167	Charging effect and capacitance modulation of Ni-rich NiO thin film. Applied Physics Letters, 2009, 95, 012104.	3.3	8
168	Charging influence on current conduction in NiO thin film embedded with Ni nanocrystals. Journal Physics D: Applied Physics, 2009, 42, 225104.	2.8	1
169	Micellar poly(styrene-b-4-vinylpyridine)-nanoparticle hybrid system for non-volatile organic transistor memory. Journal of Materials Chemistry, 2009, 19, 7354.	6.7	99
170	Magnetron Sputtered nc-Al ₂ O ₃ /Al ₂ O ₃ /SiO ₂ /Si Nanocomposite Thin Films for Nonvolatile Memory Application. Journal of Nanoscience and Nanotechnology, 2009, 9, 4116-4120.	0.9	8
171	Influence of excess Si distribution in the gate oxide on the memory characteristics of MOSFETs. Applied Physics A: Materials Science and Processing, 2008, 91, 411-413.	2.3	3
172	Conduction switching in aluminum nitride thin films containing Al nanocrystals. Applied Physics A: Materials Science and Processing, 2008, 93, 483-487.	2.3	2
173	Non-Volatile Organic Memory Applications Enabled by In Situ Synthesis of Gold Nanoparticles in a Self-Assembled Block Copolymer. Advanced Materials, 2008, 20, 2325-2331.	21.0	186
174	Bottom-contact poly(3,3'-didodecylquaterthiophene) thin-film transistors with reduced contact resistance. Organic Electronics, 2008, 9, 14-20.	2.6	18
175	Influence of oxygen partial pressure on magnetron sputtered Sr _{0.8} Nd _{0.3} Bi _{2.5} Ta ₂ O _{9+x} ferroelectric thin films. Journal of Alloys and Compounds, 2008, 457, 549-554.	5.5	18
176	Room-Temperature Visible Electroluminescence From Aluminum Nitride Thin Film Embedded With Aluminum Nanocrystals. IEEE Transactions on Electron Devices, 2008, 55, 3605-3609.	3.0	4
177	A Simple Route to Growth of Silicon Nanowires. Journal of Nanoscience and Nanotechnology, 2008, 8, 5787-5790.	0.9	3
178	Influence of hydrogen dispersive diffusion in nitrided gate oxide on negative bias temperature instability. Applied Physics Letters, 2008, 93, 013501.	3.3	3
179	Annealing effect on the optical properties of implanted silicon in a silicon nitride matrix. Applied Physics Letters, 2008, 93, .	3.3	18
180	A comparative study on the dielectric functions of isolated Si nanocrystals and densely stacked Si nanocrystal layer embedded in SiO ₂ synthesized with Si ion implantation. , 2008, , .		0

#	ARTICLE	IF	CITATIONS
181	Multiferroic properties of sputtered BiFeO ₃ thin films. Applied Physics Letters, 2008, 92, .	3.3	67
182	Charging dynamics of discrete gold nanoparticle arrays self-assembled within a poly(styrene-b-4-vinylpyridine) diblock copolymer template. Applied Physics Letters, 2008, 93, 222908.	3.3	20
183	Ultraviolet and visible electroluminescence from n-ZnO/SiO ₂ /(n,p)-Si heterostructured light-emitting diodes. Applied Physics Letters, 2008, 93, .	3.3	88
184	Charging effect of Al ₂ O ₃ thin films containing Al nanocrystals. Applied Physics Letters, 2008, 93, 142106.	3.3	13
185	Light-induced instability in current conduction of aluminum nitride thin films embedded with Al nanocrystals. Applied Physics Letters, 2008, 92, 013102.	3.3	6
186	Influence of nanocrystal distribution on electroluminescence from Si ⁺ -implanted SiO ₂ thin films. Proceedings of SPIE, 2008, , .	0.8	0
187	Recent Developments in Tip-Based Nanofabrication and Its Roadmap. Journal of Nanoscience and Nanotechnology, 2008, 8, 2167-2186.	0.9	76
188	Evolution of Photoluminescence Mechanisms of Si ⁺ -Implanted SiO ₂ Films with Thermal Annealing. Journal of Nanoscience and Nanotechnology, 2008, 8, 3555-3560.	0.9	12
189	CMOS-compatible light emission device based on thin aluminum nitride film containing Al nanocrystals. , 2007, , .		0
190	Modeling and Characterization of Nitrogen-Enhanced Negative-Bias Temperature Instability in p-Channel MOSFETs. Journal of the Electrochemical Society, 2007, 154, G255.	2.9	5
191	Influence of charge trapping on electroluminescence from Si-nanocrystal light emitting structure. Journal of Applied Physics, 2007, 101, 104306.	2.5	23
192	APPLICATION OF SILICON NANOCRYSTAL IN NON-VOLATILE MEMORY DEVICES. , 2007, , 419-472.		0
193	Measurement of Dispersion Stability of Surface-Modified Nanosized Carbon Black in Various Liquids. Journal of Nanoscience and Nanotechnology, 2007, 7, 3827-3829.	0.9	3
194	The influence of the implantation dose and energy on the electroluminescence of Si ⁺ -implanted amorphous SiO ₂ thin films. Nanotechnology, 2007, 18, 455306.	2.6	19
195	Fabrication of thin-film organic transistor on flexible substrate via ultraviolet transfer embossing. Applied Physics Letters, 2007, 90, 243502.	3.3	18
196	Photon-induced conduction modulation in SiO ₂ thin films embedded with Ge nanocrystals. Applied Physics Letters, 2007, 90, 103102.	3.3	10
197	Modeling and Characterization of Negative Bias Temperature Instability in p-Channel MOSFETs. ECS Transactions, 2007, 6, 283-299.	0.5	2
198	Direct Writing of Spot and Line Bonds for Microsystem Packaging Using Transmission Laser Bonding Technique. Materials and Manufacturing Processes, 2007, 22, 71-80.	4.7	5

#	ARTICLE	IF	CITATIONS
199	Energy Shifts of Si Oxidation States in the System of Si Nanocrystals Embedded in SiO ₂ Matrix. Journal of Nanoscience and Nanotechnology, 2007, 7, 2506-2510.	0.9	1
200	Charging phenomena in pentacene-gold nanoparticle memory device. Applied Physics Letters, 2007, 90, 042906.	3.3	141
201	Charging effect in germanium nanocrystals embedded in a SiO ₂ matrix. , 2007, , .		0
202	Room temperature deposition of p-type arsenic doped ZnO polycrystalline films by laser-assist filtered cathodic vacuum arc technique. Journal of Applied Physics, 2007, 101, 094905.	2.5	25
203	Charge trapping and retention behaviors of Ge nanocrystals distributed in the gate oxide near the gate synthesized by low-energy ion implantation. Journal of Applied Physics, 2007, 101, 124313.	2.5	15
204	Influence of nanocrystal size on optical properties of Si nanocrystals embedded in SiO ₂ synthesized by Si ion implantation. Journal of Applied Physics, 2007, 101, 103525.	2.5	40
205	Recent developments on microablation of glass materials using excimer lasers. Optics and Lasers in Engineering, 2007, 45, 975-992.	3.8	41
206	Synthesis and Electrical Transport of Novel Channel-Structured ¹² -AgVO ₃ . Small, 2007, 3, 1174-1177.	10.0	82
207	Synthesis, Characterization and Oxidation Effects of Solid-State Reaction Silicon Nanocrystals. , 2006, , .		0
208	Charging effect on current conduction in aluminum nitride thin films containing Al nanocrystals. Applied Physics Letters, 2006, 89, 123101.	3.3	28
209	Dielectric functions of densely stacked Si nanocrystal layer embedded in SiO ₂ thin films. Applied Physics Letters, 2006, 89, 251910.	3.3	4
210	A novel empirical model for NBTI recovery with the modulated measurement time frame. , 2006, , .		3
211	Memory characteristics of MOSFETs with densely stacked silicon nanocrystal Layers in the gate oxide synthesized by low-energy ion beam. IEEE Electron Device Letters, 2006, 27, 231-233.	3.9	47
212	Depth Profiling of Charging Effect of Si Nanocrystals Embedded in SiO ₂ : A Study of Charge Diffusion among Si Nanocrystals. Journal of Physical Chemistry B, 2006, 110, 16499-16502.	2.6	12
213	Charging mechanism in a SiO ₂ matrix embedded with Si nanocrystals. Journal of Applied Physics, 2006, 100, 096111.	2.5	14
214	A study of the influence of tunnel oxide thickness on the performance of flash memory based on ion-beam synthesized silicon nanocrystals. Physica Status Solidi (A) Applications and Materials Science, 2006, 203, 1291-1295.	1.8	6
215	Distinguishing the effect of crystal-field screening from the effect of valence recharging on the 2p _{3/2} and 3d _{5/2} level energies of nanostructured copper. Applied Surface Science, 2006, 252, 2101-2107.	6.1	15
216	Dielectric functions of SiO ₂ film embedded with silicon nanocrystals. Journal of Crystal Growth, 2006, 288, 87-91.	1.5	6

#	ARTICLE	IF	CITATIONS
217	Characteristics of mechanically milled silicon nanocrystals embedded in TEOS thin films. Journal of Crystal Growth, 2006, 288, 92-95.	1.5	7
218	Silicon nanocrystal-based non-volatile memory devices. Thin Solid Films, 2006, 504, 25-27.	1.8	16
219	An electrical study of behaviors of Si nanocrystals distributed in the gate oxide near the oxide/substrate interface of a MOS structure. Thin Solid Films, 2006, 504, 32-35.	1.8	0
220	Refractive indices of textured indium tin oxide and zinc oxide thin films. Thin Solid Films, 2006, 510, 95-101.	1.8	74
221	Static dielectric constant of isolated silicon nanocrystals embedded in a SiO ₂ thin film. Applied Physics Letters, 2006, 88, 063103.	3.3	30
222	Influences of interface oxidation on transmission laser bonding of wafers for microsystem packaging. Microsystem Technologies, 2006, 13, 49-59.	2.0	3
223	Impact of programming mechanisms on the performance and reliability of nonvolatile memory devices based on Si nanocrystals. IEEE Transactions on Electron Devices, 2006, 53, 663-667.	3.0	33
224	Influence of Si-nanocrystal distribution in the oxide on the charging behavior of MOS structures. IEEE Transactions on Electron Devices, 2006, 53, 914-917.	3.0	8
225	Influence of Si nanocrystal distributed in the gate oxide on the MOS capacitance. IEEE Transactions on Electron Devices, 2006, 53, 730-736.	3.0	13
226	Si ion-induced instability in flatband Voltage of Si/sup +/-implanted gate oxides. IEEE Transactions on Electron Devices, 2006, 53, 1280-1282.	3.0	4
227	High-Temperature Lasing Characteristics of ZnO Epilayers. Advanced Materials, 2006, 18, 771-774.	21.0	40
228	Charge trapping phenomena of tetraethylorthosilicate thin film containing Si nanocrystals synthesized by solid-state reaction. Nanotechnology, 2006, 17, 4078-4081.	2.6	3
229	A Simple Negative Bias Temperature Instability Characterization Methodology to Minimize the Immediate Recovery Effect during Measurement. Japanese Journal of Applied Physics, 2006, 45, 6137-6140.	1.5	6
230	Dependence of barrier height and effective mass on nitrogen concentration at SiO _x N _y /Si interface and gate oxide thickness. Smart Materials and Structures, 2006, 15, S39-S42.	3.5	12
231	Charging/discharging of silicon nanocrystals embedded in an SiO ₂ matrix inducing reduction/recovery in the total capacitance and tunneling current. Smart Materials and Structures, 2006, 15, S43-S46.	3.5	10
232	Analytical reaction-diffusion model and the modeling of nitrogen-enhanced negative bias temperature instability. Applied Physics Letters, 2006, 88, 172109.	3.3	28
233	Simulation of Flash Memory Characteristics based on Discrete Nanoscale Silicon. , 2006, , .		0
234	Electrical characteristics of Si nanocrystal distributed in a narrow layer in the gate oxide near the gate synthesized with very-low-energy ion beams. Journal of Applied Physics, 2006, 99, 106105.	2.5	9

#	ARTICLE	IF	CITATIONS
235	Mechanism of nitrogen-enhanced negative bias temperature instability in pMOSFET. Microelectronics Reliability, 2005, 45, 19-30.	1.7	34
236	Dynamic NBTI lifetime model for inverter-like waveform. Microelectronics Reliability, 2005, 45, 1115-1118.	1.7	7
237	Effects of annealing on the microstructure and electrical properties of TaN-Cu nanocomposite thin films. Surface and Coatings Technology, 2005, 193, 173-177.	4.8	17
238	Fabrication of n-ZnO:Al ⁺ -p-SiC(4H) heterojunction light-emitting diodes by filtered cathodic vacuum arc technique. Applied Physics Letters, 2005, 86, 241111.	3.3	97
239	Impact of Nonuniform Graded Dopant Profile in Polysilicon Gate on Gate Leakage Current. IEEE Transactions on Electron Devices, 2005, 52, 1200-1204.	3.0	1
240	Characterization of Si Nanocrystals Embedded in SiO ₂ with X-Ray Photoelectron Spectroscopy. Journal of Metastable and Nanocrystalline Materials, 2005, 23, 11-14.	0.1	0
241	Optical-Property Profiling of SiO ₂ Films Containing Si Nanocrystals Formed by Si ⁺ Implantation. Journal of Metastable and Nanocrystalline Materials, 2005, 23, 133-136.	0.1	0
242	Modulation of Capacitance Magnitude by Charging/Discharging in Silicon Nanocrystals Distributed Throughout the Gate Oxide in MOS Structures. Electrochemical and Solid-State Letters, 2005, 8, G8.	2.2	8
243	Random capacitance modulation due to charging/discharging in Si nanocrystals embedded in gate dielectric. Nanotechnology, 2005, 16, 1119-1122.	2.6	6
244	An approach to optical-property profiling of a planar-waveguide structure of Si nanocrystals embedded in SiO ₂ . Nanotechnology, 2005, 16, 2657-2660.	2.6	2
245	Memory effect of Al-rich AlN films synthesized with rf magnetron sputtering. Applied Physics Letters, 2005, 87, 033112.	3.3	26
246	Thermal annealing effect on the band gap and dielectric functions of silicon nanocrystals embedded in SiO ₂ matrix. Applied Physics Letters, 2005, 87, 121903.	3.3	25
247	Influence of silicon-nanocrystal distribution in SiO ₂ matrix on charge injection and charge decay. Applied Physics Letters, 2005, 86, 152110.	3.3	18
248	Defect-induced photoluminescence from tetraethylorthosilicate thin films containing mechanically milled silicon nanocrystals. Journal of Applied Physics, 2005, 97, 104307.	2.5	15
249	Nanofabrication by scanning probe microscope lithography: A review. Journal of Vacuum Science & Technology an Official Journal of the American Vacuum Society B, Microelectronics Processing and Phenomena, 2005, 23, 877.	1.6	404
250	DISSIPATION OF CHARGES IN SILICON NANOCRYSTALS EMBEDDED IN SiO ₂ DIELECTRIC FILMS: AN ELECTROSTATIC FORCE MICROSCOPY STUDY. International Journal of Nanoscience, 2005, 04, 709-715.	0.7	0
251	Optical properties of silicon nanocrystals embedded in aSiO ₂ matrix. Physical Review B, 2005, 72, .	3.2	99
252	A quantitative study of the relationship between the oxide charge trapping over the drain extension and the off-state drain leakage current. Applied Physics Letters, 2004, 85, 4211-4213.	3.3	3

#	ARTICLE	IF	CITATIONS
253	Influence of nitrogen on tunneling barrier heights and effective masses of electrons and holes at lightly-nitrided SiO ₂ -Si interface. Journal of Applied Physics, 2004, 96, 5912-5914.	2.5	17
254	Profile of optical constants of SiO ₂ thin films containing Si nanocrystals. Journal of Applied Physics, 2004, 95, 8481-8483.	2.5	9
255	Visualizing charge transport in silicon nanocrystals embedded in SiO ₂ films with electrostatic force microscopy. Applied Physics Letters, 2004, 85, 2941-2943.	3.3	45
256	Charging Effect on Electrical Characteristics of MOS Structures with Si Nanocrystal Distribution in Gate Oxide. Electrochemical and Solid-State Letters, 2004, 7, G134.	2.2	26
257	Dielectric suppression of nanosolid silicon. Nanotechnology, 2004, 15, 1802-1806.	2.6	40
258	Core-Level Shift of Si Nanocrystals Embedded in a SiO ₂ Matrix. Journal of Physical Chemistry B, 2004, 108, 16609-16612.	2.6	30
259	Electrical properties of TaN-Cu nanocomposite thin films. Ceramics International, 2004, 30, 1879-1883.	4.8	28
260	Atomic Modeling of Nitrogen Neighboring Effect on Negative Bias Temperature Instability of pMOSFETs. IEEE Electron Device Letters, 2004, 25, 504-506.	3.9	20
261	Real time evolution of charge decay characteristics in silicon nanocrystals. , 2004, , .		0
262	Length, Strength, Extensibility, and Thermal Stability of a Au-Au Bond in the Gold Monatomic Chain. Journal of Physical Chemistry B, 2004, 108, 2162-2167.	2.6	37
263	Dependence of barrier height and effective electron mass on gate oxide thickness and nitrogen concentration at SiO _x N _y /Si interface. , 2004, 5274, 493.		0
264	Evolutions and distributions of Si nanocrystals and other Si oxidation states in Si-implanted SiO ₂ films. , 2004, 5275, 374.		0
265	Optical properties and their depth profiling of Si nanocrystals embedded in SiO ₂ matrix. , 2004, 5275, 378.		0
266	Charging/discharging induced premature breakdown/recovery in Si nanocrystals embedded in SiO ₂ matrix. , 2004, 5275, 18.		0
267	Gate oxide thickness dependence of edge charge trapping in nmos transistors caused by charge injection under constant-current stress. IEEE Transactions on Electron Devices, 2003, 50, 1548-1550.	3.0	5
268	Photoluminescence of Si Nanosolids Near the Lower End of the Size Limit.. ChemInform, 2003, 34, no.	0.0	0
269	Nitrogen-enhanced negative bias temperature instability: An insight by experiment and first-principle calculations. Applied Physics Letters, 2003, 82, 1881-1883.	3.3	66
270	Discriminating Crystal Binding from the Atomic Trapping of a Core Electron at Energy Levels Shifted by Surface Relaxation or Nanosolid Formation. Journal of Physical Chemistry B, 2003, 107, 411-414.	2.6	25

#	ARTICLE	IF	CITATIONS
271	A study on Si nanocrystal formation in Si-implanted SiO ₂ films by x-ray photoelectron spectroscopy. Journal Physics D: Applied Physics, 2003, 36, L97-L100.	2.8	66
272	Relationship between interfacial nitrogen concentration and activation energies of fixed-charge trapping and interface state generation under bias-temperature stress condition. Applied Physics Letters, 2003, 82, 269-271.	3.3	39
273	Dielectric functions of Si nanocrystals embedded in a SiO ₂ matrix. Physical Review B, 2003, 68, .	3.2	49
274	Influences of nitridation on tunneling barrier change and charge trapping caused by electrical stress. Journal of Applied Physics, 2003, 93, 3114-3116.	2.5	1
275	Study of negative-bias temperature-instability-induced defects using first-principle approach. Applied Physics Letters, 2003, 83, 3063-3065.	3.3	9
276	Linear relationship between H ⁺ -trapping reaction energy and defect generation: Insight into nitrogen-enhanced negative bias temperature instability. Applied Physics Letters, 2003, 83, 530-532.	3.3	22
277	Influence of interfacial nitrogen on edge charge trapping at the interface of gate oxide/drain extension in metal-oxide-semiconductor transistors. Applied Physics Letters, 2003, 82, 3113-3115.	3.3	4
278	Depth Profiling of Si Oxidation States in Si-Implanted SiO ₂ Films by X-Ray Photoelectron Spectroscopy. Japanese Journal of Applied Physics, 2003, 42, L1394-L1396.	1.5	7
279	Charging effect of Si nanocrystals in gate oxide near gate on MOS capacitance. Electronics Letters, 2003, 39, 1164.	1.0	6
280	Depth profiling of Si nanocrystals in Si-implanted SiO ₂ films by spectroscopic ellipsometry. Applied Physics Letters, 2002, 81, 4724-4726.	3.3	18
281	Post-Breakdown Conduction Instability of Ultrathin SiO ₂ Films Observed in Ramped-Current and Ramped-Voltage Current-Voltage Measurements. Japanese Journal of Applied Physics, 2002, 41, 3047-3051.	1.5	5
282	Influence of nitrogen concentration in nitrided oxides on interface trap generation caused by Fowler-Nordheim Injection. Journal Physics D: Applied Physics, 2002, 35, L115-L117.	2.8	1
283	Influences of Nitridation on Barrier Height Change Caused by Electrical Stress. Japanese Journal of Applied Physics, 2002, 41, L1425-L1427.	1.5	0
284	Power-Law Dependence of Charge Trapping on Injected Charge in Very Thin SiO ₂ Films. Japanese Journal of Applied Physics, 2002, 41, L384-L386.	1.5	2
285	Influence of Nitrogen Proximity from the Si/SiO ₂ Interface on Negative Bias Temperature Instability. Japanese Journal of Applied Physics, 2002, 41, L1031-L1033.	1.5	12
286	Suppression of Nitridation-Induced Interface Traps and Hole Mobility Degradation by Nitrogen Plasma Nitridation. Electrochemical and Solid-State Letters, 2002, 5, G26.	2.2	3
287	Barrier Height Change in Very Thin SiO ₂ Films Caused by Charge Injection. Electrochemical and Solid-State Letters, 2002, 5, G96.	2.2	2
288	Photoluminescence of Si Nanosolids near the Lower End of the Size Limit. Journal of Physical Chemistry B, 2002, 106, 11725-11727.	2.6	43

#	ARTICLE	IF	CITATIONS
289	Negative Bias Temperature Instability on Plasma-Nitrided Silicon Dioxide Film. Japanese Journal of Applied Physics, 2002, 41, L314-L316.	1.5	25
290	A simple technique to determine barrier height change in gate oxide caused by electrical stress. IEEE Transactions on Electron Devices, 2002, 49, 1493-1496.	3.0	54
291	Upper limit of blue shift in the photoluminescence of CdSe and CdS nanosolids. Acta Materialia, 2002, 50, 4687-4693.	7.9	43
292	A novel approach to quantitative determination of charge trapping near channel/drain edge in MOSFETs. Solid-State Electronics, 2002, 46, 2013-2016.	1.4	6
293	Characterization of interface degradation in deep submicron MOSFETs by gate-controlled-diode measurement. Microelectronics Journal, 2002, 33, 639-643.	2.0	2
294	Bond-order&bond-length&bond-strength (bond-OLS) correlation mechanism for the shape-and-size dependence of a nanosolid. Journal of Physics Condensed Matter, 2002, 14, 7781-7795.	1.8	125
295	Snapback behaviour and its similarity to the switching behaviour in ultra-thin silicon dioxide films after hard breakdown. Journal Physics D: Applied Physics, 2001, 34, L95-L98.	2.8	11
296	An extended 'quantum confinement' theory: surface-coordination imperfection modifies the entire band structure of a nanosolid. Journal Physics D: Applied Physics, 2001, 34, 3470-3479.	2.8	82
297	On the switching behaviour of post-breakdown conduction in ultra-thin SiO ₂ films. Semiconductor Science and Technology, 2001, 16, 793-797.	2.0	10
298	Snapback behavior of the postbreakdown I-V characteristics in ultrathin SiO ₂ films. Applied Physics Letters, 2001, 78, 492-494.	3.3	23
299	Modeling the Post-Breakdown I-V Characteristics of Ultrathin SiO ₂ Films with Multiple Snapbacks. Japanese Journal of Applied Physics, 2001, 40, L666-L668.	1.5	3
300	Frequency-controlled low-level current source based on charge pumping. Electronics Letters, 2001, 37, 1046.	1.0	4
301	Reproducibility of transmission line measurement of bipolar I-V characteristics of MOSFETs. IEEE Transactions on Instrumentation and Measurement, 1999, 48, 721-723.	4.7	4
302	Interface trap generation by FN injection under dynamic oxide field stress. IEEE Transactions on Electron Devices, 1998, 45, 1920-1926.	3.0	32
303	Post-stress interface trap generation induced by oxide-field stress with FN injection. IEEE Transactions on Electron Devices, 1998, 45, 1972-1977.	3.0	10
304	Influence of voltage contacts on precision measurements of the quantized Hall resistance: an effect of externally injected current. IEEE Transactions on Instrumentation and Measurement, 1998, 47, 592-594.	4.7	1
305	Electrically induced room temperature metastability in semi-insulating GaAs. Solid State Communications, 1998, 108, 907-911.	1.9	2
306	Instabilities in gate-controlled-diode characteristics of n-MOSFETs following hot-carrier injection. Semiconductor Science and Technology, 1997, 12, 1365-1368.	2.0	0

#	ARTICLE	IF	CITATIONS
307	Reverse I-V characteristics of Au/semi-insulating GaAs(1 0 0). Solid State Communications, 1997, 101, 715-720.	1.9	14
308	Fermi level position at metal/semi-insulating-GaAs (1 0 0) interfaces studied by photoelectric techniques. Solid State Communications, 1997, 102, 833-836.	1.9	2
309	Optical transitions in germanium dioxide. Thin Solid Films, 1996, 283, 230-234.	1.8	6
310	Determination of substrate doping, substrate carrier lifetime and density of surface recombination centres of MOSFETs by gate-controlled-diode measurements. Semiconductor Science and Technology, 1996, 11, 672-678.	2.0	8
311	Temperature dependence of the ideality factor of GaAs and Si schottky diodes. Physica Status Solidi A, 1995, 152, 563-571.	1.7	25
312	Optical Properties of Interband Transitions in the Oxygen-Plasma-Anodised Film on Gallium Arsenide -100%. Physica Status Solidi (B): Basic Research, 1995, 192, 217-222.	1.5	0
313	Numerical study of electrostatic properties of metal/semi-insulating GaAs contacts. Solid State Communications, 1995, 94, 287-291.	1.9	2
314	Cathodoluminescence from interband transitions in germanium (111) and gallium arsenide (100) crystals. Physical Review B, 1995, 52, 1452-1455.	3.2	1
315	Interfacial Fermi level and surface band bending in Ni/semi-insulating GaAs contact. Journal of Applied Physics, 1995, 78, 4796-4798.	2.5	5
316	Influence of annealing on Fermi-level pinning and current transport at Au-Si and Au-GaAs Interfaces. Journal of Applied Physics, 1995, 77, 6724-6726.	2.5	4
317	Determination of leakage resistance of Schottky contacts by photovoltage measurements. Journal of Applied Physics, 1994, 75, 7361-7364.	2.5	4
318	Numerical modeling of transient characteristics of photovoltage in Schottky contacts. Journal of Applied Physics, 1994, 76, 7624-7626.	2.5	0
319	Leakage current induced drop in E_f in pes studies of Schottky barrier formation. Solid State Communications, 1994, 89, 779-781.	1.9	1
320	A study of recombination current in Schottky contacts by photovoltage measurements. Semiconductor Science and Technology, 1994, 9, 2101-2106.	2.0	6
321	Characterization of Pt-Si interface by spectroscopic ellipsometry. Journal of Applied Physics, 1994, 76, 7423-7427.	2.5	3
322	Numerical study of the decay of photovoltage at metal-semiconductor interfaces. Solid State Communications, 1993, 87, 1163-1167.	1.9	1
323	Current transport and its effect on the determination of the Schottky-barrier height in a typical system: Gold on silicon. Solid-State Electronics, 1993, 36, 949-954.	1.4	31
324	A calculation of the photovoltage at the metal-semiconductor interface. Surface Science, 1993, 294, 367-372.	1.9	5

#	ARTICLE	IF	CITATIONS
325	Reverse I-V characteristics of Au/semi-insulating InP (100). Semiconductor Science and Technology, 1993, 8, 709-711.	2.0	8
326	A photovoltaic study of current transport and its influence on the determination of the Schottky barrier height in Schottky diodes. Semiconductor Science and Technology, 1993, 8, 2085-2091.	2.0	12
327	The effect of the temperature dependence of the ideality factor on metal-semiconductor solar devices. Semiconductor Science and Technology, 1993, 8, 1357-1360.	2.0	12
328	Investigation of Schottky barrier formation for transition metal overlayers on InP and GaP(110) surfaces. Surface Science, 1992, 269-270, 979-987.	1.9	11
329	Theoretical study of leakage current effect on surface photovoltage induced by photoemission. Solid State Communications, 1992, 84, 815-818.	1.9	8
330	The interaction of platinum with GaP(110): band bending and surface photovoltage effects. Applied Surface Science, 1992, 56-58, 233-241.	6.1	18
331	Interface chemistry and band bending induced by Pt deposition onto GaP(110). Surface Science, 1991, 251-252, 472-477.	1.9	19
332	Improvements in the PSB AC-DC transfer capabilities and a proposal for range extension. , 0, , .		3
333	Instability in post-breakdown conduction in ultra-thin gate oxide. , 0, , .		0
334	Influence of trapped charges on low-level leakage current in thin silicon dioxide films. , 0, , .		1
335	Study of edge charge trapping in gate oxide caused by FN and hot-carrier injection. , 0, , .		0
336	Study of influence of nitrogen concentration in nitrided oxide on interface trap generation. , 0, , .		0
337	Effects of post-decoupled-plasma-nitridation annealing of ultra-thin gate oxide. , 0, , .		0
338	Characterization of ultrathin plasma nitrided gate dielectrics in pMOSFET for 0.18 μm technology and beyond. , 0, , .		1
339	Negative-bias-temperature-instability (NBTI) for p/sup +/-gate pMOSFET with ultra-thin plasma-nitrided gate dielectrics. , 0, , .		2
340	A new waveform-dependent lifetime model for dynamic NBTI in PMOS transistor. , 0, , .		4
341	New Structures and Materials for Next Generation Photonic Technology. Applied Mechanics and Materials, 0, 120, 556-560.	0.2	0